

**भारतीय विमानपत्तन प्राधिकरण
में निर्माण एवं अनुरक्षण कार्यों के लिए संविदा की शर्तें**

**CONDITIONS OF CONTRACT FOR CONSTRUCTION AND MAINTENANCE WORKS IN
AIRPORTS AUTHORITY OF INDIA**



**Name of work :- Provision of Shed over Footpath along Approach Roads at Surat Int Airport
SH: Provision of Illuminated Outdoor Signage**

Tender ID. :- 2026_AAI_282510_1

Tender Document

Certified that this Tender Document Contains 389 Pages excluding Cover & Index page.

**Bid Manager :- Umesh Kumar Singh, AGM(E-E)-I,
AAI, Surat International Airport, Surat**

Contact Detail :- 7874694631, 0261-2700267

E-Mail ID :- umeshksingh@aai.aero

**अभियांत्रिकी विभाग
DEPARTMENT OF ENGINEERING
सूरत अंतरराष्ट्रीय हवाई अड्डा, सूरत
SURAT INT'L AIRPORT, SURAT**

AIRPORTS AUTHORITY OF INDIA

INDEX

Sl. No.	Description of Items	Page No.		
1	Notice Inviting Tender	1	To	7
2	PQ Performa	8	To	12
3	General Conditions of Contract	13	To	157
4	General Guidelines For The Tenderer	158	To	165
5	FORMATS			
	Annexure - I, II, III, IV,V, VI,VII ,VIII, IX, X, XI,XII,XIII,XIV, A	166	To	179
6	Tender Acceptance Letter	180	To	180
7	Special Condition Of Contract (SCC)	181	To	195
8	Technical Specification	196	To	205
9	SOP for online payment	206	To	207
10	List of Preferred Makes	208	To	219
11	Annex-1 (Design Guideline)	Annex-1 Pg 1	To	Annex-1 Pg 169
12	Item Rate BoQ	BoQ1	To	BoQ1

Certified that this Tender Document Contains 389 Pages numbered serially from 01 to 219, Annex-1 Pg1 to Annex-1 Pg 169 and BoQ-1 excluding Cover & Index page.



Ref. AAI/SRT/AGM(E-E)-I/eNIT-03/2026-27

Date:02/07/2026

NOTICE INVITING e-TENDER (2 BOT – 2 Envelope Open Tender)

Tender Reference No: AAI/SRT/AGM(E-E)-I/e-NIT-03/26-27

Tender ID: 2026_AAI_282510_1

Digitally signed & sealed (Encrypted) item rate bids are invited through the e-tendering portal by AGM (Engg-E)-I, AAI, Surat international Airport, Surat - 394550 (Bid Manager) on behalf of Chairman, A.A.I. from eligible Class – 1 local supplier as per Public Procurement Policy of Government of India for the work of “**Provision of Shed over Footpath along Approach Roads at Surat Int Airport SH: Provision of Illuminated Outdoor Signage**” at an estimated cost of **Rs.10.27lakh (Excluding GST)** with completion period of **Three(03) Months**.

The tendering process is online at CPP-portal URL address <https://etenders.gov.in/eprocure/app> or www.aai.aero. Prospective Tenderers may download and go through the tender document.

Prospective Tenderers are advised to get register themselves at CPP-portal, obtain 'Login ID' & 'Password' and go through the instructions available in the Home Page after log in to the CPP-portal <https://etenders.gov.in/eprocure/app> or www.aai.aero. They should also obtain Digital Signature Certificate (DSC) in parallel which is essentially required for submission of their application. The process normally takes 03 days' time. The tenderer may also take guidance from AAI Help Desk Support through path [aai.aero/tender/e-tender/help desk support](http://aai.aero/tender/e-tender/help%20desk%20support).

(i) For any technical related queries please call the Helpdesk. The 24 x 7 Help Desk details are as below: -

Tel: 0120-4001002, 0120-4001005, 0120-6277787

E-mail: support-eproc@nic.in

Tenderers are requested to mention the URL of the Portal and Tender ID in the subject while emailing any issue along with the contact details.

Before submitting queries, bidders are requested to follow the instruction given in “Guidelines to Bidders” and get their computer system configured according to the recommended settings as specified in the portal at “System settings for CPPP”.

(ii) For any further technical assistance with regard to functioning of CPP portal the tenderer may contact to the following AAI help desk numbers on all working days only between

- **Technical Help Desk Team - Instant Support - 08.00 hrs. to 20.00 hrs. (Mon-Sat) -**
011-24632950 , Ext-3512 (Six Lines), E-Mail: eprochelp@aai.aero
- **IE(IT) - After 4 Hrs. of Issue - 09.30 hrs. to 18.00 hrs. (Mon-Fri)-**
011-24632950,Ext-3523,E-Mail:-etendersupport@aai.aero,
vaibhav_g@aai.aero
- **Sr. Manager (IT) - After 12 Hrs. - 09.30 hrs. to 18.00 hrs. (Mon-Fri)-**
011-24632950, Ext-3509 (Six Lines), E-Mail: shripatim@aai.aero
- **It.Gm(IT) - After 24 Hrs. - 09.30 hrs. to 18.00 hrs. (Mon-Fri)-**
011-24632950,Ext-3506,E-Mail:-sunil.km@aai.aero,
vaibhav_g@aai.aero



- **General Manager (IT) - After 03 Days - 09.30 hrs. to 18.00 hrs. (Mon-Fri)**- 011-24657900, E-Mail: - gmit@aai.aero

*The help desk services shall remain closed on all Govt. Gazetted Holidays.

Tender processing fee of **Rs.1,180/- (i/c. GST), non-refundable** will be required to be **paid online on CPP portal only**.

Earnest Money Deposit (EMD) of **Rs.30,810/- (Rupees: Thirty Thousand Eight Hundred Ten only)** will be required to be paid online on CPP portal only.

2. Following 2 envelopes documents shall be submitted through online at CPP portal by the bidder as per the following schedule:-

CRITICAL DATA SHEET

i.	Publishing Date	02/07/2026 from 16:00 Hrs.
ii.	Bid Document Download / Sale Start Date	02/07/2026 from 16:00 Hrs.
iii.	Clarification Start Date	02/07/2026 from 16:00 Hrs.
iv.	Clarification End Date	07/07/2026 upto 18:00 Hrs.
v.	Bid Submission Start Date	02/07/2026 from 16:00 Hrs.
vi.	Bid Submission End Date	24/07/2026 at 15:00 Hrs.
vii.	Bid Opening Date (Envelope- I)	27/07/2026 at 15:30 Hrs.
viii.	Bid Opening Date (Envelope- II)	29/07/2026 at 15:00 Hrs.

Note: If the bidder has any query related to the bid document of the work, they should use 'seek clarification' on CPP Portal to seek clarification. No other means of communication in this regard shall be entertained.

Envelope-I (Technical Bid and Pre-qualification): - Bid containing following:-

A. Tender processing fee and EMD:

- Scanned copy of details of payment made through online SBI payment Gateway using SBI / Other Banks/ NEFT / RTGS on CPP Portal against Tender Processing Fee & EMD along with format given performa at **Page no.178** of Tender Document.

B. Technical Bid containing the following:-

- Scanned copy of undertaking under public procurement policy for make in India as per format given performa at **Page no.171** of Tender Document
- Scanned copy of Duly signed & stamped, **Tender Acceptance Letter** on Bidder's Letter Head as per the given performa at **page no.180** of the tender document.
- Scanned copy of Permanent Account Number (PAN) .
- Scanned copy of **Form- A** showing the details of similar works completed during last seven years with completion certificate issued by client as per format given at **Page No.172** of tender document.
- Scanned copy of **Form- B** – showing financial information as per format given at **Page No.173** of tender document mentioning UDIN No.



- vi. Bidder shall submit scanned copy of 'Undertaking' on Company's Letter Head that I/ We will deploy sufficient plant and machinery as per the requirement of work in consultation with the Engineer-in-Charge (E-I-C) to achieve the milestones/targets and overall completion within the time period as per format given at **page no. 177** of the tender document
- vii. ~~Scanned Copy of valid Electrical contractor licence.~~
- viii. Scanned copy of **GST Registration no.** (15 digit GSTIN). In-case bidder is having multiple business verticals in a state and having separate registration for each business vertical, GSTIN of each vertical concerned with the supply and service involved, as per the scope of NIT to be informed to AAI. In case firm do not possess the same & becomes L1 the firm will be required to get it essentially before award of work.
- ix. Scanned copy of EPF and ESI registration proof. In case, firm do not possess the same & becomes L-1 then firm is required to get themselves registered with EPF & ESI authorities and submit it within 30 days after the award of work. An undertaking for the same need to be submitted.
- x. Scanned copy undertaking **regarding black listing / debarment** on Company's Letter Head as per the given performa at **page no.167** of the tender document.
- xi. ~~Scanned copy of duly notarized affidavit on Non-Judicial stamp paper of Rs.100/- undertaking regarding minimum wages as per the given performa at page no. 166 of the tender document.~~
- xii. Scanned copy of Undertaking for **"Registered under GST and compliance of GST provision on company's letter head** as per the given performa at **page no.168 or 169** of the tender document as applicable.
- xiii. Bidders other than propriety firm shall submit scanned copy of Authorization Letter/Power of Attorney along with copy of Certificate of Incorporation of the company under Companies Act showing CIN/LLPIN/Name of Directors of the Company & Copy of Board Resolution regarding Authority to assign power of Attorney.
Proprietary firm shall submit scanned copy of Authorization Letter/Power of Attorney only if the tender is processed by a person other than proprietor.
- xiv. Scanned copy of PQ Performa duly filed & Signed with rubber stamp.
- xv. Scanned copy of GFR undertaking as per Performa duly filled & Signed with rubber stamp as per the given performa at **page no. 176** of the tender document.

C. Qualifying requirements of contractors/ tenderers containing the following:-

- i. Should have successfully completed or substantially completed three works, each of **Rs.4.11Lakh (e/x GST)** or two works, each of **Rs.5.14Lakh (e/x GST)** or one work of **Rs.8.22Lakh (e/x GST)** in single contract of similar nature of i.e. **"SITC of Internally Illuminated Signage"** in India during last seven years ending on the last day of month previous to the one in which tender are invited.



Note:-

1. The Experience Certificates of works completed pre GST era, Completion amount will be divided by 1.12 (to exclude pre GST taxes) to make it at par with experience certificates of post GST era but excluding GST.
2. Experience gained by executing work on back-to-back contract/ Sub-contract basis is acceptable in the following conditions:
 - (a) Work should be actually executed by the second agency (sub-contractor) with due concurrence of the owner as tripartite agreement/ written approval. It should be backed by valid agreement and experience certificate.
 - (b) Payments received by second agency should be reflected in TDS certificates.
3. For Experience gained in composite works for the specialized nature of works, executed by main contractor either by in-house expertise & experience or by engaging the specialized agencies with the approval of main client as per contract conditions, main contractor as well as specialized agency both get the experience certificate for the same work from their respective client(s) i.e. main contractor for composite work along with specialized works from owner and specialized agency for specialized work(s) from the main contractor.
In this situation, the experience certificate of either specialized agency or main agency having in-house expertise & experience, who has actually executed the specialized work(s), shall be considered for Technical /Pre-qualifying criteria in similar specialized nature of work(s).
4. Substantial completion shall be based on 80(eighty) percent of awarded cost or more value wise works completed under the contract.

“The value of executed works shall be brought to current costing level by enhancing the actual value of work at simple rate of 7% per annum, calculated from the date of completion to date of bid opening (Cover-I/Technical bid).

Client certificate for experience should show the nature of work done, the value of work done, stipulated date of start and date of completion as per agreement, actual date of completion and satisfactory completion of work. **The tenderer should submit work order along with detailed BOQ.**

Tenderers showing work experience certificate from Non-Government/ Non-PSU Organizations should submit copy of Tax Deduction at Source [TDS] Certificate alongwith a **certificate issued by registered Chartered Accountant mentioning UDIN No, clearly specifying the name of work, total payment received against the work and TDS amount for the work.**

- ii. Should have average annual financial turnover of **Rs.3.64Lakh** against works executed during last three years ending **31st March 2025**. As a proof, copy of Abridged Balance Sheet, Profit and Loss Account Statement (with UDIN no) of the Tenderer should be submitted along with the application. **Tenderer showing continuous losses during the last three years in the balance sheet shall be summarily rejected.** Scanned copy of Form- B - Financial Information shall be submitted (As per format given at **Page No.173** of tender document mentioning UDIN No).



- iii. The tenderer should have a minimum net worth of **Rs.1.54Lakh** issued by certified Chartered Accountant. The certificate should be submitted in the given format of Form-C (As per format given at **Page No.174** of tender document mentioning UDIN No).

Scanned copy of all the Documents of Envelope-I mentioned above shall be uploaded online on the CPP portal upto due date and time as per critical data sheet. Any documents in any other mode shall not be accepted. Non-submission of tender processing fee, EMD and Technical particulars shall lead to disqualification of tenderers.

Envelope-II (Financial e-Bid): - The Financial e-Bid through CPP portal.

All rates shall be quoted in the format provided and no other format is acceptable. If the price bid has been given as a standard BOQ format with the tender document, then the same is to be downloaded and to be filled by all the tenderers. Tenderers are required to download the BOQ file, open it and complete the blue coloured (unprotected) cells with their respective financial quotes and other details (such as name of the tenderers). No other cells should be changed. Once the details have been completed, the tenderer should save it and submit it online, without changing the filename. If the BOQ file is found to be modified by the tenderer, the bid will be rejected

3. Refund of EMD

EMD amount of the rejected bidders will be refunded to their source account after submission of Technical / Financial evaluation report on CPP portal by bid Manager.

4. Bid Submission:

The tenderer shall submit their application only at CPP Portal: <http://etenders.gov.in/eprocure/app>. Tenderer/Contractor are advised to follow the instructions provided in the tender document for online submission of bids. Tenderers are required to upload the digitally signed file of scanned documents as per Para 2. Bid documents may be scanned with 100 dpi with black and white option which helps in reducing size of the scanned document.

Uploading of application in location other than specified above shall not be considered. **Hard copy of application shall not be entertained.**

5. Not more than one tender shall be submitted by one tenderer or tenderers having business relationship. Under no circumstance will father and his son(s) or other close relations who have business relationship with one another (i.e. when one or more partner(s)/director(s) are common) be allowed to tender for the same contract as separate competitors. A breach of this condition will render the tenders of both parties liable to rejection.
6. Tenderer who has downloaded the tender from Central Public Procurement Portal (CPPP) website <http://etenders.gov.in/eprocure/app>, shall not tamper/modify the tender form including downloaded price bid template in any manner. In case if the same is found to be tampered/ modified in any manner, tender will be completely rejected and EMD would be forfeited and tenderer is liable to be banned from doing business with AAI.



7. Bid Opening Process is as below:

Envelope-I (Technical bid and Pre-qualification):

Envelope-I: Containing Documents as per para 2 (A), (B) and (C) (uploaded by the tenderers) shall be opened on date & time mentioned in the CRITICAL DATA SHEET.

If the bidder has any query related to the Bid Document of the work, they should use 'Seek Clarification' on CPP portal to seek clarifications. No other means of communications in this regards shall be entertained.

If any clarification is needed from the bidder about the deficiency in his uploaded documents in Envelope – I, he will be asked to provide it through the CPP portal if required. The tenderer shall upload the requisite clarification / documents within time specified by AAI, failing which it shall be presumed that Bidder does not have anything to submit and bid shall be evaluated accordingly.

The intimation regarding acceptance/rejection of their bids will be intimated to the tenderers through CPP portal.

Envelope-II (Financial Bid):

Envelope-II containing The financial bids of the tenderers / firms found to be meeting the technical criteria and qualifying requirement shall be opened on date & time as mentioned in CRITICAL DATA SHEET. **(In case the date and time for opening of Envelope-II (Financial bid) is required to be changed, the same shall be intimated through CPP Portal).**

8. AAI reserves the right to accept or reject any or all applications without assigning any reasons. AAI also reserves the right to call off tender process at any stage without assigning any reason.
9. AAI reserve the right to disallow the working agencies whose performance at ongoing project (s) is below par and usually poor and has been issued letter of restrain / Temporary / Permanent debarment/black listing by any department of AAI or Central/State Govt. Dept./PSUs/World Bank/ADB etc. **AAI reserve the right to verify the credential submitted by the tenderer at any stage (before or after the award the work). If at any stage, any information /documents submitted by the applicant is found to be incorrect/false or have some discrepancy which disqualifies the firm then AAI shall take the following action:**
 - a) **Forfeit the entire amount of EMD submitted by the Tenderer.**
 - b) **The tenderer shall be liable for debarment for a period upto two years from tendering in AAI, including termination of the contract apart from any other appropriate contractual / legal action.**
10. Consortium/JV companies shall not be permitted.
11. Purchase preference to Central Public Sector Undertaking shall be applicable as per the directive of Govt. of India prevalent on the date of acceptance.
12. Concessions to Indian Micro & Small Enterprises (MSEs) units registered with DIC/NSIC/KVIC/KVIB Directorate of Handicraft and Handloom etc.,to be given as per the provisions of public procurement policy for MSE order 2012 with up to date amendments, shall be applicable for tenders of supply/services and shall not be extended to construction work. The benefit to MSEs shall be available only for goods/ services produced and provided by MSEs for which they are registered.



13. Tenderers have to submit Unique Document Identification Number (UDIN) generated documents like balance sheet/ Turnover certificate, Net worth certificate, Tax deduction at Source (TDS) certificates for Non-Govt. works etc. as per NIT conditions duly certified by CA and having UDIN. The documents submitted by bidders without UDIN shall not be entertained.
14. Department of Promotion of Industry and Internal Trade (DPIIT), Ministry of Commerce and Industry, Government of India, issued Public Procurement (Preference to Make in India), Order 2017 vide OM No. P-45021/2/2017-PP(BE-II) dated 16.09.2020 is applicable.
15. Requirement of registration by the Bidder from a country sharing land border with India based on order No. F No. 6/18/2019-PPD dated 23/07/2020 of Government of India, Ministry of Finance, Department of Expenditure (Public procurement Division) with up to date amendments, regarding restriction under Rule 144(xi) of the General Financial Rules (GFR) 2017 shall be applicable.

Sd/-
AGM (Engg.-Elect)-I
For and on behalf of Chairman
AAI, Surat International Airport, Surat



PQ PERFORMA TO BE SUBMITTED BY APPLICANTS IN ENVELOPE-I

Name of work:- “ Provision of Shed over Footpath along Approach Roads at Surat Int Airport SH: Provision of Illuminated Outdoor Signage”

1	2	3	4
Ref. No	Qualifying Criterion	Particulars	Check list
1	Name & Reg. office Address of the Company:		
2.	Name, address, telephone, Fax No., e mail address of the authorized contact person of the agency for further communication.	Name: Address: Ph. No.: Mobile No.: Fax No.: E-Mail ID:	
3	Envelope-I:- (Tender processing fee, EMD, technical bid and pre-qualification)		
	A).Tender processing fee and EMD:		
	i) Tender processing fee (Non-Refundable)	Scanned copy of online transaction receipt of Tender Processing Fee to be uploaded in CPP portal. or Valid registration certificate of MSME / MSEs / NSIC, claiming exemption of tender processing fee	Online paid : YES / NO, Uploaded : YES / NO
	ii) EMD	Scanned copy of online transaction receipt of EMD & performa at Page no. 178 of the tender document to be uploaded in CPP portal. or Valid registration certificate of MSME / MSEs / NSIC, claiming exemption of EMD	Online paid : YES / NO, Uploaded : YES / NO
	B). Technical Bid containing the following:		
	I). Scanned copy of undertaking under public procurement policy for make in India as per format given in the Tender Document.	As per the given performa at page no. 171 of the tender document.	Scanned Copy of Copy uploaded: Yes/ No
	II).Duly signed scanned copy of Unconditional Acceptance Letter of AAI's Tender Conditions as per format given in the tender document.	As per the given performa at page no.180 of the tender document.	Scanned copy of duly signed & stamped Unconditional Acceptance Letter uploaded YES/NO
	III).Permanent Account No. (PAN).	Enclose documentary proof of PAN card	Scanned copy of PAN Card uploaded YES/NO



	IV). Scanned Copy of valid Electrical contractor licence	Enclose documentary proof of Electrical contractor licence	Scanned copy uploaded:- YES/NO
	V). Scanned copy of Form- A - Details of similar works completed during last seven years.	As per the given performa at page no. 172 of the tender document.	Scanned Copy uploaded: Yes/ No
	VI). Scanned copy of Form- B - Financial Information	As per the given performa at page no. 173 of the tender document.	Scanned Copy uploaded: Yes/ No
	VII) Scanned copy of Plant and machinery undertaking	Enclose documentary proof of Plant and machinery undertaking as per performa given at page no. 177 of the tender document.	Scanned copy uploaded: Yes/ No
	VIII).GSTIN No. / GST Registration certificate	Enclose documentary proof of GST No.	Scanned copy of GST Registration No. uploaded YES/NO
	IX). EPF, ESIC registration certificate / Undertaking	Enclose documentary proof of ESI & EPF registration	Scanned copy of ESI & EPF registration uploaded YES/NO
	X). Scanned copy undertaking regarding black listing / debarment on Company's Letter Head	As per the given performa at page no.167 of the tender document.	Scanned copy of undertaking of blacklisting of debarment uploaded. YES/NO
	XI).Scanned copy of duly notarized affidavit on Non-Judicial stamp paper of Rs.100/- undertaking regarding compliance of minimum wages.	As per the given performa at page no. 166 of the tender document.	Scanned copy of Undertaking uploaded. YES/NO
	XII). Undertaking for GST Registration & complying its provision as per the proforma given in the tender document.	As per the given performa at page no. 168. or 169 of the tender document as applicable.	Scanned Copy uploaded: Yes/ No
	XIII). Scanned copy of GFR undertaking as per Performa duly filled & Signed with rubber stamp	As per the given performa at page no. 176 of the tender document.	Scanned Copy of Copy uploaded: Yes/ No
	XIV).Authorization letter/ Power of Attorney	Enclose documentary proof	Scanned Copy of Certificate



	along with copy of certificate of incorporation of Company other than propriety firm.		uploaded YES/NO
	XV). Scanned copy of PQ Performa duly filled & Signed with rubber stamp	Enclose documentary proof	Scanned Copy of Copy uploaded: Yes/ No
	XVI). Scanned copy of Valid registration certificate of MSME/ MSEs / NSIC, if seeking Price Preference benefit as per the provisions of public procurement policy for MSE	Enclose documentary proof	Scanned Copy of Copy uploaded: Yes/ No
C).Qualifying requirements of contractors/ tenderers containing the following:			
	1.Certificate from clients of having satisfactorily completed similar works.	Details of the works as applicable to client:	Copy of completion certificate, work order along with detailed BOQ uploaded: Yes/ No
i)	Three works of value as per NIT , each of similar nature as per NIT , in India during last seven years ending on the last day of month previous to the one in which tender are invited.	a) Name of 1 st Work: b) Work order/Agreement No. & Date: c) Cost: d) Stipulated date of completion as per contract agreement: e) Actual Date of completion: f) Completion cost:	
ii)		a) Name of 2 nd Work: b) Work order/Agreement No. & Date: c) Cost: d) Stipulated date of completion as per contract agreement: e) Actual Date of completion: f) Completion cost:	
iii)		a) Name of 3 rd Work: b) Work order/Agreement No. & Date: c) Cost: d) Stipulated date of completion as per contract agreement: e) Actual Date of completion: f) Completion cost:	
	OR		



i)	Two works of value as per NIT , each of similar nature as per NIT , in India during last seven years ending on the last day of month previous to the one in which tender are invited.	a) Name of 1 st Work: b) Work order/Agreement No. & Date: c) Cost: d) Stipulated date of completion as per contract agreement: e) Actual Date of completion: f) Completion cost:	
ii)		a) Name of 2 nd Work: b) Work order/Agreement No. & Date: c) Cost: d) Stipulated date of completion as per contract agreement: e) Actual Date of completion: f) Completion cost:	
OR			
i)	One works of value as per NIT , each of similar nature as per NIT , in India during last seven years ending on the last day of month previous to the one in which tender are invited.	a) Name of Work: b) Work order/Agreement No. & Date: c) Cost: d) Stipulated date of completion as per contract agreement: e) Actual Date of completion: f) Completion cost:	
	2. For Experience from Non-Govt./Non-PSU organizations	1). TDS certificates as per e-NIT. 2).certificate issued by registered Chartered Accountant as per e-NIT	1). Scanned copy of TDS certificates uploaded. YES/NO 2). certificate issued by registered Chartered Accountant, specifying the name of work, total payment received against the work and TDS amount for the work uploaded. YES/NO
	3.TURNOVER:	Year INR (in Lacs)	
	Annualized average financial turnover as per NIT during last three financial years	2022-23 2023-24 2024-25 Average	Proof of turnover uploaded (Abridged balance sheet and profit & loss A/C) : Yes / No



	4. Minimum Net worth as on the ending of last financial year as per NIT and the Net Worth certificate of the same shall be submitted issued by certified Chartered Accountants. Form- C (as per format given at Page No. 174 of tender document).	Enclose the documentary Proof	Scanned Copy of Copy uploaded: Yes/ No
	Envelope-II:-		
a)	Financial/Price Bid in BOQ format uploaded through CPP portal.	To be quoted online through CPP portal http://etenders.gov.in/eprocure/app	Uploaded on portal: Yes/No

DECLARATION

I (.....) hereby declare that the documents submitted/ enclosed are true and correct. In case any document at any stage found fake/ incorrect, my EMD may be forfeited & debarred from tendering in AAI.

Date:

Signature with stamp
Authorized signatory of the Agency/ Manufacturer

.....
Note: All are requested to fill up the required data in the above Performa



GENERAL CONDITIONS OF CONTRACT

2017



AIRPORTS AUTHORITY OF INDIA

INDEX

Sl. No.	Details of Pages	Page No.
1.	General Guidelines	15 to 15
2.	Tender forms	16 to 17
i)	General Rules and Directions.	18 to 24
ii)	Conditions of contract	25 to 27
iii)	Clauses of contract	28 to 90
iv)	A A I Safety code	91 to 95
v)	Model Rules	96 to 100
vi)	A A I contractor's labour Regulations	101 to 105
vii)	Various Formats to be maintained (Appendix I to XX)	106 to 141
viii)	Sketch of Cement Godown	142 to 142
3.	Proforma of Schedules A to F	143 to 152



GENERAL GUIDELINES

1. This book of “General Conditions of Contract” is applicable to both types of tenders i. e.” Percentage rate tenders and Item rate tenders”. Accordingly, alternative provisions for conditions Nos. 4, 10 & 12 of the General Rules and Directions are given in this book. The appropriate alternatives will be applicable in specific cases depending on whether this is used for percentage rate tenders or item rate tenders
2. Notice Inviting Tender, Schedules A to F, special conditions/specifications and drawings only will be issued to intending bidders. The standard form will not be issued along with the Tender Documents but the same shall form part of the agreement to be drawn and signed by both parties after acceptance of tender.
3. All blanks are confined to Notice Inviting Tender and Schedules A to F.
4. Authority approving the Notice Inviting Tenders (NIT) shall fill up all the blanks in Notice Inviting Tender and in Schedules B to F before issue of Tender documents.
5. The intending bidders will quote their rates in Schedule A.
6. The proforma for registers and Schedules A to F are only for information and guidance. These are not to be filled in the Standard Form. The Schedules with all blanks, duly filled, shall be separately issued to all intending tenderers.



AIRPORTS AUTHORITY OF INDIA

~~Percentage Rate Tender~~/Item Rate Tender & Contract for Work

Airport : **Surat**

Branch : **Engineering (Electrical)**
Surat

Office inviting tender : **AGM (E E)-I, Surat International Airport,**

Tender for the work of :- **Provision of Shed over Footpath along Approach Roads at Surat Int Airport**
SH: Provision of Illuminated Outdoor Signage

(i) To be submitted/ uploaded as per **CRITICAL DATA SHEET given in NIT** in CPP Portal.

(ii) ~~To be opened in presence of tenders who may be present on _____ at _____ hrs. in the office of _____~~

_____ Issued to _____ *

_____ Signature of officer issuing documents _____ *

_____ Designation _____ *

_____ Date of issue _____ *

*(ii) Not applicable for e-tendering

TENDER

I/We have read and examined the notice inviting tender, schedule, A, B, C, D, E & F, Specifications applicable, Drawings & Designs, General Rules and Directions, Conditions of Contract, Clauses of contract, Special conditions, Schedule of Rates & other documents and Rules referred to in the conditions of contract and all other contents in the tender document for the work.

I/We hereby tender for the execution of the work specified for the Chairman Airports Authority of India within the time specified in Schedule 'F', viz., schedule of quantities and in accordance in all respects with the referred to in Rule-1 of General Rules and Directions and in Clause 11 of the Conditions of contract and with such material as are provided for, by and in respects in accordance with, such conditions so far as applicable.

We agree to keep the tender open for Ninety (90) days from the date of opening of financial bid in 2 bid system and not to make any modifications in its terms and conditions.

I/ We undertake and confirm that for eligibility of similar work(s) has / have not been got executed on back to back basis through another contractor. Further that, if such a violation comes to the notice of AAI, then I/We shall accept the decision of AAI if we are debarred for tendering in AAI in future works. Also , if such a violation comes to the notice of AAI before date of start of work, the Engineer-in-Charge shall be free to take action as deemed fit forfeit the entire amount of Earnest Money Deposit / ~~Performance Guarantee~~.

I/ We further undertake and confirm that information/ documents submitted by us are genuine, and if at any stage such documents/ information found false, then we shall be liable for debarment from tendering in AAI, and any other appropriate legal action. A sum of **Rs.30,810/- (Rupees: Thirty Thousand Eight Hundred Ten only)** is here by paid online through SBI payment Gateway using SBI / Other Banks/ NEFT / RTGS, on CPP Portal.

I/we agree that the said Chairman, A.A.I. or his successors in office shall without prejudice to any other right or remedy, be at liberty to take appropriate action as per terms of contract. Further, if I/ we fail to commence work as specified, I/we agree that Chairman, A.A.I. or his successors in office shall without prejudice to any other right or remedy available in law, be at liberty to forfeit the said earnest money absolutely, otherwise the said earnest money shall be retained by AAI towards security deposit to execute all the works referred to in the tender



documents upon the terms and conditions contained or referred to therein and to carry out such deviations as may be ordered, upto maximum of the percentage mentioned in Schedule 'F' and those in excess of that limit at the rates to be determined in accordance with the provision contained in Clause 12.2 and 12.3 of the tender form. Further, I/We agree that in case of forfeiture of earnest money ~~or Performance Guarantee or both Earnest Money & Performance Guarantee~~ as aforesaid, I/We shall be debarred for participation in the re-tendering process of the work.

I/We hereby declare that I/we shall treat the tender documents drawings and other records connected with the work as secret/confidential documents and shall not communicate information/derived there from to any person other than a person to whom I/we am/are authorised to communicate the same or use the information in any manner prejudicial to the safety of the State.

(* To be deleted which are not applicable)

Date : Signatures of Contractor :

Witness: Postal Address

Occupation:

ACCEPTANCE

The above tender (as modified by you as provided in the letters mentioned hereunder) is accepted by competent authority on behalf of the Chairman, Airports Authority of India for sum of Rs. _____ (Rupees _____).

The letters referred to below shall form part of this contract Agreement:-

- (i)
- (ii)
- (iii)

For & on behalf of Chairman, Airports Authority of India
Signature-----

Designation-----

Date-----



AIRPORTS AUTHORITY OF INDIA

General Rules & Directions

1.	General Rules & Directions	All work proposed for execution by contract are notified in a form of invitation to tender pasted in public places /GeM Portal and signed by the officer inviting tender and posted on AAI web-site and GeM Portal https://gem.gov.in. and www.aai.aero (for reference only). This form will state the work to be carried out, as well as the date for submitting and opening tenders and the time allowed for carrying out the work, also the amount of earnest money to be deposited with the tender, and the amount of the security deposit and Performance guarantee to be deposited by the successful tenderer and the percentage, if any, to be deducted from bills. Copies of the specifications, designs and drawings and any other documents required in connection with the work signed for the purpose of identification by the officer inviting tender shall also be open for inspection by the contractor at the office of officer inviting tender during office hours.
2.		In the event of the e-tender being submitted by a firm, it must be digitally signed. Such tender will be treated as signed tender. For physical tender it must be signed separately by each partner thereof or in the event of the absence of any partner, it must be signed on his behalf by a person holding a power of attorney authorizing him to do so, such power of attorney to be produced with the tender, and it must disclose that the firm is duly registered under the Indian Partnership Act, 1952.
2. (A)		In case of the tender submitted by a Joint Venture / Consortium, a copy of joint venture / consortium agreement in the specified proforma defining the lead partner should be submitted. The lead partner shall sign all the documents in respect of the works. The documents signed by any other person or firm other than the lead partner shall not be entertained.
3.		Receipts for payment made on account of work, when executed by a firm, must also be signed by all the partners, except where contractors are described in their tender as a firm, in which case the receipts must be signed in the name of the firm by one of the partners, or by some other person having due authority to give effectual receipts for the firm. Bank details shall be furnished by the firm through an application duly signed by all partners for payment to the firm through bank transfer.
4.	Applicable for item Rate Tender only .	Any person who submits a tender shall fill up the usual printed form, stating at what rate he is willing to undertake each item of the work. Tenderers, which propose any alteration in the work specified in the said form of invitation to tender, or in the time allowed for carrying out the work, or which contain any other conditions of any sort, including conditional rebates, will be summarily rejected. No single tender shall include more than one work, but contractors who wish to tender for two or more works shall submit separate tender for each. Tender shall have the name and number of the works to which they refer, written on the envelopes. The rate(s) must be quoted in decimal coinage. Amount must be quoted in full Rupees by ignoring 50 paise and considering more than 50 paise as Rupee one. In case the lowest tendered amount (worked out on the basis of quoted rate of Individual items) of two or more contractors is same, then such lowest contractors will be asked to submit revised offer quoting rate of each item of the schedule of quantity for all sub sections/sub heads as the case may be, but the revised quoted rate of each item of schedule of quantity for all sub sections/sub heads should not be higher than their respective original rate quoted already at the time of submission of tender. The lowest tender shall be decided on the basis of



		revised offer. If the revised tendered amount (worked out on the basis of quoted rate of individual items) of two or more contractors received in revised offer is again found to be equal, then the lowest tender, among such contractors, shall be decided by draw of lots in the presence of Jt. GM (Engg)/ DGM (Engg)/ AGM (Engg)/ Sr Manager (Engg) in-Charge of major and minor component(s) work and the lowest contractors those have quoted equal amount of their tenders. In case of any such lowest contractor in his revised offer quotes rate of any item more than their respective original rate quoted earlier at the time of submission of tender, then such revised offer shall be treated invalid. Such case of revised offer of the lowest contractor or case of refusal to submit revised offer by the lowest contractor shall be treated as withdrawal of his tender before acceptance and 50% of his earnest money shall be forfeited. In case all the lowest contractors those have same tendered amount (as a result of their quoted rate of individual items), refuse to submit revised offers, then tenders are to be recalled and the contractors who had not submitted the revised offer, or quoting higher revised rate(s) of any item(s) than their respective original rate quoted already at the time of submission of his bid shall not be allowed to participate in the retendering process of the work. Note: Till the time software supports the above provisions, revised offers from tenderers forming the tie shall be obtained and procedure prescribed for “Restricted call of tenders” shall be adopted (for e-tenders).
4. (A)	Applicable for Percentage Rate Tender only.	In case of Percentage Rate Tenders, tenderer shall fill up the usual printed form, stating at what percentage below/above (in figures as well as in words) the total estimated cost given in Schedule of Quantities at Schedule A, he will be willing to execute the work. The tender submitted shall be treated as invalid if; 1. The contractor dose not quote percentage above/below on the total amount of tender or any section/sub head of the tender. 2. The percentage above/below is not quoted in figures & words both on the total amount of tender or any section/sub head of the tender. 3. The percentage quoted above/below is different in figures and words on the total amount of tender or any section/sub head of the tender. Tenders, which propose any alteration in the work specified in the said form of invitation to tender, or in the time allowed for carrying out the work, or which contain any other conditions of any sort including conditional rebates, will be summarily rejected. No single tender shall include more than one work, but contractors who wish to tender for two or more works shall submit separate tender for each. Tender shall have the name and number of the works to which they refer, written on the envelopes. In case the lowest tendered amount (estimated cost + amount worked on the basis of percentage above/below) of two or more bidders is same, such lowest bidders will be asked to submit revised offer in the form of letter mentioning percentage above/ below on estimated cost of tender including all sub sections/sub heads as the case may be, but the revised percentage quoted above/below on tendered cost or on each sub section/ sub head should not be higher than the percentage quoted at the time of submission of tender. The lowest tender shall be decided on the basis of revised offers. In case any of such contractor refuses to submit revised offer, then it shall be treated as withdrawal of his tender before acceptance and 50% of earnest money shall be forfeited. If the revised tendered amount of two more bidders received in revised offer is again found to be equal , the lowest tender, among such bidders, shall be decided by draw of lots in the presence of Jt. GM (Engg)/ DGM (Engg)/ AGM (Engg)/



		Sr.Manager (Engg) in Charge of work & the lowest bidders those who have quoted equal amount of their tenders. In case all the lowest bidders those have quoted same tendered amount, refuse to submit revised offers, then tenders are to be recalled after forfeiting 50% of EMD of each bidder. Bidders, whose earnest money is forfeited because of non submission of revised offer, shall not be allowed to participate in the re tendering process of the work. Note: Till the time software supports the above provisions, revised offers from tenderers forming the tie shall be obtained and procedure prescribed for “Restricted call of tenders” shall be adopted.
4. (B)		In case the lowest tendered amount (estimated cost $\pm$ amount worked on the basis of percentage above/below) of two or more contractor is same, such lowest contractor will be asked to submit sealed revised offer in the form of letter mentioning percentage above/below on estimated cost of tender including all sub section/sub heads as the case may be, but the revised percentage quoted above/below on tendered cost or on each sub section /sub head should not be higher than the percentage quoted at the time of submission of tender. The lowest tender shall be decided on the basis of revised offers. In case any of such contractor refuses to submit revised offer, then it shall be treated as withdrawal of his tender before acceptance and 50% of earnest money shall be forfeited. If the revised tendered amount of two more contractors received in revised offers is again found to be equal, the lowest tender, among such contractor, shall be decided by draw of lots in the presence of Jt.GM(Engg)/DGM (Engg), AGM (Engg)/Sr. Manager (Engg) in Charge of major & minor component(s) of work & the lowest bidders those who have quoted same tendered amount of their tenders. In case all the lowest contractors those have quoted same tendered amount, refuse to submit revised offers, then tenders are to be recalled after forfeiting 50% of EMD of each bidder. Bidders, whose earnest money is forfeited because of non submission of revised offer, shall not be allowed to participate in the re tendering process of the work.
5.		The officer inviting tender or his duly authorized representative, will open tenders in the presence of any intending bidders who may be present at the time, and will enter the amounts of the several tenders in a comparative statement in a suitable form. In the event of a tender being accepted, a receipt for the earnest money shall thereupon be given to the contractor who shall thereupon for the purpose of identification sign copies of the specifications and other documents mentioned in Rule — I. In the event of a tender being rejected, the earnest money shall thereupon be returned to the contractor remitting the same, without any interest.
6.		The officer inviting tenders shall have the right of rejecting all or any of the tenders and will not be bound to accept the lowest or any other tender.
7.		The receipt of an accountant or clerk for any money paid by the bidder towards tender fee will not be considered as any acknowledgement or payment to the officer inviting tender and the bidder shall be responsible for seeing that he procures a receipt signed by the officer inviting tender or a duly authorized cashier.
8.		The memorandum of work tendered for and the schedule of materials to be supplied by the department and their issue rates, shall be filled and completed in the office of the officer inviting tender before the tender form is issued. If a form is issued to an intending bidder without having been so filled in and incomplete, he shall request the officer to have this done before he completes and delivers his tender.



9.		The bidders shall sign a declaration under the officials Secret Act 1923, for maintaining secrecy of the tender documents drawings or other records connected with the work given to them. The unsuccessful bidders shall return all the drawings given to them.
9(A).		Use of correcting fluid any where in tender document is not permitted. Such tender is liable for rejection. If there is any correction it should be cut with a straight line and should be initialed and cello tape to be provided on all the rates quoted in case of physical tenders.
10.	Applicable for Item Rate Tender Only.	In the case of Item Rate Tenders, only rates quoted shall be considered. Any tender containing percentage below / above the rates quoted is liable to be rejected. Rates quoted by the bidder in item rate tender in figures and words shall be accurately filled in so that there is no discrepancy in the rates written in figures and words. However, i. if a discrepancy is found between rates in figures and in words, then the rates which correspond with the amount worked out by the bidder shall unless otherwise proved be taken as correct. ii. If the amount of an item is not worked out by the bidder or it does not correspond with the rates written either in figures or in words, then the rates quoted by the contractor in words shall be taken as correct. iii. Where the rates quoted by the bidder in figures and in words tally, but the amount is not worked out correctly, the rates quoted by the contractor will unless otherwise proved be taken as correct and not the amount. iv. In event no rate has been quoted for any item(s) leaving space blank both in figure(s) and word(s) or cancelled the quoted rate in figure(s), and word(s) but the amount corresponding to the item(s) is worked out by the bidder and added to the grand total, then rate(s) of the items(s) shall be derived from the amount(s) quoted by the contractor against such item(s). v. In event no rate has been quoted for any item(s), leaving space both in figure(s), word(s), and amount blank, it will be presumed that the bidder has included the cost of this/these item(s) in other items and rate for such item(s) will be considered as zero and work will be required to be executed accordingly. vi. Sub Para i to iv above shall not be applicable in case of e-tendering.
	Applicable for percentage rate tender only.	In case of percentage Rate Tenders only percentage quoted shall be considered. Any tender containing item rates is liable to be rejected Percentage quoted by the bidder in percentage rate tender shall be accurately filled in figures and words, so that there is no discrepancy. However, if the bidder has worked out the amount of the tender and if any discrepancy is found in the percentage quoted in words and figures, i. The percentage which corresponds with the amount worked out by the bidder shall, unless otherwise proved, be taken as correct. ii. If the amount of the tender is not worked out by the bidder or it does not correspond with the percentage written either in figures or in words, then the percentage quoted by the bidder in words shall be taken as correct. iii. Where the percentage quoted by the bidder in figures and in words tally but the amount is not worked out correctly, the percentage quoted by the bidder will, unless otherwise proved, be taken as correct and not the amount.
11.		In the case of any tender where unit rate of any item / items appear unrealistic, such tender will be considered as unbalanced and in case the tenderer is unable to provide satisfactory explanation, such a tender is liable to be disqualified and rejected.
12.	Applicable for Item Rate Tender only.	All rates shall be quoted on the tender form. The amount for each item should be worked out and requisite totals given. Special care should be taken to write the rates in figures as well as in words and the amount in figures only, in such a way that interpolation is not possible. The total amount should be written both in



		figures and in words. In case of figures, the word 'Rs' should be written before the figure of rupees and word 'P' after the decimal figures, e.g. 'Rs. 2.15 P' and in case of words, the word 'Rupees' should precede and the word 'Paise' should be written at the end. Unless the rate is in whole rupees and followed by the word 'only' it should invariably be upto two decimal places. While quoting the rate in schedule of quantities, the word 'only' should be written closely following the amount and it should not be written in the next line.
12(A).	Applicable for percentage rate tender only.	In Percentage Rate Tender, the tenderer shall quote percentage below / above (in figures as well as in words) at which he will be willing to execute the work. He shall also work out the total amount of his offer and the same should be written in figures as well as in words in such a way that no interpolation is possible. In case of figures, the word 'Rs' should be written before the figure of rupees and work 'P' after the decimal figures, e.g. 'Rs. 2.15 P' and in case of words, the word 'Rupees' should precede and the word 'Paise' should be written at the end. (quoting of rates in Paise is not applicable in e tenders)
13	Acceptance of abnormally low quoted bid (Capital & Revenue Expenditure Contract)	An Abnormally Low Bid is one in which the Bid price, in combination with other elements of the Bid, appears so low that it raises material concerns as to the capability of the Bidder to perform the contract at the offered price. Processing of such bid shall be as follows: i) The Bid Manager shall seek written clarifications from the lowest Bidder with approval of the tender accepting authority, including detailed price analyses of its Bid price in relation to scope, schedule, resource mobilization, allocation of risks and responsibilities, and any other requirements of the bids document. ii) If, after evaluating the price analyses, the Tender Accepting Authority determines that the Bidder has substantially failed to demonstrate its capability to deliver the contract at the offered price, then the bid/ proposal may be rejected. iii) Such contracts should be closely monitored that final payments in such cases do not abnormally increases due to extra items. Further, there is no abnormal increase in quantities of the item for which contractors have initially quoted very high rates.
13A		In case the contractor does not carry out the work on ALQ bid as per schedule or as per NIT specifications, the Engineer in charge shall issue a letter to the contractor to comply its obligations as per NIT, for ALQ bid. Engineer in-charge shall also give one reminder after 10 days of 1st letter and if contractor still do not start the work on ALQ bid, then bank guarantee i.e. QPBG should be encashed and work should be got executed through another agency at his risk and cost.



14		i. The bidder, whose tender is accepted, will be required to furnish performance guarantee of 5% (Five Percent) of the tendered amount within the period specified in Schedule F. This guarantee shall be in the form of Fixed Deposit Receipts or Guarantee Bonds of any Scheduled Bank but not co-operative or Gramin Bank, in accordance with the prescribed form, provided confirmatory advice is enclosed. ii. The bidder, whose tender is accepted, will also be required to furnish by way of Security Deposit for the fulfillment of his contract, an amount equal to 5% of the contract amount of the work. iii. In works where condition of submission of Performance Guarantee is not applicable, the security deposit @ 10% of the tendered value shall be deducted. iv. The Security deposit (under ii & iii above) will be collected by deductions from the running bills of the contractor at the rates mentioned above and the earnest money deposited at the time of tenders, will be treated as a part of the Security Deposit. v. Security deposit will also be accepted in form of Fixed Deposit Receipts / Guarantee Bonds of any Scheduled Bank but not co-operative or Gramin Bank in accordance with the prescribed form, provided confirmatory advice is enclosed. vi. Additional Performance Security as per Clause 49.
15.		On acceptance of the tender, the name of the accredited representative(s) of the contractor who would be responsible for taking instructions from the Engineer-in-Charge shall be communicated in writing to the Engineer-in-Charge.
16.		1. Rates to be quoted by the parties should be inclusive of all taxes, duties, CESS, fee, royalty charges etc. levied under any statute and Excluding GST for all the items. 2. However GST, as applicable, shall be paid to the contractor, for any taxable supply / services / construction rendered by the agency to AAI, against a valid GST invoice as per terms and conditions of the contract. 3. In case supplies /services / works involve imports; the same should be identified separately. Basic Custom Duty & IGST will be paid directly by AAI by utilizing EPCG license/ Duty Credit Scrip under service Export from India Scheme (SEIS) of Govt. of India.
17.		The contractor/ bidder shall give a list of AAI employees related to him.



18.		The tender for the work shall not be witnessed by a contractor or contractors/ bidders who himself / themselves has / have tendered or who may and has / have tendered for the same work. Failure to observe this condition would render, tenders of the contractors tendering, as well as witnessing the tender, liable to summary rejection.
19.		The tender for composite work includes, in addition to building work, all other works such as sanitary and water supply installations drainage installation, electrical work, horticulture work, roads and paths etc. The tenderer apart from being a registered contractor (B&R) of appropriate class, must associate himself with agencies of appropriate class which are eligible to tender for sanitary and water supply drainage, electrical and horticulture works in the composite tender.
20.		The contractor/ bidder shall submit list of works completed in last 5 years*as well as which are in hand (in progress) in the following format for assessing bidding capacity of the bidders:-

Name of work	Name and particulars of Office where work is being executed	Value of work	Position of works in progress	Remarks
1	2	3	4	5

21		The contractor/bidder shall comply with the provisions of the Apprentices Act 1961, and the rules and orders issued there under from time to time. If he fails to do so, his failure will be a breach of the contract and the Executive Director (Engg.) may in his discretion, without prejudice to any other right or remedy available in law, cancel the contract. The contractor shall also be liable for any pecuniary liability arising on account of any violation by him of the provisions of the said Act.
22		If complete site is available for work, the work shall be completed in the manner specified here in special condition of contract and NIT specifications. Note: In such case para 23 below may be deleted by NIT approving authority
23		If complete site is not available for taking up the work, the same shall be made available in phases. The scope of work covered in each phase, time for completion of work in each phase and methodology of taking over completed work in phased manner has been specified under special conditions of contract. The completion time for each phase shall be applicable as indicated in tender documents. The work shall also be taken over by Engineer In Charge in phases. The warranty for the works executed in each phase shall be applied independently w.e.f. date of completion /taking over of individual phase. Note: In such case para 22 above may be deleted by NIT approving authority



CONDITIONS OF CONTRACT

Definitions:

1.		The contract means the documents forming the tender and acceptance thereof and the formal agreement / agreements executed between the competent authority(s) on behalf of the Chairman, Airports Authority of India and the Contractor, together with the documents referred to therein including these conditions, the specifications, designs, drawings and instructions issued from time to time by the Engineer-in-Charge and all these documents taken together, shall be deemed to form one contract / two contracts and shall be complimentary to one another. Contractor has to sign two agreements, one consisting BOQ for Civil works and another one for SITC and O&M / AMC / AICMC part. Engineer-in charge could be common for both the agreements. Separate invoices for the civil /construction works and SITC / O&M / AICMC / AMC works have to be raised by the agency referring to the respective agreements to facilitate AAI to claim input tax credit on such SITC / O&M / AICMC / AMC works as mentioned in Schedule 'F' para 2(v).
2.		In the contract, the following expressions shall, unless the context otherwise requires, have the meanings, hereby respectively assigned to them :- i. The expression works or work shall, unless there be something either in the subject or context repugnant to such construction, be construed and taken to mean the works by or by virtue of the contract contracted to be executed whether temporary or permanent, and whether original, altered, substituted or additional. ii. The site shall mean the land / or other places on, into or through which work is to be executed under the contract or any adjacent land, path or street through which work is to be executed under the contract or any adjacent land, path or street which may be allotted or used for the purpose of carrying out the contract. iii. The Contractor/tenderer/bidder shall mean the individual, firm or company whether incorporated or not, Joint Venture / Consortium undertaking the works and shall include the legal personal representative of such individual or the persons constituting such firm or company, or the successors of such firm or company and the permitted assignees of such individual, firm or company. iv. The Chairman means the Chairman Airports Authority of India and his Successors. v. The Engineer-in-Charge means the Engineering Officer who shall supervise and be incharge of the work and who shall sign the contract on behalf of the Chairman, Airports Authority of India as mentioned in Schedule 'F' hereunder. vi. AAI or Airports Authority of India shall mean the Chairman Airports Authority of India. vii. The terms Member(Planning) means the head of Department of Engineering, Airports Authority of India. viii. Accepting Authority shall mean the authority mentioned in Schedule 'F'. ix. Excepted Risk are risks due to riots (other than those on account of contractor's employees), war (whether declared or not) invasion, act of foreign enemies, hostilities, civil war, rebellion revolution, insurrection, terrorism, military or usurped power, any acts of Airports Authority of India, damages from aircraft, acts of God, such as earthquake, lightening and unprecedented floods, and other causes over which the contractor has no control and accepted as such by the Accepting Authority or causes solely due to use or occupation by Airports Authority of India of the part of the works in respect of which a certificate of completion has been issued or a cause solely due to Airports Authority of India's faulty design of works. x. Market Rate shall be the rate as decided by the Engineer-in-Charge on the basis of the prevailing cost of materials and labour at the site where the work is to be executed plus the percentage mentioned in Schedule 'F' to cover, all overheads and profits. Provided that no extra overheads and profits shall be payable on the parts of works assigned to other agency(s) by the contractor as per terms of contract.



		xi. Schedule(s) referred to in these conditions shall mean the relevant schedule(s) annexed to the tender papers or the standard Schedule of Rates of the government mentioned in Schedule 'F' hereunder, with the amendments thereto issued upto the date of receipt of the tender. xii. Department means Airports Authority of India, which invites tender on behalf of Chairman, Airports Authority of India. xiii. Tendered value means the value of the entire work as stipulated in the letter of award.
3.	Scope and Performance	Where the context so requires, words imparting the singular only also include the plural and vice versa. Any reference to masculine gender shall whenever required include feminine gender and vice versa.
4.		Headings and Marginal notes to these General Conditions of Contract shall not be deemed to form part thereof or be taken into consideration in the interpretation or construction thereof or of the contract.
5.		The contractor shall be furnished, free of cost one certified copy of the contract documents except standard specifications, Schedule of Rates and such other printed and published documents, together with all drawings as may be forming part of the tender papers. None of these documents shall be used for any purpose other than that of this contract.
6.	Works to be carried out	The work to be carried out under the Contract shall, except as otherwise provided in these conditions, include all labour, materials, tools, plants, equipment and transport which may be required in preparation of and for and in the full and entire execution and completion of the works. The descriptions given in the Schedule of Quantities (Schedule – A) shall, unless otherwise stated, be held to include wastage on materials, carriage and cartage, carrying and return of empties, hoisting, setting, fitting and fixing in position and all other labours necessary in and for the full and entire execution and completion of the work as aforesaid in accordance with good practice and recognized principles.
7.	Sufficiency of Tender	The Contractor shall be deemed to have satisfied himself before tendering as to the correctness and sufficiency of his tender for the works and of the rates and prices quoted in the Schedule of Quantities, which rates and prices shall, except as otherwise provided, cover all his obligations under the Contract and all matters and things necessary for the proper completion and maintenance of the works.
8.	Discrepancies and Adjustment of Errors	The several documents forming the Contract are to be taken as mutually explanatory of one another, detailed drawings being followed in preference to small scale drawing and figured dimensions in preference to scale and special conditions in preference to General Conditions.
8.1		In the case of discrepancy between the Schedule of Quantities, the Specifications and / or the Drawings, the following order of preference shall be observed :-
		i. Description of Schedule of Quantities. ii. Particular/ technical Specification and Special Condition, if any. iii. Drawings. iv. C P W D Specifications. v. Indian Standard Specifications of B I S./ IRC Code of Practice / ASTM standards. vi. Sound Engineering practice as directed by the Engineer-in-charge, whose decision in this regard shall final and binding on the contractor.
8.2		If there are varying or conflicting provisions made in any one document forming part of the contract, the Accepting Authority shall be the deciding authority with regard to the intention of the document and his decision shall be final and binding on the contractor.
8.3		Any error in description, quantity or rate in Schedule of Quantities or any omission therefrom shall not vitiate the Contract or release the Contractor from



		the execution of the whole or any part of the works comprised therein according to drawings and specifications or from any of his obligations under the contract.
8.4	Payment for similar items with different quoted rates in different subheads of the contract agreement	If the contractor has quoted different rates for the same item appearing in two or more subheads, then the lowest of the rates quoted shall only be considered for payments during execution of work. In case of deviation of quantity of such item, payments shall be made at the lowest quoted rate for quantity executed up to the deviation limit specified in the contract. Beyond the deviation limit the rate shall be derived as per relevant contract provision.
9.	Reverse Auction for purchase tenders	AAI may opt for reverse auction in case of purchase tender if value of supplies put to tender is more than Rs.2Cr.
10.	Signing of Contract	The successful tenderer / contractor, on acceptance of his tender by the Accepting Authority, shall, within 15 days from the stipulated date of start of the work, shall sign either single or Two agreements, as the case may be , one consisting BOQ for Civil works and another one for SITC and O&M / AMC / AICMC part.
i)		i. The notice inviting tender, all the documents including drawings, if any, forming the tender as issued at the time of invitation of tender and acceptance thereof together with any correspondence leading thereto. ii. Standard AAI Form as mentioned in Schedule 'F' consisting of: a. Various standard clauses with corrections up to the date stipulated in Schedule 'F' along with annexures thereto. b. AAI Safety Code. c. Model Rules for the protection of health, sanitary arrangements for workers employed by AAI or its contractors. d. AAI Contractor's Labour Regulations. e. List of Acts and omissions for which fines can be imposed. iii. No payment for the work done will be made unless contract in form of agreement is signed by the contractor. iv. The agreement shall be executed on a non-judicial stamp paper (Gujarat) of Rs.300/- (Rupees: - Three Hundred Only) and the cost of stamp paper shall be borne by the contract.



CLAUSES OF CONTRACT

CLAUSE 1

	Performance Guarantee	This clause is applicable for the works for which the estimated cost put to tender is more than Rs.5 crores.
		i. The contractor shall submit an irrevocable Performance Guarantee of 5% (Five percent) of the Tendered amount in addition to other deposits mentioned elsewhere in the contract for his proper performance of the contract agreement, (not withstanding and/or without prejudice to any other provisions in the contract) within period specified in Schedule 'F' from the date of issue of award letter. This guarantee shall be in the form of Insurance Surety Bonds, Account Payee Demand Draft, or Bank Guarantee (including e-Bank Guarantee) from any of the Scheduled Commercial Banks (i.e. Indian or Foreign Banks included in the Second Schedule of Reserve Bank of India Act,1934 excluding Co-Operative/Regional Rural Banks) in accordance with the form annexed hereto. (Appendix-XI).
		ii Performance guarantee should be furnished within 30 days of issue of award letter. In case the contractor fails to deposit performance guarantee within the stipulated period, no payment will be released to the contractor for the work done in respect of 1 st running account bill. Moreover, interest @10% per annum on performance guarantee amount would be levied (non-refundable) for delayed period of submission.
		iii. The Performance Guarantee shall be initially valid upto the stipulated date of completion plus 180 days beyond that. In case the time for completion of work gets enlarged, the contractor shall get the validity of Performance Guarantee extended to cover such enlarged time for completion of work. After recording of the completion certificate for the work by the competent authority, the performance guarantee shall be returned to the contractor, without any interest. However, in case of contracts involving maintenance of buildings and services / any other work thereafter, 50% of Performance Guarantee shall be retained as Security Deposit as per contract conditions. The same shall be returned on successful completion of commitment year wise proportionately.
		iv. The Engineer-in-Charge shall not make a claim under the performance guarantee except for amounts to which the AAI is entitled under the contract (not withstanding and/or without prejudice to any other provisions in the contract agreement) in the event of: - Failure by the contractor to extend the validity of the Performance Guarantee as described herein above, in which event the Engineer-in-Charge may claim the full amount of the Performance Guarantee. - Failure by the contractor to pay the Chairman, AAI any amount due, either as agreed by the contractor or determined under any of the Clauses/Conditions of the agreement, within 30 days of the service of notice to this effect by Engineer-in-Charge.
		v. In the event of the contract being determined or rescinded under provision of any of the Clause/Condition of the agreement, the performance guarantee shall stand forfeited in full and shall be absolutely at the disposal of the Chairman, AAI.



CLAUSE 1 A

	Recovery of Security Deposit	The person/persons whose tender(s) may be accepted (hereinafter called the contractor) shall permit AAI at the time of making any payment to him for work done under the contract to deduct a sum at the rate of 5% of the gross amount of each running and final bill till the sum deducted will amount to security deposit of 5% of the tendered value of the work. Such deductions will be made and held by AAI by way of Security Deposit unless he/they has/have deposited the amount of Security at the rate mentioned above in the form of Bank Guarantee (including e-Bank Guarantee) from any of the Commercial Bank (i.e. Indian or Foreign Banks included in the Second Schedule of Reserve Bank of India Act,1934 excluding Co-Operative/Regional Rural Banks). In case a Guarantee Bonds of any Bank is furnished by the contractor to the AAI as part of the security deposit and the Bank is unable to make payment against the said Guarantee Bond, the loss caused thereby shall fall on the contractor and the contractor shall forthwith on demand furnish additional security to the AAI to make good the deficit. In works where condition of submission of performance guarantee is not applicable, the security deposit at the rate of 10% (Ten Percent) of gross amount of each running bill shall be deducted instead of 5%, till the sum will amount to security deposit of 10% of the contract value of work. Other conditions shall remain same as stated above. All compensations or the other sums of money payable by the contractor under the terms of this contract may be deducted from, or paid by the sale of a sufficient part of his security deposit or from the interest arising therefrom, or from any sums which may be due to or may become due to the contractor by AAI on any account whatsoever and in the event of his Security Deposit being reduced by reason of any such deductions or sale as aforesaid, the contractor shall within 10 days make good in Fixed Deposit Receipt, Insurance Surety Bonds, Account Payee Demand Draft or Bank Guarantee from any of the Commercial Bank (if deposited for more than 12 months) endorsed in favour of the Airports Authority of India, any sum or sums which may have been deducted from, or raised by sale of his security deposit or any part thereof. The security deposit shall be collected from the running bills and the final bill of the contractor at the rates mentioned above. The security deposit as deducted above can be released against Bank Guarantee issued by any Commercial Bank (i.e. Indian or Foreign Banks included in the Second Schedule of Reserve Bank of India Act,1934 excluding Co-Operative /Regional Rural Banks), on its accumulations to a minimum of Rs.5 lakh to the condition amount of such bank guarantee, except last one, shall not be less than Rs.5 lakh. Note 1: Provided further that the validity of Bank Guarantee shall be in conformity with provisions contained in the clause 17 which shall be extended from time to time depending upon extension of contract under provision of Clause 2 & Clause 5. Note 2: Note 1 above shall be applicable for both clause 1 and 1 A.
--	-------------------------------------	--



Clause 2

Clause 2	<table><tr><td rowspan="2">Compensation for Delay</td><td colspan="2">If the contractor fails to maintain the required progress in terms of clause 5 or to complete the Work and clear the site on or before the contract or justified extended date of completion as per clause 5(excluding any extension under clause 5.5) as well as any extension granted under clause 12 and 15, he shall, without prejudice to any other right or remedy available under the law to the AAI on account of such breach, pay as compensation the amount calculated at the rates stipulated below as the authority specified in schedule ‘F’ may decide on the amount of Tendered Value of the work for every completed day/month (as determined) that the progress remains below that specified in Clause 5 or that the work remains incomplete. This will also apply to items or group of items for which a separate period of completion has been specified.</td></tr><tr><td>i) Compensation for delay of work</td><td> If the completion of work is delayed due to reasons attributed to contractor, AAI shall be entitled for compensation for delay as detailed below : <u>i.</u> For works costing upto Rs. 10.00 Lac: 1.0% (one percent) of tendered value per week of delay or lesser amount as decided by the competent authority subject to a maximum of 10% of contract value. ii For the works costing more than Rs.10.Lac a. For the works having completion period less than 2 years 0.5% (half percent) of tendered value per week of delay or lesser amount as decided by the competent authority subject to a maximum of 10% of the tendered value. </td></tr></table>	Compensation for Delay	If the contractor fails to maintain the required progress in terms of clause 5 or to complete the Work and clear the site on or before the contract or justified extended date of completion as per clause 5(excluding any extension under clause 5.5) as well as any extension granted under clause 12 and 15, he shall, without prejudice to any other right or remedy available under the law to the AAI on account of such breach, pay as compensation the amount calculated at the rates stipulated below as the authority specified in schedule ‘F’ may decide on the amount of Tendered Value of the work for every completed day/month (as determined) that the progress remains below that specified in Clause 5 or that the work remains incomplete. This will also apply to items or group of items for which a separate period of completion has been specified.		i) Compensation for delay of work	If the completion of work is delayed due to reasons attributed to contractor, AAI shall be entitled for compensation for delay as detailed below : <u>i.</u> For works costing upto Rs. 10.00 Lac: 1.0% (one percent) of tendered value per week of delay or lesser amount as decided by the competent authority subject to a maximum of 10% of contract value. ii For the works costing more than Rs.10.Lac a. For the works having completion period less than 2 years 0.5% (half percent) of tendered value per week of delay or lesser amount as decided by the competent authority subject to a maximum of 10% of the tendered value.
Compensation for Delay	If the contractor fails to maintain the required progress in terms of clause 5 or to complete the Work and clear the site on or before the contract or justified extended date of completion as per clause 5(excluding any extension under clause 5.5) as well as any extension granted under clause 12 and 15, he shall, without prejudice to any other right or remedy available under the law to the AAI on account of such breach, pay as compensation the amount calculated at the rates stipulated below as the authority specified in schedule ‘F’ may decide on the amount of Tendered Value of the work for every completed day/month (as determined) that the progress remains below that specified in Clause 5 or that the work remains incomplete. This will also apply to items or group of items for which a separate period of completion has been specified.					
	i) Compensation for delay of work	If the completion of work is delayed due to reasons attributed to contractor, AAI shall be entitled for compensation for delay as detailed below : <u>i.</u> For works costing upto Rs. 10.00 Lac: 1.0% (one percent) of tendered value per week of delay or lesser amount as decided by the competent authority subject to a maximum of 10% of contract value. ii For the works costing more than Rs.10.Lac a. For the works having completion period less than 2 years 0.5% (half percent) of tendered value per week of delay or lesser amount as decided by the competent authority subject to a maximum of 10% of the tendered value.				
		Provided always that the total amount of compensation for delay to be paid under this condition shall not exceed 10% of the Tendered Value of work or of the Tendered Value of the Sectional part of work as mentioned in schedule ‘F’ for which a separate period of completion is originally given. In case no compensation has been decided by the authority in Schedule ‘F’ during the progress of work, this shall be no waiver of right to levy compensation by the said authority if the work remains incomplete on final justified extended date of completion. If the Engineer in Charge decides to give further extension of time allowing performance of work beyond the justified extended date, the contractor shall be liable to pay compensation for such extended period. If any variation in amount of contract takes place during such extended period beyond justified extended date and the contractor becomes entitled to additional time under clause 12, the net period for such variation shall be accounted for while deciding the period for levy of compensation. However, during such further extended period beyond the justified extended period, if any delay occurs by events under sub clause 5.2, the contractor shall be liable to pay compensation for such delay. Provided that compensation during the progress of work beyond the justified extended date of completion for delay under this clause shall be for non-achievement of sectional completion or part handing over of work on stipulated/justified extended date for such part work or if delay affects any other works/services. This is without prejudice to right of action by Engineer-in-Charge under clause 3 for delay in performance and claim of compensation under that clause.				



		In case action under clause 2 has not been finalized and the work has been determined under clause 3, the right of action under this clause shall remain post determination of contract but levy of compensation shall be for days the progress is behind the schedule on date of determination, as assessed by the authority in schedule 'F', after due consideration of justified extension. The compensation for delay, if not decided before the determination of contract, shall be decided after of determination of contract. The amount of compensation may be adjusted or set-off against any sum payable to the Contractor under this or any other contract with AAI. In case, the contractor does not achieve a particular milestone mentioned in schedule F, or the re-scheduled milestone(s) in terms of Clause 5.4, the amount shown against that milestone shall be withheld, to be adjusted against the compensation levied as above. With-holding of this amount on failure to achieve a milestone, shall be automatic without any notice to the contractor. However, if the contractor catches up with the progress of work on the subsequent milestone(s), the withheld amount shall be released. In case the contractor fails to make up for the delay in subsequent milestone(s), amount mentioned against each milestone missed subsequently also shall be withheld. However, no interest, whatsoever, shall be payable on such withheld amount.
--	--	--

Clause 2A

	Incentive for early completion	In case, the contractor completes the work ahead of stipulated date of completion so provided in 'Schedule F', a bonus @ 1 % (one per cent) of the tendered value per month computed on per day basis, shall be payable to the contractor, subject to a maximum limit of 5% (five per cent) of the tendered value. The amount of bonus, if payable, shall be paid along with final bill after completion of work. Bonus/ Incentive shall be applicable for the contract completed before stipulated dated of completion and shall not be applicable for the contract extended beyond the stipulated period even with justified hindrance and without any action of compensation for delay. This clause shall not be applicable for the works which estimated cost put to tender is less than Rs. 50.00 Cr.
--	---------------------------------------	--

Clause 2B

	Release of withheld amount against compensation for delay.	Withheld amount towards compensation for delay over and above Rs. 50.00 lacs, can be released against Bank Guarantee (on the format given at Appendix 1) or in the form of fixed deposit receipts or guarantee bonds of any Scheduled Bank but not Co-operative or Gramin Bank, pending finalization of case of extension of time by competent authority as per delegation of powers. Concerned Executive Director (Engg) will authorize such action on receipt of proposal from the Engineer In Charge through proper channel.
--	---	---

Clause 3

	When Contract can be Determined	Subject to other provisions contained in this clause, the Engineer-in-Charge may, without prejudice to his any other rights or remedy against the contractor in respect of any delay, inferior workmanship, any claims for damages and/or any other provisions of this contract or otherwise, and whether the date of completion has or has not elapsed, by notice in writing absolutely determine the contract in any of the following cases:
--	--	---



	i. If the contractor having been given a notice by the Engineer-in-Charge in writing to rectify, reconstruct or replace any defective work or that the work is being performed in an inefficient or otherwise improper or un-workman like manner shall omit to comply with the requirement of such notice for a period of seven days thereafter. ii. If the contractor has, without reasonable cause, suspended the progress of the work or has failed to proceed with the work with due diligence and continues to do so after a notice in writing of seven days from the Engineer- in-Charge. iii. If the contractor fails to complete the work or section of work with individual date of completion on or before the stipulated or justified extended date on or before such date of completion, and the Engineer in Charge without any prejudice to any other right or remedy under any other provision in the contract has given further reasonable time in a notice given in writing in that behalf as either mutually agreed or in absence of such mutual agreement by his own assessment making such time essence of contract and in the opinion of Engineer in Charge, the contractor will be unable to complete the same or does not complete the same within the period specified. iv. If the contractor persistently neglects to carry out his obligations under the contract and / or commits default in complying with any of the terms and conditions of the contract and does not remedy it or take effective steps to remedy it within 7 days after a notice in writing is given to him in that behalf by the Engineer-in-Charge. v. If the contractor shall offer or give or agree to give to any person in AAI service or to any other person on his behalf any gift or consideration of any kind as an inducement or reward for doing or forbearing to do or for having done or forborne to do any act in relation to the obtaining or execution of this or any other contract for AAI. vi. If the contractor shall enter into a contract with Airports Authority of India in connection with which commission has been paid or agreed to be paid by him or to his knowledge, unless the particulars of any such commission and the terms of payment thereof have been previously disclosed in writing to the Engineer-in-charge. vii. If the contractor shall obtain a contract with AAI as a result of wrong tendering or other non-bonafide methods of competitive tendering or commits any breach of Integrity Pact. viii. If the contractor being an individual, or if a firm, any partner thereof shall at any time be adjudged insolvent or have a receiving order or order for administration of his estate made against him or shall take any proceedings for liquidation or composition (other than a voluntary liquidation for the purpose of amalgamation or reconstruction) under any Insolvency Act for the time being in force or make any conveyance or assignment of his effects or composition or arrangement for the benefit of his creditors or purport so to do, or if any application be made under any Insolvency Act for the time being in force for the sequestration of his estate or if a trust deed be executed by him for benefit of his creditors. ix. If the contractor being a company shall pass a resolution or the court shall make an order that the company shall be wound up or if a receiver or a manager on behalf of a creditor shall be appointed or if circumstances shall arise which entitle the court or the creditor to appoint a receiver or a manager or which entitle the court to make a winding up order. x. If the contractor shall suffer an execution being levied on his goods and allow it to be continued for a period of 21 days.
--	---



		xi. If the contractor assigns (excluding part(s) of work assigned to other agency(s) by the contractor as per terms of contract), transfers, sublets (engagement of labour on a piece-work basis or of labour with materials not to be incorporated in the work, shall not be deemed to be subletting) or otherwise parts with or attempts to assign, transfer, sublet or otherwise parts with the entire works or any portion thereof without the prior written approval of the Engineer-in-Charge. When the contractor has made himself liable for action under any of the cases aforesaid, the Engineer-in-Charge on behalf of the Chairman, AAI shall have powers : a. To determine the contract as aforesaid so far as performance of work by the Contractor of work is concerned (of which determination notice in writing to the contractor under the hand of the Engineer-in-Charge shall be conclusive evidence). Upon such determination, the Earnest Money Deposit, Security Deposit already recovered and Performance Guarantee under the contract shall be liable to be forfeited and shall be absolutely at the disposal of the AAI. b. After giving notice to the contractor to measure up the work of the contractor and to take such whole, or the balance or part thereof, as shall be un-executed out of his hands and to give it to another contractor or any other means to complete the work. The contractor, whose contract is determined as above, shall not be allowed to participate in the tendering process for the balance work. In the event of above courses being adopted by the Engineer-in-Charge, the contractor shall have no claim to compensation for any loss sustained by him by reasons of his having purchased or procured any materials or entered into any engagements or made any advances on account or with a view to the execution of the work or the performance of the contract. And in case action is taken under any of the provision aforesaid, the contractor shall not be entitled to recover or be paid any sum for any work thereof or actually performed under this contract unless and until the Engineer-in-Charge has certified in writing the performance of such work and the value payable in respect thereof and he shall only be entitled to be paid the value so certified.
--	--	--

CLAUSE 3 A

		In case, the work cannot be started due to reasons not within the control of the contractor within 1/8th of the stipulated time for completion of work or one month whichever is higher, either party may close the contract by giving notice to the other party stating the reasons. In such eventuality, the Earnest Money Deposit and the Performance Guarantee of the contractor shall be refunded within 30 days. Neither party shall claim any compensation for such eventuality. This clause is not applicable for any breach of the contract by either party.
--	--	---

CLAUSE 3 B

	Debarment of Contractor	(i) Contractor may be debarred if it is determined under breached the Integrity Pact of clause 41(a) and Code of Integrity of clause 41(b). (ii) Contractor can also be debarred for the reasons like supply of sub-standard material, non-supply of material, abandonment of work, sub-standard quality of work, poor/ unsatisfactory performance. (iii) The period of debarment shall be upto two years.
--	--------------------------------	---



CLAUSE 4

	Contractor liable to pay compensation even if action not taken under Clause-3	In any case in which any of the powers conferred upon the Engineer-in-Charge by Clause-3 thereof, shall have become exercisable and the same are not exercised, the non-exercise thereof shall not constitute a waiver of any of the conditions hereof and such powers shall notwithstanding be exercisable in the event of any future case of default by the contractor and the liability of the contractor for compensation shall remain unaffected. In the event of the Engineer-in-Charge putting in force all or any of the powers vested in him under the preceding clause he may, if he so desires after giving a notice in writing to the contractor, take possession of (or at the sole discretion of the Engineer-in-Charge which shall be final and binding on the contractor) use as on hire (the amount of the hire money being also in the final determination of the Engineer-in-Charge) all or any tools, plant, materials and stores, in or upon the works, or the site thereof belonging to the contractor, or procured by the contractor and intended to be used for the execution of the work/ or any part thereof, paying or allowing for the same in account at the contract rates, or, in the case of these not being applicable, at current market rates to be certified by the Engineer-in-Charge, whose certificate thereof shall be final, and binding on the contractor, clerk of the works, foreman or other authorized agent to remove such tools, plant, materials, or stores from the premises (within a time to be specified in such notice) in the event of the contractor failing to comply with any such requisition, the Engineer-in-Charge may remove them at the contractor's expense or sell them by auction or private sale on account of the contractor and his risk in all respects and the certificate of the Engineer-in-Charge as to the expenses of any such removal and the amount of the proceeds and expenses of any such sale shall be final and conclusive against the contractor.
--	--	--

CLAUSE 5

	Time and Extension for Delay	The time allowed for execution of the Works as specified in the Schedule 'F' or the extended time in accordance with these conditions shall be the essence of the Contract. The execution of the works shall commence from such time period as mentioned in schedule 'F' or from the date of handing over of the site whichever is later. If the Contractor commits default in commencing the execution of the work as aforesaid, AAI shall without prejudice to any other right or remedy available in law, be at liberty to forfeit the earnest money & performance guarantee absolutely.
5.1		After the Contract is awarded, within 15 days, the Contractor shall submit a Time and Progress Chart for each mile stone and get it approved by the Engineer-in-charge. The Chart shall be prepared in direct relation to the time stated in the Contract documents for completion of items of the works. It shall indicate the forecast of the dates of commencement and completion of various trades of sections of the work and may be amended as necessary by agreement between the Engineer-in-Charge and the Contractor within the limitations of time imposed in the contract documents, and further to ensure good progress during the execution of the work, the contractor shall in all cases in which the time allowed for any work, exceeds one month (save for special jobs for which a separate programme has been agreed upon) complete the work as per mile stones given in Schedule 'F'. Project Management shall be done: a. For works costing upto Rs. 5.00 Cr. — CPM/ PERT Chart



		b. Works costing more than Rs. 5.00 Cr. — By using Project Management Software like Primavera / MS Project or any other software with the approval of Engineer in charge. c. Contractor shall submit monthly progress reports (2 copies) highlighting status of various activities and physical completion of work. PROGRAMME CHART i. The Contractor shall prepare an integrated programme chart in Project Management Software for the execution of work, showing clearly all activities from the start of work to completion, with details of manpower, equipment and machinery required for the fulfillment of the programme within the stipulated period or earlier and submit the same for approval to the Engineer in Charge within fifteen days of award of the contract. A recovery of Rs. 2500/- (for works costing up to Rs. 5.00 Crores) / Rs. 5000/- (for works costing more than Rs. 5.00 Crores) shall be made on per day basis in case of delay in submission of the above programme. ii. The programme chart should include the following: a. Descriptive note explaining sequence of the various activities. b. Network (PERT / CPM / BAR CHART). c. Programme for procurement of materials by the contractor. Programme for deployment of machinery / equipment's having adequate capacity, commensurate with the quantum of work to be done within the stipulated period, by the contractor. In addition to above, to achieve the progress of work as per programme, the contractor must bring at site adequate shuttering material required for cement concrete and R.C.C. works etc. for three floors within one month from the date of start of work till the completion of RCC work as per requirement of work. The contractor shall submit shuttering schedule adequate to complete structure work within laid down physical milestone. iii. If at any time, it appears to the Engineer in Charge that the actual progress of work does not conform to the approved programme referred above or after rescheduling of milestones, the contractor shall produce a revised programme within 7 (seven) days, showing the modifications to the approved programme to ensure timely completion of the work. The modified schedule of programme shall be approved by the Engineer in Charge. A recovery of Rs. 2500/- (for works costing upto Rs.5.00 Crores) / Rs. 5000/- (for works costing more than Rs.5.00 Crores) shall be made on per day basis in case of delay in submission of the modified programme. iv. The submission for approval by the Engineer in Charge of such programme or such particulars shall not relieve the contractor of any of the duties or responsibilities under the contract. This is without prejudice to the right of Engineer in Charge to take action against the contractor as per terms and conditions of the agreement. v. The contractor shall submit the progress report using MS Project/Primavera software with base line programme referred above for the work done during previous month to the Engineer in charge on or before 5th day of each month failing which a recovery Rs. 2500/- (for works costing up to Rs.5.00 Crores) / Rs. 5000/- (for works costing more than Rs.5.00 Crores) shall be made on per day basis in case of delay in submission of the monthly progress report.
--	--	---



5.2		If the work(s) be delayed by:- i. Force majeure, or an act of terrorism ii. Abnormally bad weather, or iii. Serious loss or damage by fire, or iv. Civil commotion, local commotion of workmen, strike or lockout, affecting any of the trades employed on the work, or v. Delay on the part of other contractors or tradesmen engaged by Engineer- in-Charge for executing work not forming part of the Contract, or vi. Non-availability of stores, which are the responsibility of AAI to supply or vii. Non-availability or break down of tools and Plant to be supplied or supplied by AAI or viii. Any other cause which, in the absolute discretion of the Engineer-in-Charge is beyond the Contractor's control. then upon the happening of any such event causing delay, the contractor shall immediately give notice thereof in writing to the Engineer-in-Charge but shall nevertheless use constantly his best endeavors to prevent or make good the delay and shall do all that may be reasonably required to the satisfaction of the Engineer-in-charge to proceed with the works. All correspondence with the agency and concerned stakeholders during execution of works will be taken into consideration for evaluation of hindrances causing delay, for grant of extension of time by the Competent Authority.
5.3		Request for rescheduling of Milestones and extension of time, to be eligible for consideration, shall be made by the contractor in writing within fourteen days of the happening of the event causing delay on the prescribed form to the authority indicated in schedule 'F'. The contractor may also, if practicable, indicate in such a request the period for which extension is desired.
5.4		In any such case the Engineer-in-Charge with the approval of authority indicated in Schedule 'F' may give a fair and reasonable extension of time and reschedule the Milestones for completion of work. Such extension or re- scheduling of the milestone shall be communicated to the contractor by the Engineer-in-charge in writing, within 1 month or 4 weeks of the date of receipt of such request respectively. Non-application by the contractor for extension of time/ re-scheduling of milestones shall not be a bar for giving a fair and reasonable extension / re-scheduling of milestones by the Engineer-in-charge with the approval of authority indicated in schedule 'F' and this shall be binding on the contractor.

CLAUSE 6

	Measurements of Work Done	Engineer in charge shall, except as otherwise provided, ascertain and determine by measurement, the value in accordance with the contract of work done. All measurement of all items having financial value shall be entered in Measurement Book and/or level field book so that a complete record is obtained of all works performed under the contract. All measurements and levels shall be taken jointly by the Engineer in Charge or his authorised representative and by the contractor or his authorised representative from time to time during the progress of the work and such measurements shall be signed and dated by the Engineer-in-Charge and the contractor or their representatives in token of their acceptance. If the contractor objects to any of the measurements recorded, a note shall be made to that effect with reason and signed by both the parties. If for any reason the contractor or his authorised representative is not available and the work of recording measurements is suspended by the Engineer-in- Charge
--	---	---



		or his representative, the Engineer in Charge and the Department shall not entertain any claim from contractor for any loss or damages on this account. If the contractor or his authorised representative does not remain present at the time of such measurements after the contractor or his authorised representative has been given a notice in writing three (3) days in advance or fails to countersign or to record objection within a week from the date of the measurement, then such measurements recorded in his absence by the Engineer in Charge or his representative shall be deemed to be accepted by the Contractor. The contractor shall, without extra charge, provide all assistance with every appliance, labour and other things necessary for measurements and recording levels. Except where any general or detailed description of the work expressly shows to the contrary, measurements shall be taken in accordance with the procedure set forth in the specifications notwithstanding any provision in the relevant Standard Method of measurement or any general or local custom. In the case of items which are not covered by specifications, measurements shall be taken in accordance with the relevant standard method of measurement issued by the Bureau of Indian Standards and if for any item no such standard is available, then a mutually agreed method shall be followed. The contractor shall give, not less than seven days' notice to the Engineer-in-Charge or his authorised Representative of the work, before covering up or otherwise placing beyond the reach of measurement any work in order that the same may be measured and correct dimensions thereof be taken before the same is covered up or placed beyond the reach of measurement and shall not cover up and place beyond reach of measurement any work without consent in writing of the Engineer in Charge or his authorised representative of the work who shall within the aforesaid period of seven days inspect the work, and if any work shall be covered up or placed beyond the reach of measurements without such notice having been given or the Engineer-in-Charge's consent being obtained in writing, the same shall be uncovered at the Contractor's expense, or in default thereof no payment or allowance shall be made for such work or the materials with which the same was executed. Engineer-in-Charge or his authorised representative may cause either themselves or through another officer of the department to check the measurements recorded jointly or otherwise as aforesaid and all provisions stipulated herein above shall be applicable to such checking of measurements or levels. It is also a term of this contract that recording of measurements of any item of work in the measurement book and/or its payment in the interim, on account or final bill shall not be considered as conclusive evidence as to the sufficiency of any work or material to which it relates nor shall it relieve the contractor from liabilities from any over measurement or defects noticed till completion of the defects liability period.
--	--	---

Clause 6 A

	Computerized Measurement Book	Computerized measurement is mandatory for works costing more than Rs 5.00 Lacs. However in case of works costing lesser than Rs. 5.00 Lacs Engineer-in-Charge may decide for adopting computerized measurement if required, except as otherwise provided, ascertain and determine by measurement the value of work done in accordance with the contract. All measurements of all items having financial value shall be entered by the contractor and compiled in the shape of the Computerized Measurement Book having pages of A-4 size as per the format of the department so that a complete record is obtained of all the items of works performed under the contract.
--	--------------------------------------	--



	All such measurements and levels recorded by the contractor or his authorised representative from time to time, during the progress of the work, shall be got checked by the contractor from the Engineer-in-Charge or his authorised representative as per interval or program fixed in consultation with Engineer-in-Charge or his authorised representative. After the necessary corrections made by the Engineer-in- Charge, the measurement sheets shall be returned to the contractor for incorporating the corrections and for resubmission to the Engineer-in-Charge for the dated signatures by the Engineer-in-Charge and the contractor or their representatives in token of their acceptance. Whenever bill is due for payment, the contractor would initially submit draft computerized measurement sheets and these measurements would be got checked/test checked <i>from</i> the Engineer-in-Charge and/or his authorized representative. The contractor will, thereafter, incorporate such changes as may be done during these checks/test checks in his draft computerized measurements, and submit to the department a computerized measurement book, duly bound, and with its pages machine numbered. The Engineer-in-Charge and/or his authorised representative would thereafter check this MB, and record the necessary certificates for their checks/test checks. The final, fair, computerized measurement book given by the contractor, duly bound, with its pages machine numbered, should be 100% correct, and no cutting or overwriting in the measurements would thereafter be allowed. If at all any error is noticed, the contractor shall have to submit a fresh computerized MB with its pages duly machine numbered and bound, after getting the earlier MB cancelled by the department. Thereafter, the MB shall be taken in the records of Engineer-in-charge, and allotted a number as per the Register of Computerized MBs. This should be done before the corresponding bill is submitted to the Engineer-in-charge for payment. The contractor shall submit two spare copies of such computerized MB's for the purpose of reference and record by the various officers of the department. The contractor shall also submit to the department separately his computerized Abstract of Cost and the bill based on these measurements, duly bound, and its pages machine numbered along with two spare copies of the "bill. Thereafter, this bill will be processed by the Engineer-in-charge and allotted a number as per the computerized record in the same way as done for the measurement book meant for measurements. The contractor shall, without extra charge, provide all assistance with every appliance, labour and other things necessary for checking of measurements / levels by the Engineer-in-charge or his representative. Except where any general or detailed description of the work expressly shows to the contrary, measurements shall be taken in accordance with the procedure set forth in the specifications notwithstanding any provision in the relevant Standard Method of measurement or any general of local custom. In the case of item which are not covered by specifications, measurements shall be taken in accordance with the relevant standard method of measurement issued by the Bureau of Indian Standards and if for any item no such standard is available then a mutually agreed method shall be followed. The contractor shall give not less than seven days' notice to the Engineer-in-Charge or his authorized representative of the work before covering up or otherwise placing beyond the reach of checking and / or test checking the measurement of any work in order that the same be checked and / or test checked and correct dimensions thereof be taken before the same is covered up or placed beyond the reach of checking and / or test checking measurement and shall not cover up and place beyond reach of measurement any work without
--	--



		consent in writing of the Engineer-in-charge or his authorized representative of the work who shall within the aforesaid period of seven days inspect the work, and if any work shall be covered up or placed beyond the reach of checking and / or test checking measurements without such notice having been given or the Engineer-in charge's consent being obtained in writing the same shall be uncovered at the contractor's expense, or in default thereof no payment or allowance shall be made for such work or the materials with which the same was executed.
		Engineer-in-charge or his authorised representative may cause either themselves or through another officer of the department to check the measurements recorded by contractor and all provisions stipulated herein above shall be applicable to such checking of measurements or levels. It is also a term of this contract that checking and/or test checking the measurements of any item of work in the measurement book and/or its payment in the interim, on account of final bill shall not be considered as conclusive evidence as to the sufficiency of any work or material to which it relates nor shall it relieve the contractor from liabilities from any over measurement or defects noticed till completion of the defects liability period.

CLAUSE 7

	Payment on Intermediate Certificate to be regarded as Advances	No payment shall be made for work, estimated to cost Rs. One lac or less till after the whole of the work shall have been completed and certificate of completion given. For works estimated to cost over Rs. One lac, the interim or running account bills shall be submitted by the contractor for the work executed on the basis of such recorded measurements in the format of the Department in triplicate on or before the date of every month fixed for the same by the Engineer-in-Charge. The contractor shall not be entitled to be paid any such interim payment if the gross work done together with net payment/ adjustment of advances for material collected, if any, since the last such payment is less than the amount specified in Schedule 'F', in which case the interim bill shall be prepared on the appointed date of the month after the requisite progress is achieved. Engineer-in-Charge shall arrange to have the bill verified by taking or causing to be taken, where necessary, the requisite measurements of the work. In the event of the failure of the contractor to submit the bills, Engineer-in- Charge shall prepare or cause to be prepared such bills in which event no claims whatsoever due to delays on payment including that of interest shall be payable to the contractor. Payment on account of amount admissible shall be made by the Engineer-in-Charge certifying the sum to which the contractor is considered entitled by way of interim payment at such rates as decided by the Engineer-in- Charge. An amount of ad-hoc payment not less than 75% of the net amount of the bill under check, shall be made within 10 working days of submission of the bill by the Contractor to the Engineer-in-Charge or his Authorized Engineer together with the account of the material issued by the department, or dismantled materials, if any. The remaining payment is also to be made after final checking of the bill within 28 working days of submission of bill by the contractor. In case of delay in payment of intermediate bills after 30 days of submission of bill by the contractor, provided the bill submitted by the contractor found to be in order, a simple interest @ prevailing rate of interest of General Provident Fund shall be paid to the contractor from the date of expiry of prescribed time limit. All such interim payments shall be regarded as payment by way of advances against final payment only and shall not preclude the requiring of bad, unsound and imperfect or unskilled work to be rejected, removed, taken away and reconstructed or re-erected. Any certificate given by the Engineer-in-charge
--	---	--



		relating to the work done or materials delivered forming part of such payment, may be modified or corrected by any subsequent such certificate(s) or by the final certificate and shall not by itself be conclusive evidence that any work or materials to which it relates is in accordance with the contract and specifications. Any such interim payment, or any part thereof shall not in any respect conclude, determine or affect in any way powers of the Engineer-in-charge under the contract or any of such payments be treated as final settlement and adjustment of accounts or in any way vary or affect the contract. Pending consideration or extension of date of completion, interim payments shall continue to be made as herein provided without prejudice to the right of the department to take action under the terms of this contract for delay in the completion of work, if the extension of date of completion is not granted by the competent authority. The Engineer-in-Charge in his sole discretion on the basis of a certificate from the Asstt Manager / Manager (Engg) to the effect that the work has been completed up to the level in question make interim advance payments without detailed measurements for work done (other than foundations, items to be covered under finishing items) up to lintel level (including sunshade etc.) and slab level, for each floor working out at 75% of the assessed value. The advance payments so allowed shall be adjusted in the subsequent interim bill(s) to be submitted by the contractor within 10 days of the interim payment. In case of delay in submission of bill by the contractor a simple interest @ 10% (percent) per annum on the advance payment made shall be paid to the AAI from the date of expiry of prescribed 10 days.
	Clause-7A	No Running Account Bill shall be paid for the work till the applicable labour licenses, registration with EPFO, ESIC and BOCW Welfare Board, whatever applicable are submitted by the contractor to the Engineer-in-Charge

CLAUSE 8

	Completion Certificate and Completion Plans	Within ten days of the completion of the work, the contractor shall give notice of such completion to the Engineer-in-Charge and within thirty days of the receipt of such notice, the Engineer-in-Charge shall inspect the work and if there is no defect in the work, shall furnish the contractor with a final certificate of completion, otherwise a provisional certificate of physical completion indicating defects (a) to be rectified by the contractor and/or (b) for which payment will be made at reduced rates, shall be issued. But no final certificate of completion shall be issued, nor shall the work be considered to be complete for 'Civil Construction Works' until the contractor shall have removed from the premises on which the work shall be executed all scaffolding, surplus materials, rubbish and all huts and sanitary arrangements required for his/their work people on the site in connection with the execution of the works as shall have been erected or constructed by the contractor(s) and cleaned off the dirt from all wood work, doors, windows, walls, floor or other parts of the building, in, upon, or about which the work is to be executed or of which he may have had possession for the purpose of the execution; thereof, and not until the work shall have been measured by the Engineer-in-charge. If the contractor shall fail to comply with the requirements of this Clause as to removal of scaffolding, surplus materials and rubbish and all huts and sanitary arrangement as aforesaid and cleaning off dirt on or before the date fixed for the completion of work, the Engineer-in-charge may at the expense of the contractor remove such scaffolding, surplus materials and rubbish etc., and dispose of the same as he thinks fit and clean off such dirt as aforesaid, and the contractor shall have no claim in respect of
--	--	---



		scaffolding or surplus materials as aforesaid except for any sum actually realized by the sale thereof. a. For electrical and mechanical capital works: The contractor shall remove the rubbish from the site. Following conditions must be met before recording completion certificate : Submits completion plan, maintenance manual, manufactures catalogue and gives performance test for system. b. For repair works: The performance of the repaired system has been tested and found satisfactory. c. For AMC work: The system has been tested for its performance/ completeness and taken over by AAI / next agency for operation and maintenance.
--	--	--

CLAUSE 8 A

	Contractor to keep site clean	When the annual repairs and maintenance of works are carried out, the splashes and droppings from white washing colour washing, painting etc., on walls, floor, windows etc. shall be removed and the surface cleaned simultaneously with the completion of these items of work in the individual rooms, quarters or premises etc. Where the work is done without waiting for the actual completion of all the other items of work in the contract, in case the contractor fails to comply with the requirements of this clause, the Engineer-in-charge shall have the right to get this work done at the cost of the contractor either departmentally or through any other agency. Before taking such action, the Engineer-in-charge shall give ten days notice in writing to the contractor.
--	--------------------------------------	--

CLAUSE 8 B

	Completion Plans to be Submitted by the Contractor	The contractor shall submit completion plan as required vide General Specifications for Electrical works (Part I internal) 2013 and (Part II External) 1994 or latest available specifications, as applicable within thirty days of the completion of the work. The contractor shall submit completion plan for building works, all services, and obtain occupancy certificate from local bodies on the basis of completion drawings within a period of 30 days from the date of completion. The contractor shall also submit catalogues of all equipment's and maintenance manual for the complete E & M systems. If contractor fails to submit completion plans of all works, he shall be liable to pay compensation @ 0.5% of the tendered value of works costing up to Rs. 5 Crores subject to maximum of Rs. 1.00 Lac and 0.25% for works costing more than Rs. 5 crores subject to maximum of Rs. 1.5.Lac. The decision of Project in charge in this regard shall be final and binding on the contractor.
--	---	---

CLAUSE 9

	<u>Payment of final bill</u>	The corrected final bill shall be submitted by the contractor in the same manner as specified in interim bills within three months of physical completion of the work or within one month of the date of the final certificate of completion furnished by the Engineer-incharge whichever is earlier. No further claims shall be made by the contractor after submission of the final bill and these shall be deemed to have been waived and extinguished. Payments of those items of the bill in respect of which there is no dispute and for those items which are in dispute on account of quantity and/ or rates shall be paid at approved quantity and/ or rates by the Engineer-in-charge, within three months period reckoned from the date of receipt
--	-------------------------------------	---



		of the bill by the Engineer in- Charge or his authorized representative, complete with account of materials issued by the Department and dismantled materials. If the final bill is submitted by the contractor within the period specified above and payment of final bills is made by the AAI within above prescribed time limit, if delay in payment, a simple interest @ prevailing rate of interest of General Provident Fund shall be paid to the contractor from the date of expiry of prescribed time limit, provided the final bill submitted by the contractor is found to be in order. The Final bill shall be prepared for both L1 & L2 bidders for all tendered items (excluding Extra Items based on market rate) and payment shall be made on the basis of lower of the two.
--	--	---

CLAUSE 9 A

	Payment of contractor's bills to Banks	Payments due to the contractor and refund of various nature may, if so desired by him and wherever possible in banks be made through electronic payment mechanism instead of direct to him, provided that the contractor furnishes to the Engineer-in- Charge. - Information's as per proforma attached. - An authorization in the form of a legally valid document such as power of attorney conferring authority on the bank to receive payments and - His own acceptance of the correctness of the amount made out as being due to him by Authority or his signature on the bill or other claim preferred against Authority before settlement by the Engineer-in-charge of the account or claim by payment to the bank. While the receipt given by such banks shall constitute a full and sufficient discharge for the payment, the contractor shall whenever possible present his bills duly receipted and discharged through his bank. Nothing herein contained shall operate to create in favour of the bank any rights or equities vis-à-vis the Airports Authority of India.
--	---	--

CLAUSE 10

	Materials supplied by Authority	Materials which Authority will supply are shown in Schedule 'B' which also stipulates quantum, place of issue and rate(s) to be charged in respect thereof. The contractor shall be bound to procure them from the Engineer-in-charge. As soon as the work is awarded, the contractor shall finalise the programme for the completion of work as per clause 5 of this contract and shall give his estimates of materials required on the basis of drawings/ or schedule of quantities of the work. The contractor shall give in writing his requirement to the Engineer in charge, which shall be issued to him keeping in view the progress of work as assessed by the Engineer in-Charge in accordance with the agreed phased programme of work indicating monthly requirements of various materials. The contractor shall place his indent in writing for issue of such materials at least 7 days in advance of his requirement. Such materials shall be supplied for the purpose of the contract only and the value of the materials so supplied at the rates specified in the aforesaid schedule shall be set off or deducted, as and when materials are consumed in items of work (including normal wastage) for which payment is being made to the contractor, form any sum then due or which may therefore become due to the contractor under the contract or otherwise or from the security deposit. At the time of submission of bills, the contractor shall certify that balance of materials supplied is available at site in original good condition. The contractor shall submit along with every running bill (on account or interim bill) material wise reconciliation statements supported by complete calculations
--	--	---



	reconciling total issue, total consumption and certified balance (diameter/ section-wise in the case of steel) and resulting variations and reasons thereof. Engineer in charge shall (whose decision shall be final and binding on the contractor) be within his rights to follow the procedure of recovery in clause 42 at any stage of the work if reconciliation is not found to be satisfactory. The contractor shall bear the cost of getting the material issued, loading, transporting to site, unloading, storing under cover as required, cutting assembling and joining the several parts together as necessary. Notwithstanding anything to the contrary contained in any other clause of the contract and all stores / materials so supplied to the contractor or procured with the assistance of the AAI shall remain the absolute property of Authority and the contractor shall be the trustee of the stores/ materials, and the said stores/ materials shall not be removed/ disposed off from the site of the work on any account and shall be at all times open to inspection by the Engineer in charge or his authorised agent. Any such stores/ materials remaining unused shall be returned to the Engineer in charge in as good a condition in which they were originally supplied at a place directed by him, at a place of issue or any other place specified by him as he shall require, but in case it is decided not to take back the stores/ materials the contractor shall have no claim for compensation on any account of such stores/ materials so supplied to him as aforesaid and not used by him or for any wastage in or damage to in such stores/ materials. On being required to return the stores/ materials, the contractor shall hand over the stores/ materials on being paid or credited such price as the Engineer in charge shall determine, having due regard to the condition of the stores/ materials. The price allowed for credit to the contractor, however, shall be at the prevailing market rate not exceeding the amount charged to him, excluding the storage charge, if any. The decision of the Engineer in charge shall be final and conclusive. In the event of breach of the aforesaid condition, the contractor shall in addition to throwing himself open to account for contravention of the terms of the licenses or permit and/ or for criminal breach of trust, be liable to Authority for all advantages or profits resulting or which in the usual course would have resulted to him by reason of such breach. Provided that the contractor shall in no case be entitled to any compensation or damages on account of any delay in supply or non-supply thereof all or any such materials and stores provided further that the contractor shall be bound to execute the entire work if the materials are supplied by the Authority within the original scheduled time for completion of the work plus 50% thereof or schedule time plus 6 months whichever is more if the time of completion of work exceeds 12 months, but if a part of the materials only has been supplied within the aforesaid period, then the contractor shall be bound to do so much of the work as may be possible with the materials and stores supplied in the aforesaid period. For the completion of the rest of the work, the contractor shall be entitled to such extension of time as may be determined by the Engineer in charge whose decision in this regard shall be final and binding on the contractor. The contractor shall see that only the required quantities of materials are got issued. Any such material remaining unused and in perfectly good/ original condition at the time of completion or determination of the contract shall be returned to the Engineer in charge at the stores from which it was issued or at a place directed by him by a notice in writing. The contractor shall not be entitled for loading transporting, unloading and stacking of such unused material except for the extra lead, if any involved, beyond the original place of issue.
--	---



CLAUSE 10 A

	Materials to be provided by the contractor and Mandatory Tests	1. The contractor shall, at his own expense, provide all materials, required for the works other than those which are stipulated to be supplied by the Authority. 2. The contractor shall, at his own expense and without delay; supply to the Engineer in charge samples of materials to be used on the work and shall get these approved in advance. All such materials to be provided by the contractor shall be in conformity with the specifications laid down or referred to in the contract. The contractor shall, if requested by the Engineer in charge furnish proof, to the satisfaction of the Engineer in charge that the materials so comply. The Engineer in charge shall within thirty days of supply of samples or within such further period as he may require intimate to the Contractor in writing whether samples are approved by him or not. If samples are not approved, the Contractor shall forthwith arrange to supply to the Engineer in charge for his approval, fresh samples complying with the specifications laid down in the contract. When materials are required to be tested in accordance with specifications, approval of the Engineer in charge shall be issued after the test results are received. 3. The contractor shall at his risk and cost submit the samples of materials to be tested or analyzed and shall not make use of or incorporate in the work any materials represented by the samples until the required tests or analysis have been made and materials finally accepted by the Engineer in charge. 4. If any additional tests apart from mandatory tests specified in the contract are required to be carried out at the instance of AAI or any other advisory body, to ensure conformity of the item to the contract specifications, the cost of such tests shall be borne by AAI. In case the material / equipment fails in the above tests, the expenditure incurred by AAI on testing of such material or equipment along with incidental charges borne by AAI (if any) shall be recovered from the dues of the contractor and action shall be taken under Clause 16 and other relevant clauses of the contract. 5. The contractor shall not be eligible for any claim or compensation either arising out of any delay in the work or due to any corrective measures required to be taken on account of and as a result of testing of materials. 6. The contractor shall, at his risk and cost, make all arrangements and shall provide all facilities as the Engineer in charge may require for collecting and preparing the required number of samples for such tests at such time and to such place or places as may be directed by the Engineer in charge and bear all charges and cost of testing unless specifically provided for otherwise elsewhere in the contract or specifications. The Engineer in charge or his authorised representative shall at all times have access to the works and to all workshops and places where work is being prepared or from where materials manufactured, articles or machinery are being obtained for the works and the contractor shall afford every facility and every assistance in obtaining the right to such access. 7. The Engineer in charge shall have full powers to require the removal from the premises of all materials which in his opinion are not in accordance with the specifications and in case of default, the Engineer in charge shall be at liberty to employ at the expense of the contractor, other persons to remove the same without being answerable or accountable for any loss or damage that may happen or arise to such materials. The Engineer in charge shall also have full powers to require other proper materials to be substituted thereof and in case of default, the Engineer in charge may cause
--	---	--



		the same to be supplied and all costs which may be attracted for such removal and substitution shall be borne by the Contractor. 8. The contractor shall at his own expense, provide a material testing lab at the site for conducting routine field tests. The lab shall be equipped at least with the testing equipment as specified in Schedule F. 9. Details in respect of all mandatory tests shall be maintained in the desired format and attached with each Running Account Bill.
--	--	--

CLAUSE-10-B

(+)	Secured Advance on Nonperishable materials	1. The Contractor, on signing an indenture in the form to be specified by the Engineer in charge, shall be entitled to be paid during the progress of the execution of the work upto 75% of the assessed value of any materials which are in the opinion of the Engineer in charge nonperishable, non-fragile and noncombustible and are in accordance with the contract and which have been brought on the site in connection therewith and are adequately stored and/ or protected against damage by weather or other causes but which have not at time of advance been incorporated in the works. When materials on account of which an advance has been made under this sub clause are incorporated in the work, the amount of such advance shall be recovered/ deducted from the next payment made under any of the clause or clauses of this contract. Such secured advance shall also be payable on other items of perishable nature, fragile and combustible with the approval of the Engineer in charge provided the contractor provides a comprehensive insurance cover for the full cost of such materials. The decision of the Engineer in charge shall be final and binding on the contractor in this matter. No secured advance, shall however, be paid on high risk materials such as ordinary glass, sand, petrol, diesel etc. The secured advance shall also be payable against items brought at site for use in electrical and mechanical systems. Such secured advance shall be paid on submission of Collateral Bank Guarantee submitted by the vendor against the payment in case equipment/system fails to perform on testing and commissioning. Normally secured advance is paid up to 75% of the assessed value of items but in any case it shall not exceed 80% of cost of items indicated for supply of equipment.
(II)	Mobilization Advance	Mobilization advances not exceeding 10% of the tendered value may be given, if requested by the contractor in writing within six months of the order to commence the work. Such advance shall be released in two or more installments to be determined by the Engineer in Charge at his sole discretion. The first instalment of such advance shall be released by the Engineer in charge to the contractor on a request made by the contractor to the Engineerin Charge in this behalf. The second and subsequent instalments shall be released by the Engineer in Charge only after the contractor furnishes a proof of the satisfactory utilization of the earlier instalment(s) to the satisfaction of the Engineer in Charge. Before any instalment of advance is released, the contractor shall execute Bank Guarantee Bonds not more than 6 (six) in number from commercial Bank for the amount equal to 110% of the amount of advance and valid for the period till recovery of advance. This (Bank Guarantee from commercial Bank on prescribed format for the amount equal to 110% of the balance amount of advance) shall be kept renewed from time to time to cover the balance amount and likely period of complete recovery.



Interest on Mobilization advance	The mobilization advance bear simple interest at the rate as mentioned in Schedule F per annum and shall be calculated from the date of payment to the date of recovery, both days inclusive, on the outstanding amount of advance.
Recovery of Mobilization advance	Recovery of such sums advanced shall be made by the deduction from the contractor's bills commencing after first ten percent of the gross value of the work is executed and paid, on pro rata percentage basis to the gross value of the work billed beyond 10% in such a way that the entire advance is recovered by the time eighty percent of the gross value of the contract is executed and paid, together with interest due on the entire outstanding amount up to the date of recovery of the installment. If the circumstances are considered reasonable by the Engineer-in-Charge, the period mentioned for request by the contractor in writing for grant of mobilization advance may be extended at the discretion of the Engineer in Charge.

CLAUSE 10 C

Payment on Account of Increase in Prices/ Wages due to Statutory Order(s)	If after submission of the tender, the price of any material incorporated in the works (excluding the materials covered under Clause 10CA and not being a material supplied from the Engineer-in-charge's stores in accordance with Clause 10 thereof) and/ or wages of labour increases as a direct result of the coming into force of any fresh law or statutory rule or order (but not due to any variation of rates in GST applicable on such materials being considered under this clause) beyond the prices / wages prevailing at the time of last stipulated date for receipt of the tenders including extensions, if any, for the work, during contract period including the justified period extended under the provisions of the Clause 5 of the Contract without any action under Clause 2, then the amount of the contract shall accordingly be varied. If after submission of the tender, the price of any material incorporated in the works (excluding the material covered under clause 10CA and not being a material supplied from the Engineer-in-charge's stores in accordance with clause 10 thereof) and / or wages of labour as prevailing at the time of last stipulated date of receipt of tender including extensions, if any, is decreased as a direct result of the coming into force of any fresh law or statutory rule or order (not due to any changes in GST /Custom duty). Authority shall in respect of materials incorporated in the works (excluding the material covered under clause 10CA and not being materials supplied from the Engineer-in-charge's stores in accordance with Clause 10 hereof) and/ or labour engaged on the execution of the work after the date of coming into force of such law, statutory rule or order be entitled to deduct from the dues of the contractor, such amount as shall be equivalent to the difference between the prices of the materials and/ or wages as prevailed at the time of the last stipulated date for receipt of tenders including extensions if any for the work and the prices of materials and/ or wages of labour on the coming into force of such law, statutory rule or order. This will be applicable for the contract period including the justified period extended under the provisions of clause 5 of the contract without any action under clause 2. Engineer-in-charge shall call books of account and other relevant documents from the contractor to satisfy himself about reasonability of increase in prices of materials and wages. The contractor shall, within a reasonable time of his becoming aware of any alteration in the price of any such materials and/ or wages of labour, give notice thereof to the Engineer-in-charge stating that the same is given pursuant to this condition together with all information relating
--	--



		thereto which he may be in position to supply. For this purpose, the labour component of 85% of the value of the work executed during period under consideration shall not exceed the percentage as specified in Schedule F, and the increase / decrease in labour shall be considered on the minimum daily wages in rupees of any unskilled mazdoor, fixed under any law, statutory rule or order. The cost of work for which escalation applicable (w) is same as cost of work done as worked out as indicated in clause 10 CC minus the amount of full assessed value of secured advances.
--	--	--

CLAUSE 10 CA

	Payment due to variation in prices of materials after receipt of tender	If after submission of the tender, the price of materials specified in Schedule F increases/ decreases beyond the base price(s) as indicated in schedule F for the work, then the amount of the contract shall accordingly be varied and provided further that any such variations shall be effected for stipulated period of contract including the justified period extended under the provisions of clause 5 of the contract without any action under Clause 2. However for work done/ during the justified period extended as above, it will be limited to indices prevailing at the time of updated stipulated date of completion considering the effect of extra work (Extra time to be calculated on pro rata basis only as cost of extra work X stipulated period/ tendered cost). The increase/ decrease in prices of cement, steel reinforcement, structural steel, Bitumen and POL shall be determined by the Price indices issued by the Director General, CPWD. For other items provided in the Schedule 'F', this shall be determined by the All India Wholesale Price Indices of materials as published by Economic Advisor to Government of India, Ministry of Commerce and Industry. Base price for cement, steel reinforcement, structural steel and POL shall be as issued under authority of Director General, CPWD applicable for Delhi including Noida, Gurgaon, Faridabad and Ghaziabad and for other places as issued under the authority of Zonal Chief Engineer, CPWD and base price of other materials issued by concerned Zonal Chief Engineer and as indicated in Schedule 'F'. In case, price index of a particular material is not issued by Ministry of Commerce and Industry then the price index of nearest similar material as indicated in Schedule F shall be followed. The amount of the contract shall accordingly be varied for all such materials worked out as per the formula given below for individual material: Adjustment for component of individual material. $V = P \times Q \times \frac{CI - CI_0}{CI_0}$ where, V = Variation in material cost i.e. increase or decrease in the amount in rupees to be paid or recovered P = Base price of material as issued under authority of DG, CPWD or concerned Zonal Chief Engineer CPWD and as indicated in Schedule 'F'. For Projects and original works Q = Quantity of material brought at site for bonafide use in the works since
--	---	---



		previous bill excluding any such quantity consumed in the deviated quantity of items beyond deviation limit and extra/substituted item, paid/to be paid at rates derived on the basis of market rates under clause 12.2 For maintenance works Q = Quantity of material brought at site for bonafide use in the works since previous bill including any such quantity consumed in the deviated quantity of items beyond deviation limit paid at agreement rates and extra/substituted item being scheduled items, but excluding nonscheduled extra/substituted item paid/to be paid at market rates under clause 12.2
		CI0 = Price index for cement, steel reinforcement bars, structural steel and POL as issued by the DG, CPWD and corresponding to the time of base price of respective material indicated in schedule 'F'. For other items, if any provided in Schedule 'F', All India Wholesale Price Index for the material as published by the Economic Advisor to Government of India, Ministry of Industry and Commerce and corresponding to the time of base price of respective material indicated in Schedule 'F'. CI = Price index for cement, steel reinforcement bars, structural steel and POL as issued under the authority of DG, CPWD for period under consideration. For other items, if any, provided in Schedule 'F' All India Wholesale Price Index for the material for the period under consideration as published by Economic Advisor to Government of India, Ministry of Industry and Commerce. If actual purchase price of material is less than base price P and $CI > CI_0$ then, this clause shall not be applicable. Note: i. In respect of justified period extended under the provisions of Clause 5 of the contract without any action under clause 2, the index prevailing at the time of updated stipulated date of completion considering the effect of extra work (extra time to be calculated on prorata basis only as cost of extra work X stipulated period/ tendered cost) shall be considered. Provided always that provisions of the preceding Clause 10 C shall not be applicable in respect of materials covered in this Clause. ii. If during progress of work or at the time of completion of work, it is noticed that any material brought at site is in excess of requirement, then amount of escalation if paid earlier on such excess quantity of material shall be recovered on the basis of cost indices as applied at time of payment of escalation or as prevailing at the time of effecting recovery, whichever is higher. iii. Cement mentioned wherever in this clause includes cement component used in RMC brought at site from outside approved RMC plants, if any. iv. The date wise record of ready mix concrete shall be kept in a register and cement consumption for the same shall be calculated accordingly. If built up steel items are brought at site from workshop, than the variation shall be paid for structural steel up to the period when the built up item/finished product is brought at site.



Clause 10CC

	Payment due to Increase/ Decrease in Prices/ Wages (excluding material covered under clause 10CA) after Receipt of Tender for works.	If the prices of materials (not being materials supplied or services rendered at fixed prices by the Department in accordance with clause 10 & 34 thereof) and/ or wages of labour required for execution of work increase, the contractor shall be compensated for such increase as per provisions detailed below and the amount of the contract shall accordingly be varied, subject to the condition that such compensation for escalation in prices and wages shall be available only for the work done during the stipulated period of the contract including the justified period extended under the provisions of clause 5 of the contract without any action under clause 2: No such compensation shall be payable for a work for which the stipulated period of completion is equal to or less than the time as specified in Schedule 'F'. Such compensation for escalation in the prices of materials and labour, when due, shall be worked out based on the following provisions: - The base date for working out such escalation shall be the last stipulated date of the receipt of tenders including extension, if any. - The cost of work on which escalation will be payable shall be reckoned as below: - Gross value of work done upto this quarter (A) - Gross value of work done upto the last quarter (B) - Gross value of work done since previous quarter (A - B) (C) - Full assessed value of secured advance (excluding material covered under clause 10CA) fresh paid in this quarter (D) - Full assessed value of secured advance (excluding material covered under clause 10CA) recovered in this quarter (E) - Full assessed value of secured advance for which escalation is payable in this quarter (D - E) (F) - Advance payment made during this quarter (G) - Advance payment recovered during this quarter (H) - Advance payment for which escalation is payable in this quarter (G - H) (I) - Extra items/ deviated quantities of items paid as per clause 12 based (J) on prevailing market rates during this quarter: Then, $M = (C + F + I - J)$ $N = 0.85 M$ - Less cost of material supplied by the department as per clause 10 and recovered during the quarter (K) - Less cost of services rendered at fixed charges as per Clause 34 and recovered during the quarter (L) Cost of work for which escalation is applicable $W = N (K + L)$
		- Components for materials, (except Bitumen, cement, reinforcement bars, structural steel or others material covered under clause 10CA) labour, P.O.L. etc. shall be pre determined for every work and incorporated in the conditions of contract attached to the tender papers included in Schedule F. The decision of the Engineer in charge in working out such percentage shall be binding on the contracts. - The compensation for escalation for other materials (except Bitumen, cement, reinforcement bars, structural steel or others material covered under clause 10CA) and P.O.L. shall be worked as per the formula (m & n) given below: - Adjustment for civil component (except Bitumen, cement, reinforcement



		bars, structural steel and others material covered under clause 10CA) /electrical component of construction.
	Materials	m. Formula for adjustment in material cost $V_m = \frac{W}{100} \times \frac{X_m}{MI} \times \frac{MI - MI_0}{MI_0}$ V_m = Variation in material cost i.e. increase or decrease in the amount in rupees to be paid or recovered. W = Cost of work done, worked out as indicated in sub para (ii) of Clause 10 CC X_m = Component of 'materials' (except cement, structural steel, reinforcement bars, POL and other materials covered under clause 10 CA) expressed as percent of the total value of work. MI = All India wholesale price index for civil component/ electrical component* of construction material as worked out on the basis of All India Wholesale Price Index for Individual Commodities/ Group Items for the period under consideration as published by the Economic Advisor to Government of India, Ministry of Industry & Commerce and applying weightage to the Individual Commodities/ Group Items (in respect to the justified period extended under the provisions of clause 5 of the contract without any action under Clause 2, the index prevailing at the time of updated stipulated date of completion considering the effect of extra work (extra time to be calculated on prorated basis only as cost of extra work x stipulated period/tendered cost, shall be considered.) MI_0 = All India wholesale price index for civil component/ electrical component* of construction material as worked out on the basis of All India Wholesale Price Index for Individual Commodities/ Group Items valid on the last stipulated date of receipt of tenders including extensions, if any, as published by the Economic Advisor to Government of India, Ministry of Industry and Commerce and applying weightage to the Individual Commodities/ Group Items. * Note: relevant component only will be applicable
	POL	n. Formula for adjustment in POL cost $V_F = \frac{W}{100} \times \frac{Z}{FI} \times \frac{FI - FI_0}{FI_0}$ V_F = Variation in cost of Fuel, Oil & Lubricant i.e. increase or decrease in the amount in rupees to be paid or recovered. W = Cost of work done, worked out as indicated in sub para (ii) of Clause 10 CC Z = Component of Fuel, Oil and Lubricant expressed as a percentage of the total value of the work FI = All India wholesale price index for Fuel, Oil and Lubricant for the period under consideration as published by the Economic Advisor to Government of India, Ministry of Industry & Commerce (in respect to the justified period extended under the provisions of clause 5 of the contract without any action under Clause 2, the index prevailing at the time of updated stipulated date of completion or the prevailing index of the period under consideration, whichever is less, shall be considered) FI_0 = All India wholesale price index for Fuel, Oil and Lubricant valid on the last stipulated date of receipt of tenders including extensions, if any.



		v. The following principles shall be followed while working out the indices mentioned in above Para a. The compensation for escalation shall be worked out at quarterly intervals and shall be with respect to the cost of work done as per bills paid during the three calendar months of the said quarter. The dates of preparation of bills as finally entered in the measurement book/date of submission of bill finally by the contractor to the department in case of computerized measurement book shall be the guiding factor to decide the bills relevant to the quarterly interval. The first such payment shall be made at the end of three months after the month (excluding the month in which the tender was accepted) and thereafter at three months' interval. At the time of completion of the work, the last period for payment might become less than 3 months depending on the actual date of completion. b. The index (MI/FI etc.) relevant to any quarter/ period for which such compensation is paid shall be the arithmetical average of the indices relevant to the three calendar months. If the period up to date of completion after the quarter covered by the last such installment of payment is less than three months, the index MI and FI shall be the average of the indices for the months falling within that period.
	Labour	vi—Formula for adjustment in Labour cost The compensation for escalation for labour shall be worked out as per the formula given below: $V_1 = W \times \frac{Y}{100} \times \frac{L_1 - L_0}{L_0}$ V_1 = Variation in labour cost i.e. amount of increase or decrease in rupees to be paid or recovered W = Value of work done, worked out as indicated in sub para (ii) above Y = Component of labour expressed as a percentage of the total value of the work L_1 = Minimum wage in rupees of an unskilled adult male mazdoor, fixed under any law, statutory rule or order as applicable on the last date of the quarter previous to the one under consideration (in respect to the justified period extended under the provisions of clause 5 of the contract without any action under Clause 2, the minimum wage prevailing on the last date of quarter previous to the quarter pertaining to updated stipulated date of completion considering the effect of extra work (extra time to be calculated on prorata basis only as cost of extra work x stipulated period/tendered cost, shall be considered.) L_0 = Minimum daily wage in rupees of an unskilled adult male mazdoor, fixed under any law, statutory rule or order as on the last stipulated date of receipt of tender including extension if any.



	vii. The following principles will be followed while working out the compensation as per sub para (vi) above: a. The minimum wage of an unskilled male mazdoor mentioned in sub para (vi) above shall be the higher of the wage notified by Government of India, Ministry of Labour and that notified by the local administration both relevant to the place of work and the period of reckoning. b. The escalation for labour also shall be paid at the same quarterly intervals when escalation due to increase in cost of materials and/ or P.O.L. is paid under this clause. If such revision of minimum wages take place during any such quarterly intervals, the escalation compensation shall be payable at revised rates only for work done in subsequent quarters. c. Irrespective of variations in minimum wages of any category of labour, for the purpose of this clause, the variation in the rate for an unskilled male mazdoor alone shall form the basis for working out the escalation compensation payable on the labour component. viii. In the event the price of materials and/ or wages of labour required for execution of the work decrease/s, there shall be a downward adjustment of the cost of work so that such price of materials and/ or wages of labour shall be deductible from the cost of work under this contract and in this regard the formula herein before stated under this Clause 10CC shall <i>mutatis mutandis</i> apply, provided that: a. No such adjustment for the decrease in the price of materials and/or wages of labour aforementioned would be made in case of contracts in which the stipulated period of completion of the work is equal to or less than the time as specified in Schedule F. b. The Engineer in charge shall otherwise be entitled to lay down the procedure by which the provision of this sub clause shall be implemented from time to time and the decision of the Engineer in charge in this behalf shall be final and binding on the contractor. ix. Provided always that: a. Where provisions of clause 10CC are applicable, provisions of clause 10C will not be applicable but provisions of clause 10CA will be applicable. b. Where provisions of clause 10CC are not applicable, provisions of Clause 10C and 10CA will become applicable. Note: Updated stipulated date of completion (period of completion plus extra time for extra work for compensation under clause 10C, 10CA and 10CC, the factor of 1.25 taken into account for calculating the extra time under clause 12.1 for extra time shall not be considered while calculating the updated stipulated date of completion for this purpose in clause 10C, clause 10 CA, and clause 10CC. The date of preparation of bill shall be as finally entered in the measurement book by AM / Mgr. / SM / AGM or the date of submission of bill by the contractor to the Department. This shall be the guiding factor to decide the bill relevant to that period in case of computerized billing.
--	---



CLAUSE 10 D

	Dismantled Material AAI Property	The contractor shall treat all materials obtained during dismantling of a structure, excavation of the site for a work etc. as property of AAI and such materials shall be disposed of to the best advantage of Authority according to the instructions in writing issued by the Engineer-in-charge.
--	---	--

CLAUSE 11

	Work to be executed in accordance with specifications, drawings, orders etc.	The contractor shall execute the whole and every part of the work in the most substantial and workmanlike manner both as regards materials and otherwise in every respect in strict accordance with the specifications. The contractor shall also conform exactly, fully and faithfully to the design, drawings and instructions in writing in respect to the work signed by the Engineer in charge and the contractor shall be furnished free of charge one copy of the contract documents together with specifications, designs, drawings and instructions as are not included in the standard specifications of Central Public Works Department specified in Schedule F or in any Bureau of Indian Standard or any other published standard or code or Schedule of Rates or any other printed publication referred to elsewhere in the contract. The contractor shall comply with the provisions of the contract and with the care and diligence execute and maintain the works and provide all labour and materials, tools and plants including for measurements and supervision of all works, structural plans and other things of temporary or permanent nature required for such execution and maintenance in so far as the necessity for providing these, is specified or is reasonably inferred from the contract. The contractor shall take full responsibility for adequacy suitability and safety of all the works and methods of construction.
--	---	---

CLAUSE 12

	Deviations / variations extent and pricing	The engineer-in-charge shall have power (i) to make alteration in, omissions from, additions to, or substitutions for the original specifications, drawings, designs and instructions that may appear to him to be necessary or advisable during the progress of the work, and (ii) to omit a part of the works in case of non-availability of a portion of the site or for any other reasons and the contractor shall be bound to carry out the works in accordance with any instructions given to him in writing signed by the Engineering- charge and such alterations, omissions, additions or substitutions shall form part of the contract as if originally provided therein and any altered, additional or substituted work which the contractor may be directed to do in the manner specified above as part of the works, shall be carried out by the contractor on the same conditions in all respects including price on which he agreed to do the main work except as hereafter provided.
12.1		The time for completion of the works shall, in the event of any deviations resulting in additional cost over the tendered value being ordered, be extended, if requested by the contractor, as follows: i. In the proportion which the additional cost of the altered, additional or substituted work, bears to the original tendered value plus ii. 25% of the time calculated in (i) above or such further additional time as may be considered reasonable by the engineer-in-charge.



12.2	Deviation, Extra Items and Pricing	In the case of extra item(s) (items that are completely new, and in addition to the items contained in the contract) the contractor may within fifteen days of receipt of order or occurrence of the item(s) claim rates, supported by proper analysis, for the work and the Engineer-in-charge shall within Six weeks of the receipt of the claims supported by analysis, after giving consideration to the analysis of the rates submitted by the contractor, determine the rates on the basis of the market rates and the contractor shall be paid in accordance with the rates so determined.
	Deviation, substituted items pricing	In the case of substituted items (items that are taken up with partial substitution or in lieu of items of work in the contract), the rate for the agreement item (to be substituted) and substituted item shall also be determined in the manner as mentioned in the following para. (i) If the market rate for the substituted item so determined is more than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted) so increased to the extent of the difference between the market rates of substituted item and the agreement item (to be substituted). (ii) If the market rate for the substituted item so determined is less than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted) so decreased to the extent of the difference between the market rates of substituted item and the agreement item (to be substituted).
	Deviation, Deviated Quantities, Pricing	In the case of contract items, substituted items, contract cum substituted items, which exceed the limits laid down in schedule F, the contractor may within fifteen days of receipt of order or occurrence of the excess, claim revision of the rates, supported by proper analysis for the work in excess of the above mentioned limits, provided that if the rates so claimed are in excess of the rates specified in the schedule of quantities, the Engineer-in-Charge shall within prescribed time limit of receipt of the claims supported by analysis, after giving consideration to the analysis of the rates submitted by the contractor, determine the rates on the basis of the market rates and the contractor shall be paid in accordance with the rates so determined.
12.3		The provisions of the preceding paragraph shall also apply to the decrease in the rates of items for the work in excess of the limits laid down in Schedule F, and the Engineer-in-Charge shall after giving notice to the contractor within one month of occurrence of the excess and after taking into consideration any reply received from him within fifteen days of the receipt of the notice, revise the rates for the work in question within one month of the expiry of the said period of fifteen days having regard to the market rates.
12.4		The contractor shall send to the Engineer-in-Charge once every three months, an upto date account giving complete details of all claims for additional payments to which the contractor may consider himself entitled and of all additional work ordered by the Engineer-in-Charge, which he has executed during the preceding quarter failing which the contractor shall be deemed to have waived his right. However, the Executive Director Engineering may authorize consideration of such claims on merits.



12.5		For the purpose of operation of Schedule F, the following works shall be treated as works relating to foundation unless & otherwise defined in the contract: i. For Buildings: All works up to 1.2 meters above ground level or up to floor 1 level whichever is lower. ii. For abutments, piers and well staining: All works up to 1.2 m above the bed level. iii. For retaining walls, wing walls, compound walls, chimneys, overhead reservoirs/tanks and other elevated structures: All works up to 1.2 m above the ground level.
		iv. For roads, apron, runway & taxi track all items of excavation, filling GSBC and including treatment of sub-base. v. For reservoirs/tanks (other than overhead reservoirs/tanks): All works up to 1.2 meters above the ground level. vi. For basement: All works up to 1.2 m above ground level or up to floor 1 level whichever is lower.
12.6		Any operation incidental to or necessarily has to be in contemplation of tenderer while filing, tender, or necessary for proper execution of the item included in the Schedule of quantities or in the schedule of rates mentioned above, whether or not, specifically indicated in the description of the item and the relevant specifications, shall be deemed to be included in the rates quoted by the tenderer or the rate given in the said schedule of rates, as the case may be. Nothing extra shall be admissible for such operations.



CLAUSE 13

	Foreclosure of contract due to Abandonment or Reduction in Scope of Work	If at any time after acceptance of the tender or during the progress of work the purpose or object for which the work is being done changes due to any supervening cause and as a result of which the work has to be abandoned or reduced in scope the Engineer-in-Charge shall give notice in writing to that effect to the contractor and the contractor stating the decision as well as the cause for such decision and the contractor shall act accordingly in the matter. The contractor shall have no claim to any payment of compensation or otherwise whatsoever, on account of any profit or advantage which he might have derived from the execution of the works in full but which he did not derive in consequence of the foreclosure of the whole or part of the works. The contractor shall be paid at contract rates, full amount for works executed at site and, in addition, a reasonable amount as certified by the Engineer-in-Charge for the items hereunder mentioned which could not be utilized on the work to the full extent in view of the foreclosure; i. Any expenditure incurred on preliminary site work, e.g. temporary access roads, temporary labour huts, staff quarters and site office; storage accommodation and water storage tanks. ii. AAI shall have the option to take over contractor's materials or any part thereof either brought to site or of which the contractor is legally bound to accept delivery from suppliers (for incorporation in or incidental to the work) provided, however AAI shall be bound to take over the materials or such portions thereof as the contractor does not desire to retain. For materials taken over or to be taken over by AAI, cost of such materials as detailed by Engineer-in- Charge shall be paid. The cost shall, however, take into account purchase price, cost of transportation and deterioration or damage which may have been caused to materials whilst in the custody of the contractor. iii. If any materials supplied by AAI are rendered surplus, the same except normal wastage shall be returned by the contractor to AAI at rates not exceeding those at which these were originally issued, less allowance for any deterioration or damage which may have been caused whilst the materials were in the custody of the contractor. In addition, cost of transporting such materials from site to AAI stores, if so required by AAI, shall be paid.
--	---	--



		iv. Reasonable compensation for transfer of T & P from site to contractor's permanent stores or to his other works, whichever is less. If T & P are not transported to either of the said places, no cost of transportation shall be payable. v. Reasonable compensation for repatriation of contractor's site staff and imported labour to the extent necessary. The contractor shall, if required by the Engineer- in-Charge, furnish to him, books of account, wage books, time sheets and other relevant documents and evidence as may be necessary to enable him to certify the reasonable amount payable under this condition. The reasonable amount of items on (i), (iv) and (v) above shall not be in excess of 2% of the cost of the work remaining incomplete on the date of closure, i.e. total stipulated cost of the work as per accepted tender less the cost of work actually executed under the contract and less the cost of contractor's materials at site taken over by the AAI as per item (ii) above. Provided always that against any payments due to the contractor on this account or otherwise, the Engineer-in-Charge shall be entitled to recover or be credited with any outstanding balances due from the contractor for advance paid in respect of any tool, plants and materials and any other sums which at the date of termination were recoverable by the AAI from the contractor under the terms of the contract. In the event of action being taken under clause 13 to reduce the scope of work, the contractor may furnish fresh Performance Guarantee on the same conditions, in the same manner and at the same rate for the balance tendered amount and initially valid upto the extended date the completion or stipulated date of completion if no extension has been granted plus 180 days beyond that. Wherever, such a fresh Performance Guarantee is furnished by the contractor, the Engineer in Charge may return the previous Performance Guarantee.
--	--	---

CLAUSE 14

	Carrying out part Work at risk & cost of contractor	a. If contractor: - At any time makes default during currency of work or does not execute any part of the work with due diligence and continues to do so even after a notice in writing of 7 days in this respect from the Engineer-in-Charge; or - Commits default in complying with any of the terms and conditions of the contract and does not remedy it or takes effective steps to remedy it within 7 days even after a notice in writing is given in that behalf by the Engineer-in-Charge; or - Fails to complete the work(s) or items of work with individual dates of completion, on or before the date(s) so determined, and does not complete them within the period specified in the notice given in writing in that behalf by the Engineer-in-Charge. b. The Engineer- in-Charge without invoking action under clause 3 may, without prejudice to any other right or remedy against the contractor which have either accrued or accrue thereafter to AAI, by a notice in writing to take the part work / part incomplete work of any item(s) out of his hands and shall have powers to: - Take possession of the site and any materials, constructional plant, implements, stores, etc., thereon; and/or - Carry out the part work / part incomplete work of any item(s) by any means at the risk and cost of the contractor.
--	---	--



		c. The Engineer-in-Charge shall determine the amount, if any, is recoverable from the contractor for completion of the part work/ part incomplete work of any item(s) taken out of his hands and executed at the risk and cost of the contractor, the liability of contractor on account of loss or damage suffered by AAI because of action under this clause shall not exceed 10% of the tendered value of the work. d. In determining the amount, credit shall be given to the contractor with the value of work done in all respect in the same manner and at the same rate as if it had been carried out by the original contractor under the terms of his contract, the value of contractor's materials taken over and incorporated in the work and use of plant and machinery belonging to the contractor. The certificate of the Engineer-in-Charge as to the value of work done shall be final and conclusive against the contractor provided always that action under this clause shall only be taken after giving notice in writing to the contractor. Provided also that if the expenses incurred by the department are less than the amount payable to the contractor at his agreement rates, the difference shall not be payable to the contractor. e. Any excess expenditure incurred or to be incurred by AAI in completing the part work/ part incomplete work of any item(s) or the excess loss of damages suffered or may be suffered by AAI as aforesaid after allowing such credit shall without prejudice to any other right or remedy available to AAI in law or per as agreement be recovered from any money due to the contractor on any account, and if such money is insufficient, the contractor shall be called upon in writing and shall be liable to pay the same within 30 days. f. If the contractor fails to pay the required sum within the aforesaid period of 30 days, the Engineer-in-Charge shall have the right to sell any or all of the contractors' unused materials, constructional plant, implements, temporary building at site etc. and adjust the proceeds of sale thereof towards the dues recoverable from the contractor under the contract and if thereafter there remains any balance outstanding, it shall be recovered in accordance with the provisions of the contract/ provisions of law. In the event of above course being adopted by the Engineer-in-Charge, the contractor shall have no claim to compensation for any loss sustained by him by reason of his having purchased or procured any materials or entered into any engagements or made any advance on any account or with a view to the execution of the work or the performance of the contract.
--	--	--

CLAUSE 15

	Suspension of Work	i. The contractor shall, on receipt of the order in writing of the Engineer-in-Charge, (whose decision shall be final and binding on the contractor) suspend the progress of the works or any part thereof for such time and in such manner as the Engineer-in- Charge may consider necessary so as not to cause any damage or injury to the work already done or endanger the safety thereof for any of the following reasons: - on account of any default on the part of the contractor or; - for proper execution of the works or part thereof for reasons other than the default of the contractor; or - For safety of the works or part thereof. The contractor shall, during such suspension, properly protect and secure the works to the extent necessary and carry out the instructions given in that behalf by the Engineer-in-Charge.
--	---------------------------	--



		ii. If the suspension is ordered for reasons (b) and (c) in sub-para (i) above (but not attributed to contractor): - the contractor shall be entitled to an extension of time equal to the period of every such suspension PLUS 25% for completion of the item or group of items of work for which a separate period of completion is specified in the contract and of which the suspended work forms a part, and; - If the total period of all such suspensions in respect of an item or group of items or work for which a separate period of completion is specified in the contract exceeds thirty days, the contractor shall, in addition, be entitled to such compensation as the Engineer-in-Charge may consider reasonable in respect of salaries and/or wages paid by the contractor to his employees and labour at site, remaining idle during the period of suspension, adding thereto 2% to cover indirect expenses of the contractor provided the contractor submits his claim supported by details to the Engineer-in-Charge within fifteen days of the expiry of the period of 30 days. - If the works or part thereof is suspended on the orders of the Engineer-in-Charge for more than three months at a time, except when suspension is ordered for reasons (a) in sub-para (i) above, the contractor may after receipt of such order serve a written notice on the Engineer-in-Charge requiring permission within fifteen days from receipt by the Engineer-in-charge of the said notice, to proceed with the work or part thereof in regard to which progress has been suspended and if such permission is not granted within that time, the contractor, if he intends to treat the suspension, where it affects only a part of the works as on omission of such part by AAI or where it affects whole of the works, as an abandonment of the works by AAI, shall within ten days of expiry of such period of 15 days give notice in writing of his intention to the Engineer-in-Charge. In the event of the contractor treating the suspension as an abandonment of the contract by AAI, he shall have no claim to payment of any compensations on account of any profit or advantage which he might have derived from the execution of the work in full but which he could not derive in consequence of the abandonment. He shall, however, be entitled to such compensation, as the Engineer-in-Charge may consider reasonable, in respect of salaries and/or wages paid by him to his employees and labour at site, remaining idle in consequence adding to the total thereof 2% to cover indirect expenses of the contractor provided the contractor submits his claim supported by details to the Engineer-in-Charge within 30 days of the expiry of the period of 3 months.
--	--	--

CLAUSE 15 A

Compensation in case of delay due to late supply of stipulated material by AAI.	The contractor shall not be entitled to claim any compensation from AAI for the losses suffered by him on account of delay by AAI in the supply of materials in Schedule 'B' where such delay is covered by the difficulties relating to supply of wagons, force majeure or any reasonable cause beyond the control of AAI. This clause 15 A will not be applicable for works where no material is stipulated for issue by AAI.
--	---



CLAUSE 16

	Action in case Work not done as per Specifications	All works under or in course of execution or executed in pursuance of the contract, shall at all times be open and accessible to the inspection and supervision of the Engineer-in-Charge, his authorize subordinates in charge of the work and all the superior officers, officer of the Quality Assurance Unit of the AAI or any organization engaged by the Department of Quality Assurance and of the Chief technical Examiner's Office, and the contractor shall, at all times, during the usual working hours and at all other times at which reasonable notice of the visit of such officers has been given to the contractor, either himself be present to receive orders and instructions or have a responsible agent duly accredited in writing, present for that purpose. Orders given to the Contractor's agent shall be considered to have the same force as if they had been given to the contractor himself. If it shall appear to the Engineer-in -charge or his authorized subordinates in charge of the work or to the Executive Director-In-charge of quality assurance or his subordinate officers or the officers of the organization engaged by the AAI for quality Assurance or to the Chief Technical Examiner or his subordinate officers, that any work has been executed with unsound, imperfect, or unskillful workmanship, or with materials or articles provided by him for the execution of the work which are unsound or of a quality inferior to that contracted or otherwise not in accordance with the contract, the contractor shall, on demand in writing which shall be made within twelve months (six months in the case of work costing Rs.10 lac and below except road work) of the completion of the work from the Engineer-in-Charge specifying the work, materials or articles complained of notwithstanding that the same may have been passed, certified and paid for forthwith rectify, or remove and reconstruct the work so specified in whole or in part, as the case may require or as the case may be, remove the materials or articles so specified and provide other proper and suitable materials or articles at his own charge and cost. In the event of the failing to do so within a period specified by the Engineer-in-Charge in his demand aforesaid, then the contractor shall be liable to pay compensation at the same rate as under clause 2 of the contract (for non-completion of the work in time) for this default. In such case the Engineer-in-Charge may not accept the item of work at the rates applicable under the contract but may accept such items at reduced rates as the authority specified in schedule 'F' may considered reasonable during the preparation of on account bills or final bill if the item is so acceptable without detriment to the safety and utility of the item and the structure or he may reject the work outright without any payment and/or get it and other connected and incidental items rectified, or removed and re-executed at the risk and cost of the contractor. Decision of the Engineer-in-Charge to be conveyed in writing in respect of the same will be final and binding on the contractor.
--	---	---



CLAUSE 17

Contractor Liable for Damages, defects during maintenance period	If the contractor or his working people or servants shall break, deface, injure or destroy any part of building in which they may be working, or any building, road, road kerb fence, enclosure, water pipe, cables, drains, electric or telephone post or wires, trees, grass or grassland, or cultivated ground contiguous to the premises on which the work or any part is being executed, or if any damage shall happen to the work while in progress, from any cause whatever or if any defect, shrinkage or other faults appear in the work within 12 months after a certificate final or otherwise of its completion shall have been given by the Engineer-in-charge as aforesaid arising out of defect or improper materials or workmanship the contractor shall upon receipt of a notice in writing on that behalf make the same good at his own expense or in default the Engineering-charge cause the same to be made good by other workmen and deduct the expense from any sums that may be due or at any time thereafter may become due to the contractor, or from his security deposit or the proceeds of sale thereof or of a sufficient portion thereof. The security deposit of the contractor shall not be refunded before the expiry of 12 months after the issue of the certificate final or otherwise, of completion of work, or till the final bill has been prepared and passed whichever is later. Provided that in the case of road work, if in the opinion of the Engineer-in-charge, half of the security deposit is sufficient, to meet all liabilities of the contractor under this contract, half of the security deposit will be refundable after six months and the remaining half after twelve months of the issue of the said certificate of completion or till the final bill has been prepared and passed whichever is later. In case of Maintenance and Operation works of E&M services, the security deposit deducted from contractors shall be refunded after six months from the date of final payment or after six months from the date of completion of the maintenance contract whichever is later.
---	--

CLAUSE 18

Contractor to Supply Tools & Plants etc.	The contractor shall provide at his own cost all materials (except such special materials, if any, as may in accordance with the contract be supplied from the Engineer-in charge's stores) machinery, tools & plants as specified in Schedule F. in addition to this, appliances, implements, other plants, ladders, cordage, tackle, scaffolding and temporary works required for the proper execution of the work, whether original, altered or substituted and whether included in the specifications or other documents forming part of the contract or referred to in these conditions or not, or which may be necessary for the purpose of satisfying or complying with the requirements of the Engineer-in charge as to any matter as to which under these conditions he is entitled to be satisfied, or which he is entitled to require together with carriage therefor to and from the work. The contractor shall also supply without charge the requisite number of persons with the means and materials, necessary for the purpose of setting out works, and counting, weighing and assisting the measurement for examination at any time and from time to time of the work or materials. Failing his so doing, the same may be provided by the Engineer-in-charge at the expense of the contractor and the expenses may be deducted, from any money due to the contractor, under this contract or otherwise and/ or from his security deposit or the proceeds of sale thereof, or of a sufficient portions thereof.
---	---



CLAUSE 18 A

	Recovery of Compensation paid to Workmen	In every case in which by virtue of the provisions sub-section(i) of Section 12, of the Workmen's Compensation Act, 1923, AAI is obliged to pay compensation to a workman employed by the contractor, in execution of the works, AAI will recover from the contractor, the amount of the compensation so paid, and, without prejudice to the rights of the AAI under sub-section(2) of Section 12, of the said act, AAI shall be at liberty to recover such amount or any part thereof by deducting it from the security deposit or from any sum due by AAI to the contractor whether under this contract or otherwise. AAI shall not be bound to contest any claim made against it under subsection(1) of Section 12, of the said Act, except on the written request of the contractor and upon his giving to AAI full security for all costs for which AAI might become liable in consequence of contesting such claim.
--	---	---

CLAUSE 18 B

	Ensuring Payment and Amenities to Workers if Contractor fails	In every case in which by virtue of the provisions of the Contract Labour (Regulation and Abolition) act 1970, and the Contract Labour (Regulation and Abolition) Central Rules, 1971, AAI is obliged to pay any amounts of wages to a workman employed by the contractor in execution of the works, or to incur any expenditure in providing welfare and health amenities required to be provided under the above said Act and the rules under Clause 19H or under the AAI Contractor's Labour Regulations or under the Rules framed by AAI from time to time for the protection of health and sanitary arrangements for workers employed by AAI Contractors, AAI will recover from the contractor the amount of wages so paid or the amount of expenditure so incurred and without prejudice to the rights of the AAI under sub section (2) of Section 20, sub section (4) of Section 21, of the Contract Labour (Regulation and Abolition) Act, 1970, AAI shall be at liberty to recover such amount or any part thereof by deducting it from the security deposit or from any sum due by AAI to the contractor whether under this contract or otherwise AAI shall not be bound to contest any claim made against it under sub section (1) of Section 20, sub section (4) of Section 21, of the said Act, except on the written request of the contractor and upon his giving to the AAI full security for all costs for which AAI might become liable in contesting such claim.
--	--	---



CLAUSE 19

	Labour laws to be complied by the Contractor	The contractor shall obtain a valid license under the contract labour (R&A) Act, 1970 and the Contract Labour (Regulation and Abolition) Central Rules, 1971, before the commencement of the work, and continue to have a valid license until the completion of the work. The contractor shall also abide by the provisions of the Child Labour (Prohibition and Regulation) Act, 1986. The contractor shall also comply with the provisions of the building and other construction workers (Regulation of Employment & Conditions of Service) Act, 1996 and the building and other Construction Workers Welfare Cess Act, 1996. Any failure to fulfill these requirements shall attract the penal provisions of this contract arising out of the resultant non execution of the work.
--	---	--

CLAUSE 19 A

	No labour below the age of fourteen years shall be employed on the work.
--	--

CLAUSE 19 B

	Payment of wages	Payment of wages: - i The contractor shall pay to labour employed by him either directly or through subcontractors, wages not less than fair wages as defined in the AAI Contractor's Labour Regulation or as per the provisions of the Contract Labour (Regulation and Abolition) act, 1970 and the contract labour (Regulation and Abolition) Central Rules, 1971 wherever applicable. - ii The contractor shall, notwithstanding the provisions of any contract to the contrary, cause to be paid fair wage to labour indirectly engaged on the work, including any labour engaged by his sub-contractors in connection with the said work, as if the labour had been immediately employed by him.
--	-------------------------	---



	iii In respect of all labour directly or indirectly employed in the works for performance of the contractor's part of this contract, the contractor shall comply with or cause to be complied with the Airports Authority of India contractor's Labour Regulations made by AAI from time to time in regard to payment of wages wage period, deductions from wages recovery of wages not paid and deductions unauthorisedly made, maintenance of wage books or wage slips, publication of scale of wages and other terms of employment, inspection and submission of periodical returns and all other matters of the like nature or as per the provisions of the Contract Labour (Regulation and Abolition) Act, 1970 and the Contract Labour (Regulation and Abolition) Central Rules, 1971, wherever applicable. iv. The following deductions shall be permissible to be made by the Engineer-in-Charge. a. The Engineer-in-charge concerned shall have the right to deduct from the moneys due to the contractor or any sum required or estimated to be required for making good the loss suffered by a worker or workers by reason of non-fulfillment of the conditions of the contract for the benefit of the workers, non-payment of wages or of deductions made from his or their wages which are not justified by their terms of the contract or non-observance of the Regulations. b. Under the provision of Minimum Wages (Central) Rule 1950 the contractor is bound to allow to the labours directly or indirectly employed in the works one day rest for 6 days continuous work and pay wages at the same rate as for duty. In the event of default, the Engineer-in-charge shall have the right to deduct the sum or sums not paid on account of wages for weekly holidays to any labours and pay the same to the persons entitled thereto from any money due to the contractor by the Engineer-in-charge concerned. In the case of Union Territory of Delhi, however, as the all-inclusive minimum daily wages fixed under Notification of the Delhi Administration No.F.12(162)MWO/DAB/43884-91, dated 31.12.1979 as amended from time to time are inclusive of wages for the weekly day of rest, the question of extra payment for weekly holiday would not arise. v. The contractor shall comply with the provisions of the Payment of wages Act, 1936, Minimum Wages Act, 1948, Employees Liability Act, 1938, Workmen's Compensation Act, 1923, Industrial Disputes Act, 1947, Maternity Benefits Act, 1961, and the Contractor's Labour (Regulation and Abolition) Act 1970, or the modifications thereof or any other laws relating thereto and the rule made thereunder from time to time. vi. The contractor shall indemnify and keep indemnified Authority against payments to be made under and for the observance of the laws aforesaid and the AAI Contractor's Labour Regulations without prejudice to his right to claim indemnity from his sub-contractors. vii. The laws aforesaid shall be deemed to be a part of this contract and any breach thereof shall be deemed to be a breach of this contract. viii. Whatever is the minimum wage for the time being, or if the wage payable is higher than such wage, such wage shall be paid by the contractor to the workmen directly without the intervention of Jamadar and that Jamadar shall not be entitled to deduct or recover any amount from the minimum wage payable to the workmen as and by way of commission or otherwise. ix. The contractor shall ensure that no amount by way of commission or otherwise is deducted or recovered by the jamadar from the wage of workmen.
--	--



CLAUSE 19 C

		In respect of all labour directly or indirectly employed in the work for the performance of the contractor's part of this contract, the contractor shall at his own expense arrange for the safety provisions as per AAI Safety Code framed from time to time and shall at his own expense provide for all facilities in connection therewith. In case the contractor fails to make arrangement and provide necessary facilities as aforesaid, he shall be liable to pay a penalty of Rs. 200/- for each default and in addition, the Engineer-in charge shall be at liberty to make arrangement and provide facilities as aforesaid and recover the costs incurred in that behalf from the contractor.
--	--	---

CLAUSE 19 D

		The contractor shall submit by the 4th and 19th of every month, to the Engineer-in charge a true statement showing in respect of the second half of the preceding month and the first half of the current month respectively: - the number of labourers employed by him on the work, - their working hours, - the wages paid to him, - the accidents that occurred during the said fortnight showing the circumstances under which they happened and the extent of damage and injury caused by them, and - the number of female workers who have been allowed maternity benefit according to Clause 19F and the amount paid to them Failing which the contractor shall be liable to pay to AAI, a sum not exceeding Rs. 200/- for each default or materially incorrect statement. The decision of the Engineer-in-charge shall be final in deducting from any bill due to the contractor; the amount levied as fine and shall be binding on the contractor.
--	--	---

CLAUSE 19 E

		In respect of all labour directly or indirectly employed in the works for the performance of the contractor's part of this contract, the contractor shall comply with or cause to be complied with all the rules framed by AAI from time to time for the protection of health and sanitary arrangements for workers employed by the AAI and its contractor.
--	--	---

CLAUSE 19 F

		Leave and pay during leave shall be regulated as follows: - Leave: - In the case of delivery - maternity leave not exceeding 8 weeks, 4 weeks upto and including the day of delivery and 4 weeks following that day. - In the case of miscarriage - upto 3 weeks from the date of miscarriage. - Pay: - In the case of delivery – leave pay during maternity leave will be at the rate of women's average daily earnings, calculated on total wages earned on the days when full time work was done during a period of three months immediately preceding the date on which she gives notice that she expects to be confined or at the rate of Rupee one only a day whichever is greater. - In the case of miscarriage – leave pay at the rate of average daily earning
--	--	--



		calculated on the total wages earned on the days when full time work was done during a period of three months immediately preceding the date of such miscarriage. 3. Conditions for the grant of Maternity Leave: No maternity leave benefit shall be admissible to a woman unless she has been employed for a total period of not less than six months immediately preceding the date on which she proceeds on leave. 4. The contractor shall maintain a register of Maternity (Benefit) in the Prescribed Form as shown in appendix – III and IV, and the same shall be kept at the place of work.
--	--	---

CLAUSE 19 G

		In the event of the contractor (s) committing a default or breach of any of the provisions of the Airports Authority of India Contractor's Labour Regulations and Model Rules for the protection of health and sanitary arrangements for the workers as amended from time to time or furnishing any information or submitting or filling any statement under the provisions of the above Regulations and Rules which is materially incorrect, he / they shall, without prejudice to any other liability, pay to the AAI a sum not exceeding Rs.200/- for every default, breach or furnishing, making, submitting, filing such materially incorrect statements and in the event of the contractor(s) defaulting continuously in this respect, the penalty may be enhanced to Rs.200/- per day for each day of default subject to a maximum of 5 per cent of the estimated cost of the work put to tender. The decision of the Engineer-in-Charge shall be final and binding on the parties. Should it appear to the Engineer-in-Charge that the contractor (s) is / are not properly observing and complying with the provision of the AAI Contractor's Labour Regulations and Model Rules and the provisions of the Contract Labour (Regulation and Abolition) Act 1970, and the Contract Labour (R&A) Central Rules 1971, for the protection of health and sanitary arrangements for work – people employed by the contractor (s) (hereinafter referred as “the said Rules”) the Engineer-in-Charge shall have power to give notice in writing to the contractor (s) requiring that the said Rules be complied with and the amenities prescribed therein be provided to the work-people within a reasonable time to be specified in the notice. If the contractor (s) shall fail within the period specified in the notice to comply with and/ observe the said Rules and to provide the amenities to the work-people as aforesaid, the Engineer-in-Charge shall have the power to provide the amenities hereinbefore mentioned at the cost of the contractor (s). The contractor (s) shall erect, make and maintain at his / their own expense and to approved standards all necessary huts and sanitary arrangements required for his / their work –people on the site in connection with the execution of the works, and if the same shall not have been erected or constructed, according to approved standards, the Engineer-in-Charge shall have power to give notice in writing to the contractor (s) requiring that the said huts and sanitary arrangements be remodeled and / or reconstructed according to approved standards, and if the contractor (s) shall fail to remodel or reconstruct such huts and sanitary arrangements according to approved standards within the period specified in the notice, the Engineer-in-Charge shall have the power to remodel or reconstruct such huts and sanitary arrangements according to approved standards at the cost of the contractor (s).
--	--	--



CLAUSE 19 H

		The contractor (s) shall at his / their own cost provided his / their labour with a sufficient number of huts (hereinafter referred to as the camp) on the following specifications on a suitable plot of land to be approved the Engineer in Charge. i. Facility to be provided a. The minimum height of each hut at the eaves level shall be 2.10m (7ft.) and the floor area to be provided will be at the rate of 2.7 sq.m. (30 sq.ft.) for each member of the worker's family staying with the labourer. b. The contractor shall in addition construct suitable cooking places having a minimum area of 1.80m x 1.50m (6' x 5') adjacent to the hut for each family.
		c. The contractor(s) shall also construct temporary latrines and urinals for the use of the labourers each on the scale of not less than four per each one hundred of the total strength, separate latrines and urinals being provided for women. d. The contractor (s) shall construct sufficient number of bathing and washing places one unit for every 25 persons residing in the camp. These bathing and washing places shall be suitably screened. ii. Specifications a. All the huts shall have walls of sun-dried or burnt bricks laid in mud mortar or other suitable local materials as may be approved by the Engineer in Charge in case of sun dried bricks, the walls should be plastered with mud gobri on both sides. The floor may be kutchra but plastered with mud gobri and shall be at least 15 cm (6") above the surrounding ground. The roofs shall be laid with the thatch or any other materials as may be approved by the Engineer in Charge and the contractor shall ensure that throughout the period of their occupation, the roofs remain water tight. b. The contractor (s) shall provide each hut with proper ventilation. c. All doors, windows and ventilators shall be provided with suitable leaves for security purposes. d. There shall be kept an open space of at least 7.2 m (8 yards) between the rows of huts which may be reduced to 6m (20 ft.) according to the availability of site with the approval of the Engineer in Charge. Back to back construction will be allowed. iii. Water Supply The contractor (s) shall provided adequate supply of water for the use of labourers. The provisions shall not be less than two gallons of pure and wholesome water per head per day for drinking purposes and three gallons of clean water per head per day for bathing and washing purposes. Where piped water supply is available supply shall be at stand posts and where the supply is from wells or river, tanks which may be of metal or masonry, shall be provided. The contractor (s) shall also at his / their own cost make arrangements for laying pipe lines for water supply to his / their labour camp from the existing mains wherever available and shall pay all fees and charges therefor. iv. The site selected for the camp shall be high ground, removed from jungle. v. Disposal of Exereta: The contractor (s) shall make necessary arrangement for the disposal of exereta from the latrines by trenching or incineration which shall be according to the requirements laid down by the Local Health Authorities. If trenching or incineration is not allowed, the contractor (s) shall make arrangements for the removal of the exereta through the Municipal Committee / authority and inform it about the number of labourers employed so that arrangements may be made by such Committee / authority for the removal of exereta. All charges on this account shall be borne by the contractor and paid direct by him to the



		Municipality / authority. The contractor shall provide one sweeper for every eight seats in case of dry system. vi. Drainage The contractor (s) shall provide efficient arrangements for draining away sullage water so as to keep the camp neat and tidy. vii. The contractor (s) shall make necessary arrangements for keeping the camp area sufficiently lighted to avoid accidents to the workers. viii. Sanitation The contractor(s) shall make arrangements for conservancy and sanitation in the labour camps according to the rules of the Local Public Health and Medical Authorities.
--	--	--

CLAUSE 19 I

		The Engineer-in-Charge may require the contractor to dismiss or remove from the site of the work any person or persons in the contractors' employ upon the work who may be incompetent or misconduct himself and the contractor shall forthwith comply with such requirements. In respect of maintenance/repair or renovation works etc. where the labour have an easy access to the individual work premises, the contractor shall issue identity cards to the labourers, whether temporary or permanent and he shall be responsible for any untoward action on the part of such labour. Assistant Manager/Junior Executive will display a list of contractors working in the colony/Blocks on the notice board in the colony and also at the service center, to apprise the residents about the same.
--	--	--

CLAUSE 19 J

		It shall be the responsibility of the contractor to see that the building under construction is not occupied by anybody unauthorized during construction, and is handed over to the Engineer-in-Charge with vacant possession of complete building. If such building though completed is occupied illegally, then the Engineer-in-Charge shall have the option to refuse to accept the said building/buildings in that position. Any delay in acceptance on this account will be treated as the delay in completion and for such delay, a levy upto 5% of tendered value of work may be imposed by the General Manager Engg. Whose decision shall be final both with regard to the justification and quantum and be binding on the contractor. However, the Executive Director Engg., through a notice may require the contractor to remove the illegal occupation any time on or before construction and delivery.
--	--	--

CLAUSE 19 K

	Employment of skilled / semiskilled workers	The contractor shall at all stages of work deploy skilled / semi-skilled tradesmen who are qualified and possess certificate in particular trade from CPWD Training Institute / Industrial Training Institute/National Institution of Construction Management and research (NICMAR) National Academy of Construction, CIDC or any similar reputed and recognized Institute managed / certified by State / Central Government. The number of such qualified tradesmen shall not be less than 20% of total skilled / semi-skilled workers required in each trade at any stage of work. The contractor shall submit number of man days required in respect of each trade, its scheduling and the list of qualified tradesmen along with requisite certificate from recognized Institute to Engineer in charge for approval. Notwithstanding such approval, if the tradesmen are found to have inadequate skill to execute the work of respective trade, the contractor shall substitute such tradesmen within two days of
--	--	---



		written notice from Engineer –in- Charge. Failure on the part of contractor to obtain approval of Engineer-in-Charge or failure to deploy qualified tradesmen will attract a compensation to be paid by contractor at the rate of Rs.100 per such tradesman per day. Decision of Engineer in Charge as to whether particular tradesman possesses requisite skill and amount of compensation in case of default shall be final and binding. Provided always, that the provision of this clause shall not be applicable for works with estimated cost put to tender being less than Rs.5 crores.
--	--	--

CLAUSE 19 L

	Contribution of EPF and ESI	The ESI and EPF contributions on the part of employer in respect of this contract shall be paid by the contractor. These contributions on the part of the employer paid by the contractor shall be reimbursed by the Engineer-in-charge to the contractor on actual basis. The verification of deployment of labour will be done through biometric attendance system or any other suitable method by the Engineer in Charge. The applicable and eligible amount of EPF & ESI shall be reimbursed preferably within 7 days but not later than 30 days of submission of documentary proof of payment provided same are in order.
--	------------------------------------	---

CLAUSE 19 M

	Compliance of NGT guidelines	The contractor is required to follow latest NGT guidelines at the construction site and any violation of such guidelines will be in his account.
--	-------------------------------------	---

CLAUSE 20

	Minimum Wages Act to be Complied with	The contractor shall comply with all the provision of the Minimum Wages Act, 1948, and Contract Labour (Regulation and Abolition) Act, 1970 amended from time to time and rules framed thereunder and other labour laws affecting contract labour that may be brought into force from time to time.
--	--	--

CLAUSE 20(A)

	Employees Provident Fund & Miscellaneous Provision Act 1952/Jammu & Kashmir Employees Provident Funds (and Miscellaneous Provisions) Act, 1961 and State Insurance (ESI) Act, 1948.	The Contractor shall comply with all the provisions of the Employees Provident Fund & Misc. Provisions Act, 1952/ Jammu & Kashmir Employees Provident Funds (and Miscellaneous Provisions) Act, 1961 and ESI Act, 1948, amended from time to time and rules framed thereunder. Some of the provisions are given below: a. The contractor shall intimate his PF Account Code No. allotted by Regional PF Commissioner and ESI Registration No. allotted by ESI Corporation after award of work and shall continue to have valid PF Account Code No. and ESI Registration No. till actual completion of the contract. b. The contractor shall provide a list of contract Workers engaged for contract work along with their PF Account No. & ESI Registration No. c. The contractor by 20th of every month shall provide a monthly statement showing recoveries of contribution and proof of remittance of provident fund contribution to RPFC and ESI contributions to ESI Corporation in respect of Workers engaged in contract work. d. The contractor shall provide copies of PF & ESI challans of monthly contributions in respect of contract workers engaged for contract work on month to month basis. AAI reserves the right to withhold minimum amount as detailed under, from the
--	---	--



		running account payments, if PF / ESI contributions are not paid by the contractor and proof to that effect have not been produced regularly on due dates. To withhold 3% for building work & 1.5% for road/pavement work of the total amount of work done during the period considered.
		ESI & EPF amount paid to the statutory authorities by the contractor shall be reimbursed on actual basis on submission of documentary evidence.

CLUASE 21

	Work not to be sublet. Action in case of insolvency	The contract shall not be assigned or sublet without the written approval of Engineer-in-Charge. And if the contractor shall assign or sublet his contract, or attempt to do so, or become insolvent or commence any insolvency proceedings or make any composition with his creditors or attempt to do so, or if any bribe, gratuity, gift, loan, perquisite, reward or advantage pecuniary or otherwise, shall either directly or indirectly, be given, promised or offered by the contractor, or any of his servants or agent to any public officer or person in the employ of AAI in any way relating to his office or employment, or if any such officer or person shall become in any way directly or indirectly interested in the contract, the Engineers in Charge on behalf of the AAI shall have power to adopt the course specified in Clause 3 hereof in the interest of AAI and in the event of such course being adopted, the consequences specified in the said Clause 3 shall ensue.
--	--	--

CLUASE 22

		All sums payable by way of compensation under any of these conditions shall be considered as reasonable compensation to be applied to the use of AAI without reference to the actual loss or damage sustained and whether or not any damage shall have been sustained.
--	--	--

CLAUSE 23

	Changes in firm's Constitution to be intimated	Where the contractor is a partnership firm, the previous approval in writing of the Engineer-in-Charge shall be obtained before any change is made in the constitution of the firm. Where the contractor is an individual or a Hindu undivided family business concern such approval as aforesaid shall likewise be obtained before the contractor enters into any partnership agreement where under the partnership firm would have the right to carry out the works hereby undertaken by the contractor. If previous approval as aforesaid is not obtained, the contract shall be deemed to have been assigned in contravention of Clause 21 hereof and the same action may be taken and the same consequences shall ensue as provided in the said Clause 21.
--	---	---

CLAUSE 24

		All works to be executed under the contract shall be executed under the direction and subject to the approval in all respects of the Engineer-in-Charge who shall be entitled to direct at what point or points and in what manner they are to be commenced, and from time to time carried on.
--	--	--



CLAUSE 25

	Dispute Resolution Mechanism and Arbitration	All disputes or differences which may arise out of or in connection with or incidental to the Agreement(s) including any dispute or difference regarding the interpretation of terms and conditions of any clause(s) thereof shall be dealt with as provided hereinafter: (i) Through Mediation: All dispute(s), at the first instance, shall be referred to the Mediation Committee of Independent Experts (MCIE) or individual mediator for mediation as per AAI Mediation Policy and applicable laws. All cost of mediation, shall be borne equally by the parties. In case either party withdraws from the Mediation or the dispute(s) is not resolved within 120 days of reference to the Mediation, then the aggrieved party may invoke arbitration through sub para (ii) within 30 days from the date of receipt of Partial Settlement Agreement or Failure Report. (ii) Adjudication through Arbitration: In case no final settlement has been arrived at between the parties after mediation or partially settled as per sub Para (i) above, the unresolved dispute(s), on invocation by the aggrieved party shall be referred for adjudication by arbitration’ Arbitration is restricted to disputes with a value of less than Rs.10 Crores. The dispute shall be referred to a Sole Arbitrator to be appointed by Chairman/Member, AAI, after obtaining consent of the other party, as per format annexed at APPENDIX-XVII. Unless the contract has already been repudiated or terminated, the parties shall, in every case, continue to proceed to perform their respective obligations under the agreement. Arbitration proceedings shall be conducted in accordance with the provisions of the Arbitration and Conciliation Act, 1996, as amended from time to time. Fee payable to the Arbitrator(s) shall be as per Schedule-IV of the Arbitration & Conciliation Act, 1996 and shall be borne by both the parties equally. No dispute shall be referred for resolution under this clause through arbitration in matters for which eviction & recovery procedure is provided under Chapter -VA of the Airports Authority of India Act, 1994. In the event of any dispute or difference relating to the interpretation and application of the provisions of commercial contract(s) between Central Public Sector Enterprises (CPSEs) / Port Authorities Inter-se and also between CPSEs and Government Departments/Organizations (excluding disputes relating(to Railways, Income Tax , Customs & Excise Departments) , such dispute or difference shall be taken up by either party for its resolution through AMRCD as mentioned in DPE OM No. DPE-02/0001/2023- AMRCD-FTS-13578 dated 8th December 2025 and the decision of AMRCD on the said dispute will be binding on both the parties
--	---	--



CLAUSE 26

	Contractor to indemnify AAI against Patent Rights	The contractor shall fully indemnify and keep indemnified the Chairman AAI against any action, claim or proceeding relating to infringement or use of any patent or design or any alleged patent or design rights and shall pay and royalties which may be payable in respect of any article or part thereof included in the contract. In the event of any claims made under or action brought against AAI in respect of any such matters as aforesaid, the contractor shall be immediately notified thereof and the contractor shall be at liberty, at his own expense, to settle any dispute or to conduct any litigation that may arise there from, provided that the contractor shall not be liable to indemnify the AAI if the infringement of the patent or design or any alleged patent or design right is the direct result of an order passed by the Engineer-in-Charge in this behalf.
--	--	--

CLAUSE 27

	Lump sum Provisions in Tender	When the estimate on which a tender is made, includes lump sum in respect of parts of the work, the contractor shall be entitled to payment in respect of the items of work involved or the part of the work in question at the same rates as are payable under this contract for such items, or if the part of work in question is not, in the opinion of the Engineer in Charge payable of measurement, the Engineer in Charge may at his discretion pay the lump sum amount entered in the estimate, and the certificate in writing of the Engineer in Charge shall be final and conclusive against the contractor with regard to any sum or sums payable to him under the provision of the clause.
--	--------------------------------------	---

CLAUSE 28

	Action where no specifications are specified	In the case of any class of work for which there is no such specifications as referred to in Clause 11, such work shall be carried out in accordance with the Bureau of Indian Standards Specifications. In case there are no such specifications in Bureau of Indian Standards, the work shall be carried out as per manufacturers' specifications. In case there are no such specifications as required above, the work shall be carried out in all respects in accordance with the instructions and requirements of the Engineer-in-Charge.
--	---	--

CLAUSE 29

	With-holding and lien in respect of sums due from contractor	i. Whenever any claims for payment of a sum of money arises out of or under the contract or against the contractor, the Engineer-in-Charge or the AAI shall be entitled to withhold and also have a lien to retain such sum or sums in whole or in part from the security, if any deposited by the contractor and for the purpose aforesaid, the Engineer-in-Charge or the AAI shall be entitled to
--	---	--



		withhold the security deposit if any, furnished as the case may be and also have a lien over the same pending finalization or adjudication of any such claim. In the event of the security being insufficient to cover the claimed amount or amounts or if no security has been taken from the contractor, the Engineer-in-Charge or the AAI shall be entitled to withhold and have lien to retain to the extent of such claimed amount or amounts referred to above from any sum or sums found payable or which may at any time thereafter become payable to the contractor under the same contract or any other contract with the Engineer-in Charge of the AAI or any contracting person through the Engineer-in-Charge pending finalization of adjudication of any such claim. i. It is an agreed term of the contract that the sum of money or moneys so withheld or retained under the lien referred to above by the Engineer-in-Charge or AAI will be kept withheld or retained as such by the Engineer-in-Charge or AAI till the claim arising out of or under the contract is determined by the arbitrator. (if the contract is governed by the arbitration clause) or by the competent court, as the case may be and that the contractor will have no claim for interest or damages whatsoever on any account in respect of such withholding or retention under the lien referred to above and duly notified as such to the contractor. For the purpose of this clause, where the contractor is a partnership firm or a limited company, the Engineer-in-Charge or the AAI shall be entitled to withhold and also have a lien to retain towards such claimed amount or amounts in whole or in part from any sum found payable to any partner/limited company as the case may be, whether in his individual capacity or otherwise. ii. AAI shall have the right to cause an audit and technical examination of the works and the final bills of the contractor including all supporting vouchers, abstract, etc., to be made after payment of the final bill and if as a result of such audit and technical examination any sum is found to have been overpaid in respect of any work done by contractor under the contract or any work claimed to have been done by the him under the contract and found not to have been executed, the contractor shall be liable to refund the amount of over payment and it shall be lawful for AAI to recover the same from him in the manner prescribed in sub-clause (i) of this clause or in any other manner legally permissible; and if it is found that the contractor was paid less than what was due to him under the contract in respect of any work executed by him under it, the amount of such under payment shall be duly paid by AAI to the contractor, without any interest thereon whatsoever. Provided that the AAI shall not be entitled to recover any sum overpaid, nor the contractor shall be entitled to payment of any sum paid short where such payment has been agreed upon between the Executive Director Engineering / General Manager Engineering on the one hand and the contractor on the other under any term of the contract permitting payment for work after assessment by the Executive Director Engineering / General Manager Engineering.
--	--	---

CLAUSE 29 A

	Lien in respect of claims in other Contracts	i. Any sum of money due and payable to the contractor (including the security deposit refundable to him) under the contract may be withheld or retained by way of lien by the Engineer-in-Charge or the AAI or any other contracting person or persons through Engineer-in-Charge against any claim of the Engineer-in-Charge or AAI or such other person or persons in respect of payment of a sum of money arising out of or under any other contract made by the contractor with the Engineer-in-Charge or the AAI or with such other person or persons. ii. It is an agreed term of the contract that the sum of money so withheld or
--	---	---



		retained under this clause by the Engineer-in-Charge or the AAI will be kept withheld or retained as such by the Engineer-in-Charge or the AAI or till his claim arising out of the same contract or any other contract is either mutually settled or determined by the arbitration clause or by the competent court, as the case may be and that the contractor shall have no claim for interest or damages whatsoever on this account or on any other ground in respect of any sum of money withheld or retained under this clause and duly notified as such to the contractor.
--	--	---

CLAUSE 30

Employment of coal mining or controlled area labour not permissible	i. The contractor shall not employ coal mining or controlled area labour falling under any category whatsoever or in connection with the work or recruit labour from area within a radius of 32 km (20 miles) of the controlled area. Subject as above the contractor shall employ imported labour only i.e., deposit imported labour or labour imported by contractors from area, from which import is permitted. ii. Where ceiling price for imported labour has been fixed by State or Regional Labour Committees not more than that ceiling price shall be paid to the labour by the contractor. iii. The contractor shall immediately remove any labourer who may be pointed out by the Engineer-in-Charge as being a coal mining or controlled area labourer. Failure to do so shall render the contractor liable to pay to AAI a sum calculated at the rate of Rs.10/- per day per labourer. The certificate of the Engineer-in –Charge about the number of coal mining or controlled area labourer and the number of days for which they worked shall be final and binding upon all parties to this contract. iv. It is declared and agreed between the parties that the aforesaid stipulation in this clause is one in which the public are interested within the meaning of the exception in Section 74 of Indian Contract Act, 1872. Explanation :- Controlled area mean the following areas: Districts of Dhanbad, Hazaribagh, Jamtara- Sub-Division under Santhal Pargana Commissionery, District of Bankura, Birbhum, Burdwan, District of Bilaspur. Any other area which may be declared a Controlled Area by or with the approval of the Central Government.
--	--

CLAUSE 31

Unfiltered water supply	The contractor(s) shall make his/their own arrangements for water required for the work and nothing extra will be paid for the same. This will be subject to the following conditions: i. That the water used by the contractor (s) shall be fit for construction purposes to the satisfaction of the Engineer in Charge. ii. The Engineer in Charge shall make alternative arrangements for supply of water at the risk and cost of contractor (s) if the arrangements made by the contractor (s) for procurement of water are in the opinion of the Engineer in Charge, unsatisfactory.
--------------------------------	---

CLAUSE 31A

Departmental water supply, if available	Water if available may be supplied to the contractor by the department subject to the following conditions:- i. The water charges @1% shall be recovered on gross amount of the work done.
--	--



		ii. The contractor(s) shall make his/their own arrangement of water connection and laying of pipelines from existing main of source of supply. iii. The Department do not guarantee to maintain uninterrupted supply of water and it will be incumbent on the contractor (s) to make alternative arrangements for water at his/their own cost in the event of any temporary break down in the AAI's water main so that the progress of his/their work is not held up for want of water. No claim of damage or refund of water charges will be entertained on account of such break down.
--	--	--

CLAUSE 32

	Alternate water arrangements	i. Where there is no piped water supply arrangement and the water is taken by the contractor from the wells or hand pump constructed by the AAI, no charge shall be recovered from the contractor or that account. The contractor shall, however, draw water at such hours of the day that it does not interfere with the normal use for which the hand pumps and well are intended. He will also be responsible for all damage and abnormal repairs arising out of his use, the cost of which shall be recoverable from him. The Engineer in Charge shall be the final authority to determine the cost recoverable from the contractor on this account and his decision shall be binding on the contractor. ii. The contractor shall be allowed to construct temporary wells in AAI land for taking water for construction purposes only after he has got permission of the Engineer in Charge in writing. No charges shall be recovered from the contractor on this account but the contractor shall be required to provide necessary safety arrangements to avoid any accidents or damage to adjacent buildings, roads and service lines. He shall be responsible for any accidents or damage caused due to construction and subsequent maintenance of the wells and shall restore the ground to its original condition after the wells are dismantled on completion of the work.
--	-------------------------------------	--

CLAUSE 33

	Return of Surplus materials	Notwithstanding anything contained to the contrary in this contract, where any materials for the execution of the contract are procured with the assistance of AAI either by issue from AAI stocks or purchase made under orders or permits or licenses issued by AAI, the contractor shall hold the said materials economically and solely for the purpose of the contract and not dispose of them without the written permission of the AAI and return, if required by the engineer-in-Charge, all surplus or unserviceable materials that may be left with him after the completion of the contract or at its termination for any reason whatsoever on being paid or credited such prices as the Engineer-in-Charge shall determine having due regard to the condition of the materials. The price allowed to the contractor however shall not exceed the amount charged to him excluding the element of storage charges. The decision of the Engineer-in-Charge shall be final and conclusive. In the event of breach of the aforesaid condition, the contractor shall in addition to throwing himself open to action for contravention of the terms of the license or permit and / or for criminal breach of trust, be liable to AAI for all moneys, advantages or profits resulting or which in the usual course would have resulted to him by reason of such breach.
--	------------------------------------	--



CLAUSE 34

	Hire of plant & Machinery	i. The Contractor shall arrange at his own expense all tools, plant, machinery and equipment(hereinafter referred to as T&P) required for execution of the work except for the Plant & Machinery listed in Schedule 'C' and stipulated for issue to the contractor. If the contractor requires any item of T&P on hire from the T&P available with the AAI over and above the T&P stipulated for issue, the AAI will, if such item is available, hire it to the contractor at rates to be agreed upon between him and the Engineer-in-charge. In such a case, all the conditions hereunder for issue of T & P shall also be applicable to such T&P as is agreed to be issued. ii. Plant & Machinery when supplied on hire charges shown in Schedule 'C' shall be made over and taken back at the departmental equipment yard / shed shown in Schedule 'C' and the contractor shall bear the cost of carriage from the place of issue to the site of work and back. The contractor shall be responsible to return the plant and machinery with condition in which it was handed over to him, and he shall be responsible for all damage caused to the said plant and machinery at the site of work or elsewhere in operation and otherwise during transit including damage to or loss of plant and for all losses due to his failure to return the same soon after the completion of the work for which it was issued. The Engineer-in-charge shall be the sole judge to determine the liability of the contractor and its extent in this regard and his decision shall be final and binding on the contractor. iii. The plant and machinery as stipulated above will be issued as and when available and if required by the contractor. The contractor shall arrange his programme of work according to the availability of the plant and machinery and no claim, whatsoever, will be entertained from him for any delay in supply by the department. iv. The hire charges shall be recovered at the prescribed rates from and inclusive of the date the plant and machinery made over up to and inclusive of the date of the return in good order even though the same may not have been working for any cause except major breakdown due to no fault of the contractor or faulty use requiring more than three working days continuously (excluding intervening holidays and Sundays) for bringing the plant in order. The contractor shall immediately intimate in writing to the Engineer-in-charge when any plant or machinery gets out of order requiring major repairs as aforesaid. The Engineer-in-charge shall record the date and time of receipt of such intimation in the log sheet of the plant or machinery. Based on this if the breakdown before lunch period or major breakdown will be computed considering half a day's breakdown on the day of complaint. If the breakdown occurs in the post lunch period of major breakdown will be computed starting from the next working day. In case of any dispute under this clause, the decision of the Executive Director (Engg) /General Manager (Engg) shall be final and binding on the contractor. v. The hire charges shown above are for each day of 8 hours (inclusive of the one hour lunch break) or part thereof. vi. Hire charges will include service of operating staff as required and also supply of lubricating oil and stores for cleaning purposes. Power fuel of approved type, firewood, kerosene oil etc. for running the plant and machinery and also the full time chowkidar for guarding the plant and machinery against any loss or damage shall be arranged by the contractor who shall be fully responsible for the safeguard and security of plant and machinery. The contractor shall on or before the supply of plant and machinery sign an agreement indemnifying the Department against any loss or damage caused to the plant and machinery either during transit or at site of work. vii. Ordinarily, no plant and machinery shall work for more than 8 hours a day inclusive of one hour lunch break. In case of an urgent work however, the
--	--------------------------------------	--



		Engineer-in charge may, at his discretion, allow the plant and machinery to be worked for more than normal period of 8 hours a day. In that case, the hourly hire charges for overtime to be borne by the contractor shall be 50% more than the normal proportionate hourly charges (1/8th of the daily charges) subject to a minimum of half day's normal charges on any particular day. For working out hire charges for over time, a period of half an hour and above will be charged as one hour and a period of less than half an hour will be ignored. viii. The contractor shall release the plant and machinery every seventh day for periodical servicing and / or wash out which may take about three to four hours or more. Hire charges for full day shall be recovered from the contractor for the day of servicing / wash out irrespective of the period employed in servicing. ix. The plant and machinery once issued to the contractor shall not be returned by him on account of lack of arrangements of labour and materials, etc. on his part, the same will be returned only when they are required for major repairs or when in the opinion of the Engineer-in-charge, the work or a portion of work for which the same was issued is completed. x. Log Book for recording the hours of daily work for each of the plant and machinery supplied to the contractor will be maintained by the Department and will be countersigned by the contractor or his authorized agent daily. In
		case the contractor contests the correctness of the entries and / or fails to sign the Log Book, the decision of the Engineer-in-charge shall be final and binding on him. Hire charges will be calculated according to the entries in the Log Book and will be binding on the contractor. Recovery on account of hire charges for road rollers shall be made for the minimum number of days worked out on the assumption that a roller can consolidate per day and maximum quantity of materials or area surfacing as noted against each in the annexed statement (see attached annexure). xi. In the case of concrete mixers, the contractors shall arrange to get the hopper cleaned and the drum washed at the close of the work each day or each occasion. (a) In case rollers for consolidation are employed by the contractor himself, log book for such rollers shall be maintained in the same manner as is done in case of departmental rollers, maximum quantity of any items to be consolidated for each roller-day shall also be same as in Annexure to Clause 34(x). For less use of rollers, recovery for the less roller days shall be made at the stipulated issue rate. xii. The contractor shall be responsible to return the plant and machinery in the condition in which it was handed over to him and he shall be responsible for all damage caused to the said plant and machinery at the site of work or elsewhere in operation or otherwise or during transit including damage to or loss of parts, and for all losses due to his failure to return the same soon after the completion of the work for which it was issued. The Engineer-in-charge shall be the sole judge to determine the liability of the contractor and its extent in this regard and his decision shall be final and binding on the contractor. xiii. The contractor will be exempted from levy of any hire charges for the number of days he is called upon in writing by the Engineer-in-charge to suspend execution of the work, provided AAI's plant and machinery in question have, in fact, remained idle with the contractor because of the suspension. xiv. In the event of the contractor not requiring any item of plant and machinery issued by AAI though not stipulated for issue in Schedule 'C' any time after taking delivery at the place of issue, he may return it after two days written notice or at any time without notice if he agrees to pay hire charges for two additional days without, in any way, affecting the right of the Engineer-in- charge to use the said plant and machinery during the said period of two days as he likes including hiring out to a third party.



CLAUSE 35

	Condition relating to use of asphaltic materials	i. The contractor undertakes to make arrangement for the supervision of the work by the firm supplying the tar or bitumen used. ii. The contractor shall collect the total quantity of tar or bitumen required for the work as per standard formula, before the process of painting is started and shall hypothecate it to the Engineer in Charge. If any bitumen or tar remains unused on completion of the work on account of lesser use of materials in actual execution of for reasons other than authorised changes of specifications and abandonment of portion of work, a corresponding deduction equivalent to the cost of unused materials as determined by the Engineer in Charge shall be made and the material return to the contractors. Although the materials are hypothecated to AAI, the contractor undertakes the responsibility for their proper watch, safe custody and protection against all risks. The materials shall not be removed from site of work without the consent of the Engineer in Charge in writing. iii. The contractor shall be responsible for rectifying defects noticed within a year from the date of completion of the work and the portion of the security deposit relating asphaltic work shall be refunded after the expiry of this period.
--	---	---

CLAUSE 36

	Employment of Technical Staff and employees	Contractors Superintendence, Supervision, Technical staff & Employees i. The contractor shall provide all necessary superintendence during execution of the work and all along thereafter as may be necessary for proper fulfilling of the obligations under the contract. The Contractor shall immediately after receiving letter of acceptance of the tender and before commencement of the work, intimate in writing to the Engineer in Charge, the name (s), qualifications experience, age, address (s) and other particulars along with certificates, of the principal technical representative to be charge of the work and other technical representative (s) who will be supervising the work. Minimum requirement of such technical representative (s) and their qualifications and experience shall not be lower than specified in schedule 'F'. The Engineer in Charge shall within 3 days of receipt of such communication intimate in writing his approval or otherwise of such a representative (s) to the contractor. Any such approval may at any time be withdrawn and in case of such withdrawal, the contractor shall appoint another such representative (s) according to the provisions of this clause. Decision of the tender accepting authority shall be final and binding on the contractor in this respect. Such a principal technical representative and other technical representative (s) shall be appointed by the contractor soon after receipt of the approval from Engineer in-charge and shall be available at site before start of work. All the provisions applicable to the principal technical representative under the clause will also be applicable to other technical representative(s). The principal technical representative and other technical representative (s) shall be present at the site of work for supervision at all times when any construction activity is in progress and also present himself/themselves, as required to the Engineer in Charge and / or his designated representative to take instructions. Instructions given to the principal technical representative or other technical representative (s) shall be deemed to have the same force
--	--	--



	as if these have been given to the contractor. The Principal Technical Representative and other technical representatives shall be actually available at site fully during all stages of execution work, during recording / checking / test checking of measurements of works whenever so required by the Engineer in Charge and shall also note down instructions conveyed by the Engineer in Charge or his designated representative (s) in the site order book and shall affix his/their signature in token of noting down the instructions and in token of acceptance of measurements / checked measurements / test checked measurements. The representative (s) shall not look after any other work. Substitutes, duly approved by engineer in Charge of the work in similar manner as aforesaid shall be provided in event of absence of any of the representative (s) by more than two days. If the Engineer in Charge, whose decision in this respect is final and binding on the contractor, is convinced that no such technical representative (s) is/are effectively appointed or is/are effectively attending or fulfilling the provision of this clause, a recovery (non refundable) shall be effected from the contractor as specified in Schedule 'F' and the decision of the Engineer in Charge as recorded in the site order book and measurement recorded checked/test checked in Measurement Books shall be final and binding on the contractor. Further if the contractor fails to appoint suitable technical Principal technical representative and / or other technical representative (s) and if such appointed persons are not effectively present or are absent by more than two days without duly approved substitute or do not discharge their responsibility satisfactorily, the Engineer in Charge shall have full powers to suspend the execution of the work until such date as suitable other technical representative (s) is / are appointed and the contractor shall be held responsible for the delay so caused to the work. The contractor shall submit a certificate of employment of the technical representative (s) (in the form of copy of Form 16 or CPF deduction issued to the Engineer employed by him) along with every running account bill / final bill and shall produce evidence if at any times so required by the Engineer in Charge. ii. The contractor shall provide and employ on the site only such technical assistants as are skilled, and experienced in their respective fields and such foremen and supervisory staff as are competent to give proper supervision to the work. The contractor shall provide and employ skilled, semi skilled and unskilled labour as is necessary for proper and timely execution of the work. The Engineer in Charge shall be at liberty to object to and require the contractor to remove from the works any person who in his opinion misconducts himself, or is incompetent or negligent in the performance of his duties or whose employment is otherwise considered by the Engineer in Charge to be undesirable. Such person shall not be employed again at works site without the written permission of the Engineer in Charge and the persons so removed shall be replaced as soon as possible by competent substitutes. iii. The contractor shall not change his engineer/supervisory staff after approval of the Engineer In Charge. If Contractor wants to replace any of his staff due to unavoidable circumstances, he will seek permission of Engineer In Charge indicating reasons for such change, qualification and experience of the alternative employee suggested by him. The qualification and experience of the alternative staff shall not be inferior to the person employed earlier.
--	---



CLAUSE 37

	Levy/Taxes/ Royalty/ Land License fee payable by Contractor	1. Taxes: - Rates to be quoted by the parties should be inclusive of all taxes, duties, CESS, fee, royalty charges etc. levied under any statute but excluding GST for all the items However GST, as applicable, shall be paid to the contractor, for any taxable supply / services / construction rendered by the agency to AAI, against a valid GST invoice as per terms and conditions of the contract. - In case supplies /services / works involve imports; the same should be identified separately. Basic Custom Duty & IGST will be paid directly by AAI by utilizing EPCG license/ Duty Credit Scrip under service Export from India Scheme (SEIS) of Govt. of India. 2. Royalty: - The contractor shall at his own expense, provide all materials required for the works other than those which are to be supplied by AAI. The contractor shall deposit royalty and obtain necessary permit for collection of stone, sand, red bajri, kankar etc. from the local authority in the matter and will abide by the notification issued by Central Govt. / State Government / Local State Authorities as applicable from time to time in this regard. The contractor is also bound to allow deduction from his bills any difference in statutory taxes/royalty and penalty proposed by Local State Authorities to AAI till finalization of settlement of all demands in this regard by Central / State Govt. - This will also be applicable to forest produce. - If pursuant to or under any law, notification or order any royalty, cess or the like becomes payable by the AAI and does not any time become payable by the contractor to the State Government. Local authorities in respect of any material used by the contractor in the works then in such a case, it shall be lawful to the AAI and it will have the right and be entitled to recover the amount paid in the circumstances as aforesaid from dues of the contractor. 3. License fee for land The contractor shall be liable to pay license fee for the land allotted by AAI for installation of plants, labour camp, cement godown and site office at AAI prevailing rates of license fee for unpaved land at the time of call of tender. In addition a security deposit at the rate of Rs 500/- per sqm in the form of DD/BG shall also be deposited by the contractor. In case contractor do not deposit security deposit same shall be deducted from Ist Running Account Bill. Such security deposit shall be released only after allotted land has been fully vacated by the contractor to entire satisfaction of Engineer in-Charge.
--	---	--



CLAUSE 38

	Conditions for reimbursement of levy/taxes if levied after receipt of tenders	1. Rates to be quoted by the parties should be inclusive of all taxes, duties, CESS, fee, royalty charges etc. but excluding GST for all the items levied under any statute applicable on last stipulated date of receipt of tender including extension if any. No adjustment i.e. increase or decrease shall be made for any variation in the rate of GSI Building and Other Construction Workers Welfare Cess or any tax, levy or Cess applicable on inputs. However, effect of variation, as per Govt. order after the last date of receipt of tender including extension if any, in rates of GST or Building and Other Construction Workers Welfare Cess or imposition or repeal of any other tax, levy or Cess applicable on output of the works contract shall be adjusted on either side, increase or decrease. Provided further that for Building and Other Construction Workers Welfare Cess or any tax (other than GST), levy or Cess varied or imposed after the last date of receipt of tender including extension if any, any increase shall be reimbursed to the contractor only if the contractor necessarily and properly pays such increased amount of taxes / levies / Cess. Provided further that such increase in tax / levy / Cess including GST shall not reimbursed if made in the extended period of contract for which the contractor alone is responsible for delay as determined by authority for extension of time under Clause 5 in Schedule F. 2. The contractor shall keep necessary books of accounts and other documents for the purpose of this condition as may be necessary and shall allow inspection of the same by a duly authorised representative of AAI or the Engineer-in-Charge and further shall furnish such other information /document as the Engineer-in- Charge may require from time to time. 3. The contractor shall, within a period of 30 days of the imposition of any such further tax or levy or Cess, give a written notice thereof to the Engineer-in-charge that the same is given pursuant to the condition, together with all necessary information / documents relating thereto.
--	--	---

CLAUSE 39

	Termination of contract on death of contractor	Without prejudice to any of the rights or remedies under this contract, if the contractor dies, the Engineer-in-charge on behalf of the AAI shall have the option of terminating the contract without compensation to the contractor.
--	---	---



CLAUSE 40

	If relative working in AAI then the contractor not allowed to tender.	The contractor shall not be permitted to tender for works in AAI wherein his near relative is posted as an Officer responsible for award and execution of work. He shall also intimate the names of persons who are working with him in any capacity or / are subsequently employed by him and who are near relatives to any officer of AAI. Any breach of this condition by the Contractor would render him, the contract liable to be rejected at any stage. NOTE: By the term “near relatives” is meant wife, husband, parents and grand parents, children and grandchildren, brothers and sisters, uncles, aunts and cousins and their corresponding in-laws.
--	--	---

CLAUSE 41

	No any officer in Department of Engineering to work as contractor within one year of retirement	Engineer or any officer employed in engineering or administrative duties in an engineering department of AAI shall not work as a contractor or employee of contractor for a period of one year after his retirement from AAI service without the prior permission of AAI in writing. This contract is liable to be cancelled if either the contractor or any of his employees is found at any time to be such a person who had not obtained the permission of AAI as aforesaid, before submission of the tender or engagement in the contractor’s service, as the case may be.
--	--	---

CLAUSE 41(a)

	Integrity Pact and Independent External Monitor.	Signing of Integrity Pact (As per Appendix XVIII) is mandatory for every bidder/contractor if provided so in Schedule F. All tenderers shall have to submit an undertaking as per Appendix XVIII along with tender documents. AAI shall appoint Independent External Monitor(s) to oversee effective implementation of Integrity Pact for such works/supplies. For this purpose, a panel of Independent External Monitors shall be constituted by the Authority in concurrence with Central Vigilance Commission (CVC). i. The Contractor/Supplier shall have to act in accordance with the conditions laid down in the integrity pact. a. Signing of Integrity Pact is mandatory for every Bidder/Contractor in this procurement/bid process the signed original pact to be send to the office of Bid Manager and should reach before the due date mentioned in NIT. b. The Bidder/contractor shall commit itself to ensure taking all measures necessary to prevent corrupt practices, unfair means and illegal activities during any stage of its bid or during any pre-contract or post-contract stage as specified in section 3 of the integrity pact. c. Any breach of the aforesaid provisions by the Bidder or any one employed by it or acting on its behalf (whether with or without the knowledge of the Bidder) shall entitle the authority to take all or any one of the action as specified in section 6 of the integrity pact. ii. In case any violation of above conduct is established, AAI reserves right to
--	---	--



		take following actions:- a. If contractor commits a violation of its commitments and obligations under the Integrity Pact Program during bidding process, he shall be liable for disqualification from tender process and forfeiture of his Earnest Money Deposit/ Bid Security. b. In case of violation of the Integrity Pact after award of the contract, Authority is entitled to terminate the contract and shall be entitled to demand and recover from the contractor damages equivalent to 5% of the contract value or the amount equivalent to Security Deposit or Performance Bank Guarantee, whichever is higher. c. Authority may initiate appropriate proceedings against the contractor. d. Contractor will be liable to pay damages as determined by the Authority. e. Contractor against whom an action for violation of its commitments and obligations has been taken earlier again commits a violation, the Authority is entitled to debar such contractor for future tender/ contract processes for a period as deemed fit. f. A violation is considered to have occurred if the Authority is fully satisfied with the available documents and evidence submitted along with Independent External Monitor's recommendations / suggestions that no reasonable doubt exist in the matter.
--	--	--

CLAUSE 41(b)

	Code of Integrity	No official of AAI or a bidder shall act in contravention of the codes which includes (i) prohibition of (a) making offer, solicitation or acceptance of bribe, reward or gift or any material benefit, either directly or indirectly, in exchange for an unfair advantage in the procurement process or to otherwise influence the procurement process. (b) any omission, or misrepresentation that may mislead or attempt to mislead so that financial or other benefit may be obtained or an obligation avoided. (c) any collusion, bid rigging or anticompetitive behaviour that may impair the transparency, fairness and the progress of the procurement process. (d) improper use of information provided by the procuring entity to the bidder with an intent to gain unfair advantage in the procurement process or for personal gain. (e) any financial or business transactions between the bidder and any official of the procuring entity related to tender or execution process of contract; which can affect the decision of the procuring entity directly or indirectly. (f) any coercion or any threat to impair or harm, directly or indirectly, any party or its property to influence the procurement process. (g) obstruction of any investigation or auditing of a procurement process. (h) making false declaration or providing false information for participation in a tender process or to secure a contract; (ii) disclosure of conflict of interest. (iii) Disclosure by the bidder of any previous transgressions made in respect of the provisions of sub-clause (i) with any entity in any country during the last three years or of being debarred by any other procuring entity.
--	---------------------------------	---



CLAUSE 42

	Return of material and recovery for excess material issued.	i. After completion of the work and also at any intermediate stage in the event of non-reconciliation of materials issued, consumed and in balance (see Clause 10), Theoretical quantity of materials issued by the AAI for use in the work shall be calculated on the basis and method given hereunder; a. Quantity of cement & bitumen shall be calculated on the basis of quantity of cement & bitumen required for different items of work as shown in the Schedule of Rates mentioned in Schedule 'F'. In case any item is executed for which standard co-efficient for the consumption of cement or bitumen are not available in the above mentioned schedule / statement or cannot be derived from the same shall be calculated on the basis of standard formula to be laid down by the Engineer in Charge. b. Theoretical quantity of steel reinforcement or structural steel sections shall be taken as the quantity required as per design or as authorised by Engineer in Charge, including authorised lappings, chairs etc. plus 3% wastage due to cutting into pieces, such theoretical quantity being determined and compared with the actual issues each diameter wise, section wise and category wise separately. c. Theoretical quantity of G.I. & C.I. or other pipes, conduits, wires and cables pig lead and G.I. / M.S. sheets shall be taken as quantity actually required and measures plus 5% for wastage due to cutting into pieces (except in the case of G.I./M.S. sheets it shall be 10%), such determination & comparison being made diameter wise & category wise. d. For any other material as per actual requirements. ii. Over the theoretical quantities of materials so computed a variation shall be allowed as specified in Schedule 'F'. The difference in the net quantities of material actually issued to the contractor and the theoretical quantities including such authorised variation, if not returned by the contractor or if not fully reconciled to the satisfaction of the Engineer in Charge within fifteen days of the issue of written notice by the Engineer in Charge to this effect shall be recovered at the rates specified in Schedule 'F', without prejudice to the provision of the relevant conditions regarding return of materials governing the contract. Decision of Engineer in Charge in regard to theoretical quantities of materials, which should have been actually used as per the Annexure of the standard schedule of rates and recovery at rates specified in Schedule 'F' shall be final and binding on the contractor. For non scheduled items, the decision of the Engineer in charge regarding theoretical quantities of materials which should have been actually used, shall be final and binding on the contractor. A. The said action under this clause is without prejudice to the right of the AAI to take action against the contractor under any other conditions of contract for not doing the work according to the prescribed specifications. B. For materials brought by the contractor for use in item of work at site, similar theoretical consumption shall be prepared and submitted to the Engineer in Charge for verification. If it is found that material consumed in the work is less than the theoretical consumption after taking into account permissible minus variation, the recovery for corresponding material shall be effected as per rates specified in schedule 'F' under Clause 42.
--	---	---



CLAUSE 43

	Compensation during warlike situations / act of terrorism	The work (whether fully constructed or not) and all materials, machines, tools and plants scaffolding, temporary buildings and other things connected therewith shall be at the risk of the contractor until the work has been delivered to the Engineer-in-Charge and a certificate from him to that effect obtained. In the event of the work or any materials properly brought to the site for incorporation in the work being damaged or destroyed in consequence of hostilities or warlike operation or act of terrorism, the contractor shall when ordered (in writing) by the Engineer-in-Charge to remove any debris from the site, collect and properly stack or remove in store all serviceable materials salvaged from the damaged work and shall be paid at the contract rates in accordance with the provision of this agreement for the work of clearing the site of debris, stacking or removal of serviceable material and for reconstruction of all works ordered by the Engineer-in-Charge, such payments being in addition to compensation upto the value of the work original executed before being damaged or destroyed and not paid for. In case of works damaged or destroyed but not already measured and paid for, the compensation shall be assessed by the Engineer-in charge upto Rs.5,000/- and by the Executive Director Engg. concerned for a higher amount. The contractor shall be paid for the damages / destruction suffered and for restoring the material at the rate based on analysis of rates tendered for in accordance with the provision of the contract. The certificate of the Engineer-in- Charge regarding the quality and quantity of materials and the purpose for which they were collected shall be final and binding on all parties to this contract. Provided always that no compensation shall be payable for any loss in consequence of hostilities or warlike operation (a) unless the contractor had taken all such precautions against air raid as are deemed necessary by the A.R.P. Officers or the Engineer-in- Charge (b) for any material etc. not on the site of the work or for any tools plant, machinery, scaffolding, temporary building and other things not intended for the work. In the event of the contractor having to carry out reconstruction as aforesaid, he shall be allowed such extension of time for its completion as is considered reasonable by the Engineer – in - charge.
--	--	---

CLAUSE 44

	Apprentices Act provisions to be complied with	The contractor shall comply with the provisions of the Apprentices Act, 1961 and the rules and orders issued thereunder from time to time. If he fails to do so, his failure will be a breach of the contract and the Executive Director Engg. / General Manager (Engg.) may, in his discretion, cancel the contract. The contractor shall also be liable for any pecuniary liability arising on account of any violation by him of the provisions of the said Act.
--	---	--

CLAUSE 45

	Release of Security Deposit	The Security Deposit of the work shall be refunded if no labour complaint has been received from the labour officer till the due date of its payment. If a labour complaint is received during this period, the Engineer-in-Charge shall, after issue of notice in this regard to the contractor, withheld the amount required to settle the complaint from his security deposit and refund the balance amount.
--	------------------------------------	--



CLAUSE 46

	Contractor's Liability and Insurance of Works	i. From commencement to completion of the Works, the Contractor shall take full responsibility for the case thereof and for taking precautions to prevent loss or damage and to minimize loss or damage to the greatest extent possible and shall be liable for any damage or loss that may happen to the Works or any part thereof and all AA I's T & P from any cause whatsoever (save and except the Excepted Risks) and shall at his own cost repair and make good the same so that at completion, the Works and all AAI's T & P shall be in good order and condition and in conformity in every respect with the requirements of the Contract and instructions of the Engineer-in-Charge.
		ii. In the event of any loss or damage to the Works or any Part thereof or to any T & P, to any material or articles at the Site from any of the Excepted Risks the following provisions shall have effect: a. The Contractor shall, as may be directed in writing by the Engineer-in-Charge, remove from the Site any debris and so much of the works as shall have been damaged, taking to AAI's store such AAI's T & P, articles and/or materials as may be directed; b. The contractor shall, as may be directed in writing by the Engineer-in-Charge, proceed with the erection and completion of the Works under and in accordance with the provisions and Conditions of the Contract; and iii. Provided always that the Contractor shall not be entitled to payment under the above provisions in respect of so much loss or damage as has been occasioned by any failure on his part to perform his obligation under the Contract or not taking precautions to prevent loss or damage or minimize the amount of such loss or damage. iv. Without limiting its obligations and responsibilities under other clauses of General Conditions of Contracts ,the contractor at his own cost shall insure ,in the joint name of AAI and the contractor, against all losses or damages from whatever cause, arising (other than the accepted risks)for which he is responsible under the terms of the contract and in such manner that the AAI and the contractor are covered during the period of construction of works and any loss or damage occasioned by the contractor in the course of any operation carried out by them for the purpose of complying with its obligations of defects liability clause hereof; a. All works including temporary works to their full value executed from time to time. b. The construction materials and equipment's to their full value brought on to the site by the contractor. v. The Contractor shall indemnify and keep indemnified AAI against all losses and claims for injuries or damage to any persons or any property whatsoever which may arise out of or in consequence of the construction and maintenance of Works and against all claims, demands proceedings, damage costs, charges and expenses whatsoever in respect of or in relation thereto. vi. Before commencing execution of the work, the Contractor shall, without in any way limiting his obligations and responsibilities under this condition, insure at his own cost against any damage, loss or injury which may occur to any AAI property, or to any person for at least the minimum amount of Rs. 1.00 lakh with unlimited number of occurrences (including any employee of AAI) by or arising out of carrying out of the Contract. vii. The contractor shall at all times indemnify AAI against all claims, damages or compensation under the provisions of Payment or Wages Act, 1936, Minimum Wages Act, 1948, Employer's Liability Act, 1938, the Workmen's Compensation Act, 1923, Industrial Disputes Act, 1947 and the Maternity



		Benefit Act, 1961 or any modifications thereof or any other law relating thereto and rules made there under from time to time or as a consequence of any accident or injury to any workman or other persons in or about the Works, whether in the employment of the Contractor or not, his agents or servants, and also against all costs, charges and expenses of any suit, action or proceedings arising out of such accident or injury and against all sum or sums which may with the consent of the Contractor be paid to compromise or compound any claim. Without limiting his obligations and liabilities as above provided, the Contractor shall insure against all claims, damages or compensation payable under the Workmen's Compensation Act, 1923 or any modification thereof or any other law relating thereto. viii. All insurance mentioned above shall be effected with any subsidiary of the General Insurance Company of India or by a company approved by the Insurance Regulatory Authority of India. ix. The aforesaid insurance policy / policies shall provide that they shall not be cancelled till the Engineer-in-Charge has agreed to their cancellation in writing. x. The Contractor shall prove to the Engineer-in-Charge from time to time that he has taken out all the insurance policies referred to above and has paid the necessary premiums for keeping the policies alive till expiry of the Defects Liability Period. A self-certified copy of such policies is required to be submitted to the Engineer-in-charge. xi. The Contractor shall ensure that similar insurance policies are taken out by his subcontractors (if any) and shall be responsible for any claims or losses to AAI resulting from their failure to obtain adequate insurance protection in connection thereof. The contractor shall produce or cause to be produced by his subcontractor (if any) as the case may be, the relevant policy or policies and premiums receipts as and when required by the Engineer-in-Charge. A self-certified copy of such policies is required to be submitted to the Engineer-in-charge. xii. If the Contractor and/or his subcontractor (if any) shall fail to effect and keep in force the insurance referred to above or any other insurance which he/they may be required to effect under the terms of the Contract then and in any such case AAI may, without being bound to, effect and keep in force any such insurance and pay such premium or premiums as may be necessary for that purpose and from time to time deduct the amount equivalent to 150% of premium or premiums as may be by AAI from any moneys due or which may become due to the Contractor or recover the same as a debt due from the Contractor only after issuing notice to contractor in this regard. Engineer-In-Charge shall ensure that all applicable insurance shall be in force without any break as per contract requirement to avoid any losses to AAI on account of non-availability of insurance policies and/or break in insurances policies. xiii. In case contractor takes Contractor All Risk (CAR) Policy in joint name of AAI and Contractor for full tendered value along with third party liability (max of 10% of tendered value or as applicable as per Insurance Regulatory Authority of India) then there is no requirement for taking separate insurance by sub-contractors. However, workmen compensation policy is required to be taken separately by main contractor and sub-contractor for workers employed by them.
--	--	---

CLAUSE 47

	Composite Contract and responsibilities of main agency	i. The tenders have been called for composite work consisting of civil construction and other associated specialized works. The pre-qualification criteria shall be applicable for each subhead of work independently. The agency meeting PQ criteria for the main work shall be considered for execution of composite work. However the agency shall be allowed to execute only those specialized subheads of works for which bidder meet PQ criteria individually.
--	--	--



		ii. The main contractor shall be permitted to execute only those works (covered under one or more subhead) for which he meets all requirements of pre-qualification including financial, technical and technological requirement specified in the PQ criteria. iii. Main contractor will associate expert agencies for the execution of specialized works under various subheads for which he himself has failed to meet PQ criteria. In such case he will appoint his associate for the execution of each specialized work with the approval of the NIT approving authority. The main contractor shall intimate the names of only those agencies who fully meet the PQ criteria for each specialized work for the acceptance of the department. iv. Main contractor shall not be permitted to change their associate agencies in the course of execution of work. If change of agency is inevitable then a request shall be submitted to the engineer in charge in writing giving full justification for change of agency. The proposal should include name of the alternate agency along with his financial, technical capabilities and work experience in the appropriate field. Such change shall be allowed only after receiving approval from the competent authority.
	Composite contract-Tripartite agreement	This clause is applicable for the works for which the estimated cost put to tender is more than Rs.500.00 crores. i. The main contractor shall finalise his rates, terms and conditions and mode of execution of work with specialised agencies for all works covered in various subhead of works on receipt of work order but specifications, preferred makes of materials and performance of system shall remain as specified in tender document. ii. The main contractor shall arrange an agreement between department, main contractor and associated agencies for all subheads on receipt of work order from the engineer in charge. Main contractor and expert agency shall be jointly responsible for quality of work and performance of the system. iii. Main contractor shall submit list of associated agency for each specialized work within 1/12th of stipulated completion period or within one month from issue of work order whichever is later along with documentary evidence for financial soundness, technical capabilities and their experience for executing similar specialized works along with his application seeking acceptance for the name of associated agency. Approval / rejection for the name of associated agency shall be accorded thereafter by NIT approving authority within a period of 15 days each subhead wise. iv. The main contractor shall submit duly signed tripartite agreement on the format provided by AAI within 2/12th of stipulated completion period or 60 days whichever is later for acceptance and signature of department. The extension of time for signing of this agreement shall not be generally permitted. The signing time shall only be extended if handing over of site is delayed due to reasons beyond control of the contractor.



	Conditions of composite contract	i. Main contractor shall be responsible for submission of earnest money. ii. The mobilization advance shall be paid to main contractor as per terms and conditions of contract and indicated under Clause 10 B. The first installment of mobilization advance shall be corresponding to the value of work which shall be executed by the main contractor. The subsequent mobilization advances corresponding to value of work covered in each subhead shall be released on signing of each Tripartite Agreement with expert agency for the same. iii. The security deposit shall be deducted from the running bills of main contractor after adjustment of full earnest money. iv. Main contractor shall be responsible for completion of work as per time schedule indicated in the NIT. The compensation for the delay shall be levied on the main contractor only. v. The coordination meetings called by AAI or its representative shall be attended by associated expert agencies as and when required. Expert agency shall be responsible for technical soundness, quality of work and adherence to tender specifications. The main contractor as well as associated agency shall be responsible for rectification of deficiencies noticed in specialized work.
	Payment Conditions for Composite Contract	i. It will be the responsibility of main contractor to finalize expert agencies for the execution of works covered under all subheads of NIT and get the tripartite agreements signed as per NIT requirement at an early date. The main contractor shall not be paid for value of work covered under second running bill & subsequent bills till all Tripartite Agreements are signed by all agencies concerned. ii. The main contractor must fill the ratio of work which shall govern the ratio of direct payment to the expert agency and to the main contractor for each subhead of work in schedule F. This ratio may also be indicated in tripartite agreement. Thus direct payment to each expert agency shall be released in the same ratio from the net payment (after all deductions). iii. The running bill for specialized work shall be processed as per terms and conditions of the contract. All deductions like security deposit, income tax and part rate for incomplete work or due to any other reason shall be made as per contract conditions from each running bill. In case the ratio as desired under (ii) is not filled by the main contractor AAI will make payment of 75% of the net payable amount to the expert agency directly and balance 25% shall be paid to the main contractor.

Clause 48

	Escrow Account	i. All payments for the works estimated cost more than Rs.500 Cr shall be made only through Escrow Account opened by the contractor. However for works costing less than Rs.500 Cr., it shall be at the discretion of Technical Sanctioning authority to opt for Escrow account or not. The bank charges for Escrow Account shall be borne by contractor. The detailed conditions of Escrow Account shall be drawn in consultation with associated bank. ii. Mobilization advance for mobilization of resources and purchase of plant & machinery shall be credited directly to the escrow account opened for this contract through bank transfer as per terms and condition of contract. The agency shall be able to utilize 25% (or as decided by TS authority) of each installment of mobilization advance to meet minor expenses like construction of site office, purchase of office equipment and other minor works, while release of balance 75% fund shall be regulated by the department. The contractor shall seek prior concurrence of Engineer-in
--	-----------------------	---



		Charge for release of payment to the supplier etc. through Escrow Account by the Bank. Funds against cheque issued by contractor shall be released by Bank on receipt of written consent from Engineer in Charge. iii. Payment received and credited against each RA Bill, can be utilized 25% directly by the contractor for minor expenses like salary, stationary, office expenses etc. AAI shall exercise control for release of payment by contractor for balance 75%. iv. The Contractor shall submit his proposal to the Engineer in Charge/ Authority for utilization of funds made available by AAI (75% against each RA bill) a. Name of agency for whom payment is proposed to be released. b. Details of work executed/material supplied by agency to whom he intends to release payment. c. Nature of advance payment if any, has to be released to the supplier for supply of material for the project only. d. Documentary evidence in support of his claim. v. Engineer in charge will examine and approve full / part of such payments as per agency's request within maximum of three working days. The terms and condition of Escrow Account shall be finalized with bank according to terms and conditions of contract. Bank shall release payment against such cheques only after written consent of authorised officer of AAI is received. vi. Contractor shall be permitted to close Escrow Account on receipt of final payment for the work/project or on receipt of letter for foreclosure of work by the AAI. All balances and liabilities against this Escrow Account shall be left at the disposal of the contractor.
--	--	--



Clause 49

49	Additional Performance Security	The contractor shall an irrevocable additional performance security in the form of an irrevocable Insurance Surety bond, demand draft, bank guarantee issued from Scheduled Commercial Bank (i.e. Indian or Foreign Banks included in the Second Schedule of Reserve Bank of India Act, 1934 excluding Co-Operative / Regional Rural Banks, if the Bid price offered by the selected bidder is lower than 10% of the estimated cost put to tender. This clause shall be binding and enforceable in relation to all works, irrespective of their nature, scope or value. Additional Performance Security should be furnished within 30 days of issue of letter of intent. In case the contractor fails to deposit additional performance guarantee within the stipulated period, tender shall stand cancelled without any notice. Further, EMD shall be forfeited, and the contract shall be liable for debarment up to a period of two (02) years. Additional performance security Amount and Treatment – The additional performance security shall be calculated as below – (i) Where the bid price is below 10% but not below 20% of the project cost put to bid, the additional performance security percentage shall be incremented by 0.25% for every percentage of bid price below 10% of the project cost put to bid starting at 11% with the additional bid performance security being 0.25% and this additional performance security percentage shall be applied on the bid price; (ii) Where the bid price is below 20% but not below 25% of the project cost put to bid, the additional performance security percentage shall be incremented by 0.50% for every percentage of bid price below 20% of the project cost put to bid starting at 21% with the additional bid performance security being 0.50% and this additional performance security percentage shall be applied on the bid price; (iii) Where the bid price is below 25% but not below 30% of the project cost put to bid, the additional performance security percentage shall be incremented by 0.75% for every percentage of bid price below 25% of the project cost put to bid starting at 26% with the additional bid performance security being 0.75% and this additional performance security percentage shall be applied on the bid price; (iv) Where the bid price is below 30%, the additional performance security percentage shall be incremented by 1% for every percentage of bid price below 30% of the project cost put to bid starting at 31% with the additional bid performance security being 1% and this additional performance security percentage shall be applied on the bid price; (v) The additional performance security percentage shall be rounded off to the next lower percentage based on whether the decimal point to the percentage of bid price is below 0.5% or next higher percentage based on whether the decimal point of the percentage of bib price 0.5% or more. (vi) Validity & Extension: The Additional Performance Security shall be initially valid upto the stipulated date of completion plus 180 days beyond that. In case the time for completion of work gets enlarged, the contractor shall get the validity of Performance Guarantee extended to cover such enlarged time for completion of work. After recording of the completion certificate for the work by the competent authority, the additional performance guarantee shall be returned to the contractor, without any interest.
----	--	--



		(vii) Claims & Forfeiture: The Engineer-in-Charge shall not make a claim under the performance guarantee except for amounts to which the AAI is entitled under the contract (not withstanding and/or without prejudice to any other provisions in the contract agreement) in the event of: - Failure by the contractor to extend the validity of the Additional Performance Guarantee as described herein above, in which event the Engineer-in- Charge may claim the full amount of the additional Performance Guarantee. - Failure by the contractor to pay the Chairman, AAI any amount due, either as agreed by the contractor or determined under any of the Clauses/Conditions of the agreement, within 30 days of the service of notice to this effect by Engineer-in-Charge. (viii) In the event of the contract being determined or rescinded under provision of any of the Clause/Condition of the agreement, the additional performance guarantee shall stand forfeited in full and shall be absolutely at the disposal of the Chairman, AAI. Note: Please refer Annexure-A given at page no.179 for reference only.
--	--	---

Note : ~~In case of difference or ambiguity in Hindi and English version anywhere, the English version will prevail.~~



AIRPORTS AUTHORITY OF INDIA

SAFETY CODE

1. Suitable Scaffolds should be provided for workmen for all works that cannot safely be done from the ground, or from solid construction except such short period work as can be done safely from ladders. When a ladder is used, an extra mazdoor shall be engaged for holding the ladder and if the ladder is used for carrying materials as well suitable footholds and hand-hold shall be provided on the ladder and the ladder shall be given an inclination not steeper than $\frac{1}{4}$ to 1 ($\frac{1}{4}$ horizontal and 1 vertical).
2. Scaffolding of staging more than 3.6m (12ft.) above the ground or floor, swung or suspended from an overhead support or erected with stationary support shall have a guard rail properly attached or bolted, braced and otherwise secured at least 90 cm. (3ft.) high above the floor or platform of such scaffolding on staging and extending along the entire length of the outside and ends thereof with only such opening as may be necessary for the delivery of materials. Such scaffolding or staging shall be so fastened as to prevent it from swaying from the building or structure.
3. Working platforms, gangways and stairways should be so constructed that they should not sag unduly or unequally, and if the height of the platform or the gangway or the stairway is more than 3.6 m (12ft.) above ground level or floor level, they should be closely boarded, should have adequate width and should be suitably fastened as described in (2) above.
4. Every opening in the floor of a building or in a working platform shall be provided with suitable means to prevent the fall of person or materials by providing suitable fencing or railing whose minimum height shall be 90 cm.(3ft.)
5. Safe means of access shall be provided to all working platforms and other working places. Every ladder shall be securely fixed. No portable single ladder shall be over 9m. (30ft.) in length while the width between side rails in rung ladder shall in no case be less than 29 cm. (11 $\frac{1}{2}$ ") for ladder upto and including 3m. (10ft.) in length. For long ladders, this width should be increased at least $\frac{1}{4}$ " for each additional 30cm. (1 foot) of length. Uniform step spacing of not more than 30cm shall be kept. Adequate precautions shall be taken to prevent danger from electrical equipment. No materials on any of the site or work shall be so stacked or placed as to cause danger or inconvenience to any person or the public. The contractor shall provide all necessary fencing and lights to protect the public from accident and shall be bound to bear the expenses of defence of every suit, action or other proceedings at law that may be brought by any person for injury sustained owing to neglect of the above precautions and to pay any damages and cost which may be awarded in any such suit, action or proceedings to any such person on which may, with the consent of the contractor, be paid to compensate any claim by any such person.
6. a. **Excavation and Trenching** – All trenches 1.2 m. (4ft.) or more in depth, shall at all times be supplied with at least one ladder for each 30m. (100ft.) in length or fraction thereof, Ladder shall extend from bottom of the Trench to at least 90cm (3fts) above the surface of the ground. The side of the trenches which are 1.5 m. (5 ft.) or more in depth shall be stepped back to give suitable slope or securely held by timber bracing, so as to avoid the danger of sides collapsing. The excavated material shall not be placed within 1.5 m. (5 ft.) of the edges of the trench or half of the depth of the trench whichever is more. Cutting shall be done from top to bottom. Under no circumstances, undermining or undercutting shall be done.



b. Safety Measures for digging bore holes: -

- i. If the bore well is successful, it should be safely capped to avoid caving and collapse of the bore well. The failed and the abandoned ones should be completely refilled to avoid caving and collapse;
 - ii. During drilling, Sign boards should be erected near the site with the address of the drilling contractor and the Engineer-in-charge of the work;
 - iii. Suitable fencing should be erected around the well during the drilling and after the installation of the rig on the point of drilling, flags shall be put 50 Mtr all around the point of drilling to avoid entry of people/animals;
 - iv. After drilling the bore well, a cement platform (0.50 Mtr x 0.50 Mtr x 1.20 Mtr) 0.60 Mtr above ground level and 0.60 Mtr below ground level should be constructed around the well casing;
 - v. After the completion of the bore well, the contractor should cap the borewell properly by welding steel plate, cover the bore well with the drilled wet soil and fix thorny shrubs over the soil. This should be done even while repairing the pump;
 - vi. After the bore well is drilled the entire site should be brought to the ground level;
7. Demolition – Before any demolition work is commenced and also during the progress of the work,
- i) All roads and open areas adjacent to the work site shall either be closed or suitably protected.
 - ii) No electric cable or apparatus which is liable to be a source of danger or a cable or apparatus used by the operator shall remain electrically charged.
 - iii) All practical steps shall be taken to prevent danger to persons employed from risk of fire or explosion or flooding. No floor, roof or other part of the building shall be so overloaded with debris or materials as to render it unsafe.
8. All necessary personal safety equipment as considered adequate by the Engineer-in-Charge should be kept available for the use of the person employed on the site and maintained in a condition suitable for immediate use, and the contractor should take adequate steps to ensure proper use of equipment by those concerned. The following safety equipment shall invariably be provided.
- i) Workers employed on mixing asphaltic materials, cement and lime mortars shall be provided with protective footwear and protective goggles.
 - ii) Those engaged in white washing and mixing or stacking of cement bags or any material which is injurious to the eyes shall be provided with protective goggles.
 - iii) Those engaged in welding works shall be provided with welder's protective eye-shields.
 - iv) Stone breaker shall be provided with protective goggles and protective clothing and seated at sufficiently safe intervals.
 - v) When workers are employed in sewers and manholes, which are in active use, the contractors shall ensure that the manhole covers are opened and ventilated at least for an hour before the workers are allowed to get into the manholes, and the manholes so opened shall be cordoned off with suitable railing and provided with warning signals or boards to prevent accident to the public. In addition, the contractor shall ensure that the following safety measures are adhered to:-
 - a) Entry for workers into the line shall not be allowed except under supervision of the Sr. Superintendent (Engg.) or any other higher officer.
 - b) At least 5 to 6 manholes upstream and downstream should be kept open for at least 2 to 3 hours before any man is allowed to enter into the manhole for working inside.



- c) Before entry, presence of toxic gases should be tested by inserting wet lead acetate paper which changes colour in the presence of such gases and gives indication of their presence.
- d) Presence of Oxygen should be verified by lowering a detector lamp into the manhole. In case, no Oxygen is found inside the sewer line, workers should be sent only with oxygen kit.
- e) Safety belt with rope should be provided to the workers. While working inside the manholes, such rope should be handled by two men standing outside to enable him to be pulled out during emergency.
- f) The area should be barricaded or condoned off by suitable means to avoid mishaps of any kind. Proper warning signs should be displayed for the safety of the public whenever cleaning works are undertaken during night or day.
- g) No smoking or open flames shall be allowed near the blocked manhole being cleaned.
- h) The malba obtained on account of cleaning of blocked manholes and sewer lines should be immediately removed to avoid accidents on account of slippery nature of the malba.
- i) Workers should not be allowed to work inside the manhole continuously. He should be given rest intermittently. The Engineer-in-Charge may decide the time upto which a worker may be allowed to work continuously inside the manhole.
- j) Gas masks with Oxygen Cylinder should be kept at site for use in emergency.
- k) Air-blowers should be used for flow of fresh air through the manholes. Whenever called for, portable air blowers are recommended for ventilating the manholes. The Motors for these shall be vapour proof and of totally enclosed type. Non sparking gas engines also could be used but they should be placed at least 2 meters away from the opening and on the leeward side protected from wind so that they will not be a source of friction on any inflammable gas that might be present.
- l) The workers engaged for cleaning the manholes / sewers should be properly trained before allowing to work in the manhole.
- m) The workers shall be provided with Gumboots or non-sparking shoes bump helmets and gloves non sparking tools safety lights and gas masks and portable air blowers (when necessary). They must be supplied with barrier cream for anointing the limbs before working inside the sewer lines.
- n) Workmen descending a manhole shall try each ladder stop or rung carefully before putting his full weight on it to guard against insecure fastening due to corrosion of the rung fixed to manhole well.
- o) If a man has received a physical injury, he should be brought out of the sewer immediately and adequate medical aid should be provided to him.
- p) The extent to which these precautions are to be taken depend on individual situation but the decision of the Engineer-in-Charge regarding the steps to be taken in this regard in an individual case will be final.
- (vi) The Contractor shall not employ men and women below the age of 18 years on the work of painting with products containing lead in any form. Wherever men above the age of 18 are employed on the work of lead painting, the following precaution should be taken:-
 - a) No paint containing lead or lead products shall be used except in the form of paste or readymade paint.
 - b) Suitable face masks should be supplied for use by the workers when paint is applied in the form of spray or a surface having lead paint is dry rubbed and scrapped.



- c) Overall shall be supplied by the contractors to the workmen and adequate facilities shall be provided to enable the working painters to wash during and on the cessation of work.
- 9. An additional clause (viii)(i) of AAI Safety Code (iv) the Contractor shall not employ women and men below the age of 18 on the work of painting with product containing lead in any form, wherever men above the age of 18 are employed on the work of lead painting, the following principles must be observed for such use:
 - i) White lead, sulphate of lead or product containing these pigment, shall not be used in painting operation except in the form of pastes or paint ready for use.
 - ii) Measures shall be taken, wherever required in order to prevent danger arising from the application of a paint in the form of spray.
 - iii) Measures shall be taken, wherever practicable, to prevent danger arising out of from dust caused by dry rubbing down and scraping.
 - iv) Adequate facilities shall be provided to enable working painters to wash during and on cessation of work.
 - v) Overall shall be worn by working painters during the whole of working period.
 - vi) Suitable arrangement shall be made to prevent clothing put off during working hours being spoiled by painting materials.
 - vii) Cases of lead poisoning and suspected lead poisoning shall be notified and shall be subsequently verified by medical man appointed by competent authority of AAI.
 - viii) AAI may require, when necessary medical examination of workers.
 - ix) Instructions with regard to special hygienic precautions to be taken in the painting trade shall be distributed to working painters.
- 10. When the work is done near any place where there is risk of drowning, all necessary equipment's should be provided and kept ready for use and all necessary steps taken for prompt rescue of any person in danger and adequate provision, should be made for prompt first aid treatment of all injuries likely to be obtained during the course of the work.
- 11. Use of hoisting machines and tackle including their attachments, anchorage and supports shall conform to the following standards or conditions:
 - i) (a) These shall be of good mechanical construction, sound materials and adequate strength and free from patent defects and shall be kept repaired and in good working order.
 - (b) Every rope used in hoisting or lowering materials or as a means of suspension shall be of durable quality and adequate strength, and free from patent defects.
 - ii) Every crane driver or hoisting appliance operator shall be properly qualified and no person under the age of 21 years should be in charge of any hoisting machine including any scaffolding winch or give signals to operator.
 - iii) In case of every hoisting machine and of every chain ring hook, shackle swivel and pulley block used in hoisting or as means of suspension, the safe working load shall be ascertained by adequate means. Every hoisting machine and all gear referred to above shall be plainly marked with the safe working load. In case of a hoisting machine having a variable safe working load each safe working load and the condition under which it is applicable shall be clearly indicated. No part of any machine or any gear referred to above in this paragraph shall be loaded beyond the safe working load except for the purpose of testing.



- iv) In case of departmental machines, the safe working load shall be notified by the Electrical Engineer-in-Charge. As regards contractor's machines the contractors shall notify the safe working load of the machine to the Engineer-in-Charge whenever he brings any machinery to site of work and get it verified by the electrical Engineer concerned.
12. Motors, gearing, transmission, electric wiring and other dangerous parts of hoisting appliances should be provided with efficient safeguards. Hoisting appliances should be provided with such means as will reduce to the minimum the risk of accidental descent of the load. Adequate precautions should be taken to reduce to the minimum the risk of any part of a suspended load becoming accidentally displaced. When workers are employed on electrical installations which are already energized, insulating mats, wearing apparel, such as gloves, sleeves and boots as may be necessary should be provided. The worker should not wear any rings, watches and carry keys or other materials which are good conductors of electricity.
 13. All scaffolds, ladders and other safety devices mentioned or described herein shall be maintained in safe condition and no scaffold, ladder or equipment shall be altered or removed while it is in use. Adequate washing facilities should be provided at or near places of work.
 14. These safety provisions should be brought to the notice of all concerned by display on a notice board at a prominent place at work spot. The person responsible for compliance of the safety code shall be named therein by the contractor.
 15. To ensure effective enforcement of the rules and regulations relating to safety precautions the arrangements made by the contractor shall be open to inspection by the Labour Officer or Engineer-in- Charge of the department or their representatives.
 16. Notwithstanding the above clauses from (1) to (15), there is nothing in these to exempt the contractor from the operations of any other Act or Rules in force in the Republic of India.



MODEL RULES FOR THE PROTECTION OF HEALTH AND SANITARY ARRANGEMENTS FOR WORKERS EMPLOYED BY AAI OR ITS CONTRACTORS

1. APPLICATION

These rules shall apply to all buildings and construction works in charge of AAI in which twenty or more workers are ordinarily employed or are proposed to be employed in any day during the period during which the contract work is in progress.

2. DEFINITION

Work place means a place where twenty or more workers are ordinarily employed in connection with construction work on any day during the period during which the contract work is in progress.

3. FIRST-AID FACILITIES

- (i) At every work place, there shall be provided and maintained, so as to be easily accessible during working hours, first-aid boxes at the rate of not less than one box for 150 contract labour or part thereof ordinarily employed.
- (ii) The first-aid box shall be distinctly marked with a red cross on white background and shall contain the following equipment.
 - (a) For work places in which the number of contract labour employed does not exceed 50 Each first –aid box shall contain the following equipment’s:
 - 1. 6 small sterilized dressings
 - 2. 3 medium size sterilized dressings
 - 3. 3 large size sterilized dressings
 - 4. 3 large sterilized burn dressings
 - 5. 1 (30 ml) bottle containing a two per cent alcoholic solution of iodine.
 - 6. 1 (30 ml) bottle containing sal volatile having the dose and mode of administration indicated on the label.
 - 7. 1 snakebite lancet.
 - 8. 1 (30 gms) bottle of potassium permanganate crystals.
 - 9. 1 pair scissors.
 - 10. 1 copy of the first-aid leaflet issued by the Director General, Factory Advice Service and Labour Institute, Government of India.
 - 11. 1 bottle containing 100 tablets (each of 5 gms) of aspirin.
 - 12. Ointment for burns.
 - 13. A bottle of suitable surgical antiseptic solution.
 - (b) For work places in which the number of contract labour exceed 50. Each first-aid box shall contain the following equipments.
 - 1. 12 small sterilized dressings.
 - 2. 6 medium size sterilized dressings.
 - 3. 6 large size sterilized dressings
 - 4. 6 large size sterilized burn dressings.
 - 5. 6 (15 gms) packets sterilized cotton wool.
 - 6. 1 (60 ml). Bottle containing two per cent alcoholic solution iodine.
 - 7. 1 (60 ml) bottle containing Sal volatile having the dose and mode of administration indicated on the label.
 - 8. 1 roll of adhesive plaster.
 - 9. 1 snake bite lancet.
 - 10. 1 (30 gms) bottle of potassium permanganate crystals.
 - 11. 1 pair scissors.
 - 12. 1 copy of the first-aid leaflet issued by the Director General Factory Advice Service and Labour Institute / Government of India.



13. A bottle containing 100 tablets (each of 5 gms) of aspirin.
14. Ointment for burns.
15. A bottle of suitable surgical antiseptic solution.

- (iii) Adequate arrangements shall be made for immediate recoupment of the equipment when necessary.
- (iv) Nothing except the prescribed contents shall be kept in the First-aid box.
- (v) The first-aid box shall be kept in charge of a responsible person who shall always be readily available during the working hours of the work place.
- (vi) a person in charge of the First-aid box shall be a person trained in First-aid treatment in the work places where the number of contract labour employed is 150 or more.
- (vii) In work places where the number of contract labour employed is 500 or more and hospital facilities are not available within easy distance from the works. First-aid posts shall be established and run by a trained compounder. The compounder shall be on duty and shall be available at all hours when the workers are at work.
- (viii) Where work places are situated in places which are not towns or cities, a suitable motor transport shall be kept readily available to carry injured person or person suddenly taken ill to the nearest hospital.

4. DRINKING WATER

- i) In every work place, there shall be provided and maintained at suitable places, easily accessible to labour, a sufficient supply of cold water fit for drinking.
- ii) Where drinking water is obtained from an intermittent public water supply, each work place shall be provided with storage where such drinking water shall be stored.
- iii) Every water supply or storage shall be at a distance of not less than 50 feet from any latrine drain or other source of pollution. Where water has to be drawn from an existing well which is within such proximity of latrine, drain or any other source of pollution, the well shall be properly chlorinated before water is drawn from it for drinking. All such wells shall be entirely closed in and be provided with a trap door which shall be dust and waterproof.
- iv) A reliable pump shall be fitted to each covered well, the trap door shall be kept locked and opened only for cleaning or inspection which shall be done at least once a month.

5. WASHING FACILITIES

- i) In every work place adequate and suitable facilities for washing shall be provided and maintained for the use of contract labour employed therein.
- ii) Separate and adequate cleaning facilities shall be provided for the use of male and female workers.
- iii) Such facilities shall be conveniently accessible and shall be kept in clean and hygienic condition.

6. LATRINES AND URINALS

- i) Latrines shall be provided in every work place on the following scale namely:
 - a) Where female are employed, there shall be at least one latrine for every 25 females.
 - b) Where males are employed, there shall be at least one latrine for every 25 males.



- ii) Provided that, where the number of males or females exceeds 100, it shall be sufficient if there is one latrine for 25 males or females as the case may be upto the first 100, and one for every 50 thereafter.
- iii) Every latrine shall be under cover and so partitioned off as to secure privacy, and shall have a proper door and fastenings.
- iv) Construction of latrines: The inside walls shall be constructed of masonry or some suitable heat-resisting nonabsorbent materials and shall be cement washed inside and outside at least once a year, Latrines shall not be of a standard lower than borehole system.
- v) (a) Where workers of both sexes are employed, there shall be displayed outside each block of latrine and urinal, a notice in the language understood by the majority of the workers "For Men only" or "For Women Only" as the case may be.
(b) The notice shall also bear the figure of a man or of a woman, as the case may be.
- vi) There shall be at least one urinal for male workers upto 50 and one for female workers upto fifty employed at a time, provided that where the number of male or female workmen, as the case may be exceeds 500, it shall be sufficient if there is one urinal for every 50 males or females upto the first 500 and one for every 100 or part thereafter.
- vii) (a) The latrines and urinals shall be adequately lighted and shall be maintained in a clean and sanitary condition at all times.
(b) Latrines and urinals other than those connected with a flush sewage system shall comply with the requirements of the Public Health Authorities.
- viii) Water shall be provided by means of tap or otherwise so as to be conveniently accessible in or near the latrines and urinals.
- ix) Disposal of excreta: Unless otherwise arranged for by the local sanitary authority, arrangements for proper disposal of excreta by incineration at the work place shall be made by means of a suitable incinerator. Alternately excreta may be disposed of by putting a layer of night soil at the bottom of a pucca tank prepared for the purpose and covering it with a 15 cm. Layer of waste or refuse and then covering it with a layer of earth for a fortnight (when it will turn to manure).
- x) The contractor shall at his own expense, carry out all instructions issued to him by the Engineer-in-Charge to effect proper disposal of night soil and other conservancy work in respect of the contractor's workmen or employees on the site. The contractor shall be responsible for payment of any charges which may be levied by Municipal or Cantonment Authority for execution of such on his behalf.

7. PROVISION OF SHELTER DURING REST

At every place there shall be provided, free of cost, four suitable sheds, two for meals and the other two for rest separately for the use of men and women labour. The height of each shelter shall not be less than 3 meters (10 ft.) from the floor level to the lowest part of the roof. These shall be kept clean and the space provided shall be on the basis of 0.6 sq.m. (6 sft) per head. Provided that the Engineer-in-Charge may permit subject to his satisfaction, a portion of the building under construction or other alternative accommodation to be used for the purpose.

8. CRECHES

- i) At every work place, at which 20 or more women workers are ordinarily employed, there shall be provided two rooms of reasonable dimensions for the use



of their children under the age of six years. One room shall be used as a play room for the children and the other as their bedroom. The rooms shall be constructed with specifications as per clause 19 H

(ii) a, b & c.

- ii) The rooms shall be provided with suitable and sufficient openings for light and ventilation. There shall be adequate provision of sweepers to keep the places clean.
- iii) The contractor shall supply adequate number of toys and games in the play room and sufficient number of cots and beddings in the bed room.
- iv) The contractor shall provide one ayaa to look after the children in the crèche when the number of women workers does not exceed 50 and two when the number of women workers exceed 50.
- v) The use of the rooms earmarked as crèches shall be restricted to children, their attendants and mothers of the children.

9. CANTEENS

- i) In every work place where the work regarding the employment of contractor labour is likely to continue for six months and where in contract labour numbering one hundred or more are ordinarily employed, an adequate canteen shall be provided by the contractor for the use of such contract labour.
- ii) The canteen shall be maintained by the contractor in an efficient manner.
- iii) The canteen shall consist of at least a dining hall, kitchen, storeroom, pantry and washing places separately for workers and utensils.
- iv) The canteen shall be sufficiently lighted at all times when any person has access to it.
- v) The floor shall be made of smooth and impervious materials and inside walls shall be lime washed or colour washed at least once in each year. Provided that the inside walls of the kitchen shall be lime washed every four months.
- vi) The premises of the canteen shall be maintained in a clean and sanitary condition.
- vii) Waste water shall be carried away in suitable covered drains and shall not be allowed to accumulate so as to cause a nuisance.
- viii) Suitable arrangements shall be made for the collection and disposal of garbage.
- ix) The dining hall shall accommodate at a time 30 per cent of the contract labour working at a time.
- x) The floor area of the dining hall, excluding the area occupied by the service counter and any furniture except tables and chairs shall not be less than one square metre (10 sft) per diner to be accommodated as prescribed in sub-Rule (ix).
- xi) (a) A portion of the dining hall and service counter shall be partitioned off and reserved for women workers in proportion to their number. (b) Washing places for women shall be separate and screened to secure privacy.
- xii) Sufficient tables stools, chairs or benches shall be available for the number of diners to be accommodated as prescribed in sub-Rule (ix).
- xiii) (a) 1. There shall be provided and maintained sufficient utensils crockery, furniture and any other equipment necessary for the efficient running of the canteen.
2. The furniture utensils and other equipment shall be maintained in a clean and hygienic condition.
(b) 1. Suitable clean clothes for the employees serving in the canteen shall be provided and maintained.
2. A service counter, if provided, shall have top of smooth and impervious material.
3. Suitable facilities including an adequate supply of hot water shall be provided for the cleaning of utensils and equipment's.
- xiv) The food stuffs and other items to be served in the canteen shall be in conformity



with the normal habits of the contract labour.

- xv) The charges for food stuffs, beverages and any other items served in the canteen shall be based on 'No Profit, No loss' and shall be conspicuously displayed in the canteen.
- xvi) In arriving at the price of foodstuffs, and other article served in the canteen, the following items shall not be taken into consideration as expenditure namely :-
 - c) The rent of land and building.
 - d) The depreciation and maintenance charges for the building and equipment's provided for the canteen.
 - e) The cost of purchase, repairs and replacement of equipment's including furniture, crockery, cutlery and utensils.
 - f) The water charges and other charges incurred for lighting and ventilation.
 - g) The interest and amounts spent on the provision and maintenance of equipment's provided for the canteen.
- xvii) The accounts pertaining to the canteen shall be audited once every 12 months by registered accountants and auditors.

10. ANTI-MALARIAL PRECAUTIONS

The contractor shall at his own expense, conform to all anti-malarial instructions given to him by the Engineer-in-Charge including the filling up of any borrow pits which may have been dug by him.

- 11. The above rules shall be incorporated in the contracts and in notices inviting tenders and shall form an integral part of the contracts.

12. AMENDMENTS

AAI may, from time to time, add to or amend these rules and issue directions - it may consider necessary for the purpose of removing any difficulty which may arise in the administration thereof.



AIRPORTS AUTHORITY OF INDIA

Contractor's Labour Regulations

1. SHORT TITLE

These regulations may be called the AAI Contractors Labour Regulations.

2. DEFINITIONS

(i) **Workman** means any person employed by AAI or its contractor directly or indirectly through a subcontractor with or without the knowledge of the AAI to do any skilled, semiskilled or unskilled manual, supervisory, technical or clerical work for hire or reward, whether the terms of employment are expressed or implied but does not include any person:-

- a) Who is employed mainly in a managerial or administrative capacity: or
- b) Who, being employed in a supervisory capacity draws wages exceeding five hundred rupees per mensem or exercises either by the nature of the duties attached to the office or by reason of powers vested in him, functions mainly of managerial nature : or
- c) Who is an out worker, that is to say, person to whom any article or materials are given out by or on behalf of the principal employers to be made up cleaned, washed, altered, ornamental finished, repaired adopted or otherwise processed for sale for the purpose of the trade or business of the principal employers and the process is to be carried out either in the home of the out worker or in some other premises, not being premises under the control and management of the principal employer. No person below the age of 14 years shall be employed to act as a workman.

(ii) **Fair Wages** means wages whether for time or piece work fixed and notified under the provisions of the Minimum Wages Act from time to time.

(iii) **Contractors** shall include every person who undertakes to produce a given result other than a mere supply of goods or articles of manufacture through contract labour or who supplies contract labour for any work and includes a subcontractor.

(iv) **Wages** shall have the same meaning as defined in the Payment of Wages Act.

3. i) Normally working hours of an adult employee should not exceed 9 hours a day. The working day shall be so arranged that inclusive of interval for rest, if any, it shall not spread over more than 12 hours on any day.
- ii) When an adult worker is made to work for more than 9 hours on any day or for more than 48 hours in any week, he shall be paid over time for the extra hours put in by him at double the ordinary rate of wages.
- iii) a) Every worker shall be given a weekly holiday normally on a Sunday, in accordance with the provisions of the Minimum Wages (Central) Rules 1960 as amended from time to time irrespective of whether such worker is governed by the Minimum Wages Act or not.
- b) Where the minimum wages prescribed by the Central/State Government under the Minimum Wages Act are not inclusive of the wages for the weekly day of rest, the worker shall be entitled to rest day wages at the rate applicable to the next preceding day, provided he has worked under the same contractor for a continuous period of not less than 6 days.
- c) Where a contractor is permitted by the Engineer-in-Charge to allow a worker to work on a normal weekly holiday, he shall grant a substituted holiday to him for the whole day on one of the five days immediately before or after the normal weekly holiday and pay wages to such worker for the work performed on the normal weekly holiday at overtime rate.



4. DISPLAY OF NOTICE REGARDING WAGES ETC.

The contractor shall before he commences his work on contract, display and correctly maintain and continue to display and correctly maintain in a clear and legible condition in conspicuous places on the work, notices in English and in the local Indian languages spoken by the majority of the workers giving the minimum rates of wages fixed under Minimum Wages Act, the actual wages being paid, the hours of work for which such wage are earned, wages periods, dates of payments of wages and other relevant information as per Appendix 'VIII'.

5. PAYMENT OF WAGES

- (i) The contractor shall fix wage periods in respect of which wages shall be payable.
- (ii) No wage period shall exceed one month.
- (iii) The wages of every person employed as contract labour in an establishment or by a contractor where less than one thousand such persons are employed shall be paid before the expiry of seventh day and in other cases before the expiry of tenth day after the last day of the wage period in respect of which the wages are payable.
- (iv) Where the employment of any worker is terminated by or on behalf of the contractor the wages earned by him shall be paid before the expiry of the second working day from the date on which his employment is terminated.
- (v) All payment of wages shall be made on a working day at the work premises and during the working time and on a date notified in advance and in case the work is completed before the expiry of the wage period, final payment shall be made within 48 hours of the last working day.
- (vi) Wages due to every worker shall be paid to him direct or to other person authorised by him in this behalf.
- (vii) All wages shall be paid in current coin or currency or in both.
- (viii) Wages shall be paid without any deductions of any kind except those specified by the Central Government by general or special order in this behalf or permissible under the Payment of Wages Act 1956.
- (ix) A notice showing the wages period and the place and time of disbursement of wages shall be displayed at the place of work and a copy sent by the contractor to the Engineer-in-Charge under acknowledgement.
- (x) It shall be the duty of the contractor to ensure the disbursement of wages in the presence of the Senior Superintendent Engg or authorised representative of the Engineer-in-Charge who will be required to be present at the place and time of disbursement of wages by the contractor to workmen.
- (xi) The contractor shall obtain from Engineer in charge or the authorised representative of the Engineer-in-Charge a certificate under his signature at the end of the entries in the "Register of Wages" or the "Wage-cum-Muster Roll" as the case may be in the following form: "Certified that the amount shown in column No. has been paid to the workman concerned in my presence onat"

Note: In case of payment of wages paid through bank, the contractor shall submit a copy of bank statement for relevant period duly signed by him.

6. FINES AND DEDUCTIONS WHICH MAY BE MADE FROM WAGES

- (i) The wages of a worker shall be paid to him without any deduction of any kind except the following:
 - a) Fines



- b) Deductions for absence from duty i.e. from the place or the places where by the terms of his employment he is required to work. The amount of deduction shall be in proportion to the period for which he was absent.
 - c) Deduction for damage to or loss of goods expressly entrusted to the employed person for custody, or for loss of money or any other deduction which he is required to account, where such damage or loss is directly attributable to his neglect or default.
 - d) Deduction for recovery of advances or for adjustment of overpayment of wages, advances granted shall be entered in a register.
 - e) Any other deduction which the Central Government may from time to time allow.
- (ii) No fines should be imposed on any worker save in respect of such acts and omissions on his part as have been approved of by the Chief Labour Commissioner.
Note: An approved list of Acts and Omissions for which fines can be imposed is enclosed at Appendix-XII.
 - (iii) No fine shall be imposed on a worker and no deduction for damage or loss shall be made from his wages until the worker has been given an opportunity of showing cause against such fines or deductions.
 - (iv) The total amount of fine which may be imposed in any one wage period on a worker shall not exceed an amount equal to three paise in a rupee of the total wages, payable to him in respect of that wage period.
 - (v) No fine imposed on any worker shall be recovered from him by installment, or after the expiry of sixty days from the date on which it was imposed.
 - (vi) Every fine shall be deemed to have been imposed on the day of the act or omission in respect. of which it was imposed.

7. LABOUR RECORDS

- (i) The contractor shall maintain a Register of persons employed on work on contract in Form XIII of the CL(R&A) Central Rules 1971 (Appendix VI)
- (ii) The contractor shall maintain a Muster Roll register in respect of all workmen employed by him on the work under Contract in Form XVI of the CL (R&A) Rules 1971 (Appendix VII).
- (iii) The contractor shall maintain a Wage Register in respect of all workmen employed by him on the work under contract in Form XVII of the CL (R&A) Rules 1971 (Appendix VIII)
- (iv) **Register of accident** - The contractor shall maintain a register of accidents in such form as may be convenient at the work place but the same shall include the following particulars :
 - (a) Full particulars of the labourers who met with accident.
 - (b) Rate of Wages
 - (c) Sex
 - (d) Age
 - (e) Nature of accident and cause of accident
 - (f) Time and date of accident
 - (g) Date and time when admitted in Hospital
 - (h) Date of discharge from the Hospital
 - (i) Period of treatment and result of treatment
 - (j) Percentage of loss of earning capacity and disability as assessed by Medical officer
 - (k) Claim required to be paid under Workmen's Compensation Act.
 - (l) Date of payment of compensation
 - (m) Amount paid with details of the person to whom the same was paid
 - (n) Authority by whom the compensation was assessed.
 - (o) Remarks



- (v) The contractor shall maintain a **Register of Fines** in the Form XII of the CL(R&A) Rules 1971 (Appendix-XIII).
The contractor shall display in a good condition and in a conspicuous place of work the approved list of acts and omissions for which fines can be imposed (Appendix-XII)
- (vi) The contractor shall maintain a **Register of deductions for damage or loss** in Form XX of the CL (R&A) Rules 1971 (Appendix-XIV)
- (vii) The contractor shall maintain a **Register of Advances** in Form XXIII of the CL (R&A) Rules 1971 (Appendix-XV)
- (viii) The contractor shall maintain a **Register of Overtime** in Form XXIII of the CL (R&A) Rules 1971 (Appendix-XVI).

8. ATTENDANCE CARD-CUM-WAGE SLIP

- (i) The contractor shall issue an **Attendance card-cum-wage** slip to each workman employed by him in the specimen form at (Appendix-IX)
- (ii) The card shall be valid for each wage period.
- (iii) The contractor shall mark the attendance of each workman on the card twice each day, once at the commencement of the day and again after the rest interval, before he actually starts work.
- (iv) The card shall remain in possession of the worker during the wage period under reference.
- (v) The contractor shall complete the wage slip portion on the reverse of the card at least a day prior to the disbursement of wages in respect of the wage period under reference.
- (vi) The contractor shall obtain the signature or thumb impression of the worker on the wage slip at the time of disbursement of wages and retain the card with himself.

9. EMPLOYMENT CARD

The contractor shall issue an **Employment Card** in Form XIV of the CL (R&A) Central Rules 1971 to each worker within three days of the employment of the worker (Appendix-X).

10. SERVICE CERTIFICATE

On termination of employment for any reason whatsoever the contractor shall issue to the workman whose services have been terminated, a **Service certificate** in Form XV of the CL(R&A) Central Rules 1971.

11. PRESERVATION OF LABOUR RECORDS

All records required to be maintained under Regulations Nos. 6 & 7 shall be preserved in original for a period of three years from the date of last entries made in them and shall be made available for inspection by the Engineer-in-Charge or Labour Officer or any other officers authorised by the Ministry of Urban Development in this behalf.

12. POWER OF LABOUR OFFICER TO MAKE INVESTIGATIONS OR ENQUIRY

The Labour Officer or any person authorised by Central Government on their behalf shall have power to make enquiries with a view to ascertaining and enforcing due and proper observance of Fair Wage Clauses and the Provisions of these Regulations. He shall investigate into any complaint regarding the default made by the contractor or subcontractor in regard to such provision.



13. REPORT OF LABOUR OFFICER

The Labour Officer or other persons authorised as aforesaid shall submit a report of result of his investigation or enquiry to the Engineer-in-Charge concerned indicating the extent, if any, to which the default has been committed with a note that necessary deductions from the contractor's bill be made and the wages and other dues be paid to the labourers concerned. In case an appeal is made by the contractor under Clause 13 of these regulations, actual payment to labourers will be made by the Engineer-in-Charge after G.M. Engg. has given his decision on such appeal.

(i) Engineer-in-Charge shall arrange payments to the labour concerned within 45 days from the receipt of the report from the Labour Officer or the G.M. Engineer as the case may be.

14. APPEAL AGAINST THE DECISION OF LABOUR OFFICER

Any person aggrieved by the decision and recommendations of the Labour Officer or other person so authorised may appeal against such decision to the Engineer-in-Charge concerned within 30 days from the date of decision, but subject to such appeal, the decision of the officer shall be final and binding upon the contractor.

15. PROHIBITION REGARDING REPRESENTATION THROUGH LAWYER

- (i) A workman shall be entitled to be represented in any investigation or enquiry under these regulations by :
 - a) An officer of a registered trade union of which he is a member.
 - b) An officer of a federation of trade unions to which the trade union referred to in Clause (a) is affiliated.
 - c) Where the employer is not a member of any registered trade union, by an officer of a registered trade union, connected with the industry in which the worker is employed or by any other workman employed in the industry in which the worker is employed.
- (ii) An employer shall be entitled to be represented in any investigation or enquiry under these regulations by :
 - a) An officer of an association of employers of which he is a member.
 - b) An officer of a federation of associations of employers to which association referred to in Clause (a) is affiliated.
 - c) Where the employers is not a member of any association of employers, by an officer of association of employer connected with the industry in which the employer is engaged or by any other employer, engaged in the industry in which the employer is engaged.
- (iii) No party shall be entitled to be represented by a legal practitioner in any investigation or enquiry under these regulations.

16. INSPECTION OF BOOKS AND SLIPS

The contractor shall allow inspection of all the prescribed labour records to any of his workers or to his agent at a convenient time and place after due notice is received or to the Labour Officer or any other person, authorised by the Central Government on his behalf .

17. SUBMISSION OF RETURNS

The contractor shall submit periodical returns as may be specified from time to time.

18. AMENDMENTS

The Central Government/AAI may from time to time add to or amend the regulations and on any question as to the application/interpretation or effect of those regulations the decision of the General Manager (Engg.) concerned shall be final.



APPENDIX-I

FORM OF BANK GUARANTEE IN LIEU OF SECURITY DEPOSIT & ~~AMOUNT WITHHELD AGAINST COMPENSATION FOR DELAY IN~~ INDIVIDUAL CONTRACT

(on Non-Judicial Stamp Paper of Rs.100/-)
[Refer Clause 1A and 2B]

To
The Airports Authority of India

.....
.....

1. In consideration of the Airport Authority of India having its head office at New Delhi [hereinafter called the “AAI” which expression shall unless repugnant to the subject or context include its administrator, successors and assigns) having agreed under the terms and condition of Contract Agreement No.dated.....made between.....and AAI in connection with the work of.....(hereinafter called the said contract) to accept Deed of Guarantee as herein provided for Rs.....(Rupees.....only) from a Nationalized Bank in lieu of the Security deposit to be made by the contractor or lieu of the amount withheld towards compensation for delay pending final extension of time to be made from the contractors contained in the said Contractor. We, the... ..bank (hereinafter referred to as “the said Bank” and having our registered office atdo hereby undertake and agree to identify and keep indemnified AAI from time to time to the extent of Rs..... (Rupees.....only) against any loss or damage, cost, charges and expenses caused to or suffered by or that may be caused to or suffered by AAI by reason of any breach or breaches by the said Contractor of any of the terms and condition contained in the said contract and to unconditionally pay the amount claimed by AAI on demand and without demur to the extent aforesaid.
2. We..... Bank, further agree that AAI shall be the sole judge of and as to whether the said Contractor has committed any breach or breaches of any of the terms and conditions of the said contract and the extent of loss, damage, costs, charges and expenses caused to or suffered by or that may be caused to or suffered by AAI on account thereof and the decision of AAI that the said Contractor has committed such breach and breaches and as to the amount or amounts of loss, damage, costs, charges and expenses caused to or suffered of that may be caused to or suffered by AAI from time to time shall be final and binding on us.
3. We, the said Bank, further agree that the Guarantee herein contained shall remain in full force and effect during the period that would be taken for the performance of the said contracts and till all the dues of AAI under the said contract or by virtue of any of the terms and conditions governing the said contract including compensation for delay if any as decided by AAI, have been fully paid and its claims satisfied or discharged and till the Accepting Authority of the contract certifies that the terms and condition and accordingly Contract have been fully and properly carried out by the said contractor and accordingly discharges this guarantee subject, however that AAI shall have no claim under this Guarantee after 90(Ninety) days from the date of expiry of the defects Liabilities periods or Final /Extension of Time grated by AAI as provided available in agreements clause no.....as provided in the said Contract, i.e.....(date) or from the date of cancellation of the said contract, as the case may be, unless a notice of the claim under this Guarantee has been served on the Bank before the expiry of the period in which case the same shall be enforceable against the



Bank notwithstanding the fact, that the same is enforced after the expiry of the said period.

4. AAI shall have the fullest liberty without affecting in any way the liability of the bank under this Guarantee or Indemnity from time to time to vary any of the terms and conditions of the said contract or to extend time of performance by the said Contractor or to postpone for any time and from time to time any of the powers exercisable by it against the said Contractor and either to enforce or forbear from enforcing any of terms and conditions governing the said contract or securities available to AAI and the said Bank shall not be released from its liability under these present by any exercise by AAI of any liberty with reference to the matters aforesaid or by reason of time being given to the said contractor or any other forbearance, act or omission on the part by AAI or any indulgence by AAI to the said Contractor or any other matter or thing whatsoever which under the law relating to sureties would but for this provision have the effect of so releasing the Bank from its such liability.
5. It shall not be necessary for AAI to proceed against the contractor before proceeding against the Bank and the Guarantee herein contained shall be enforceable against the Bank, notwithstanding any security which AAI may have obtained or obtain from the Contractor at the time when proceedings are taken against the Bank hereunder be outstanding or unrealized.
6. We, the said Bank, lastly undertake not to revoke this Guarantee during its currency except with the previous consent of AAI in writing and agree that any charge in the Constitution of the said Contract or the said Bank shall not discharge our liability hereunder.

In presence of

Dated this _____ Day of _____

WITNESS

1.

2.

For and on behalf of (The
Bank) Signature _____
Name & Designation _____
Authorization No. _____
Name & Place _____
Bank's Seal _____

The above Guarantee is accepted by Airports Authority of
India. For and on behalf of Airports Authority of India

Signature _____

Name _____

Designation _____

Dated _____



APPENDIX-1A

FORM OF BANK GUARANTEE AGAINST EARNEST MONEY DEPOSIT

WHEREAS, contractor_____ (Name of contractor) (hereinafter called “the contractor”) has submitted his tender dated_____ (date) for the construction of “_____” (name of work) (hereinafter called “the TENDER”).

KNOW ALL PEOPLE by these presents that we_____ (name of bank) having our registered office at_____ (hereinafter called “the bank”) are bound unto _____ (Name of Senior Manager) (hereinafter called “the Engineer-in-charge”) in the sum of Rs. _____ (Rs. In words _____) for which payment well truly to be made to the said Engineer in charge the bank binds itself, his successors and assigns by these presents.

SEALED with the Common Seal of the Bank this _____ day of _____ 20__.

THE CONDITIONS of this obligation are:

(1) ~~If after tender opening the Contractor withdraws, his tender during the period of validity of tender (including extended validity of tender) specified in the Form of Tender.~~

(2) ~~If the contractor having been notified of the acceptance of his tender by the engineer in charge.~~

~~a) Fails or refuses to execute the form of Agreement in accordance with the instructions to contractor, if required—~~

~~OR~~

~~b) Fails or refuses to furnish the performance guarantee, in accordance with the provisions of tender document and instructions to contractor,~~

~~OR~~

~~c) Fails or refuses to start the work, in accordance with the provisions of the contract and instructions to contractor,~~

~~OR~~

~~d) Fails or refuses to submit fresh bank guarantee of an equal amount of this bank guarantee against security deposit after award of contract.~~

~~We undertake to pay to the engineer in charge either up to the above amount or part thereof upon receipt of his first return demand, without the engineer in charge having to substantiate his demand, provided that in his demand the engineer in charge will note that the amount claimed by him is due to him owing to the concurrence of one or any of the above conditions, specifying the occurred condition or conditions.~~

~~This guarantee will remain in force up to and including the date* _____ after the deadline for submission of tender as such deadline is stated in the instructions to contractor or as it may be extended by the engineer in charge, notice of which extension (s) to the bank is hereby waived. Any demand in respect of this guarantee should reach the bank not later than the above date.~~

DATE _____

SIGNATURE OF THE BANK

WITNESS _____

SEAL

(SIGNATURE NAME AND ADDRESS)

*Date to be worked out on the basis of validity period of 6 months from last date of receipt of tender.



APPENDIX 1B

Form of Insurance Surety Bond towards EMD
(To be stamped in accordance with stamp Act of India)

Insurance Surety Bond No.:

Date:

Name of Work:

To,

{AIRPORTS AUTHORITY OF INDIA _____, AIRPORT}

WHEREAS THIS SURETY BOND AGREEMENT Is executed at _____ this _____ day of
_____ 20 _____

BETWEEN

a. M/s. _____ (Name of the Bidder) having its Registered / Head Office at
_____ (Hereinafter called “the Bidder” which expression shall include its successors,
administrators, executors and assigns);

AND

b. _____ (Name and Address of Insurer) having its registered office at
_____ (hereinafter called “the Insurer” which expression shall include its successors,
administrators, executors and assigns)

AND

c. Airports Authority of India, a Statutory Body Constituted under the Airports Authority of India Act, 1994
State Bank of India, 1995 having its central Headquarters at Rajiv Gandhi Bhavan, Safdarjung Airport,
New Delhi, 110003 (hereinafter called the “AAI”);



Dear Sirs,

In accordance with Invitation for Bids under your Bid Document No. {Tender Reference No.} dated _____ M/s {Agency's Name} having its Registered / Head office at {address} (hereinafter called the "Agency") wish to participate in the said bid for {Tender Title}.

As an irrevocable Insurance Surety Bond against Bid Security for an amount of _____ (*) _____ valid for _____ days from _____ (**) required to be submitted by the supplier as a condition precedent for participation in the said bid which amount is liable to be forfeited on the happening of any contingencies as mentioned under the Bidding Documents / NIT No. _____.

We, the { Name of the Insurer } having our Head Office at { address of the insurer } guarantee and undertake to pay truly and immediately on demand by **Airports Authority of India** (Hereinafter called the 'Owner') and its successors and assigns by these presents the amount of _____ (*) _____ on first written demand, without and DEMUR, reservation, protest, demand and recourse, the insurer binds itself, its successors and assigns by these presents. Any such demand made by the 'Owner' shall be conclusive and binding on us irrespective of any dispute or difference raised by the Agency and/or any right/remedy available to the Agency in terms thereof.

THE CONDITIONS of this obligation are:

- (1) If the Bidder withdraws its bid during the period of bid validity specified by the Bidder in the Bid Form; or
- (2) In case the Bidder does not withdraw the deviations proposed by him, if any cost of withdrawal stated by him in the bid and/or accept the withdrawals/rectifications pursuant to the declaration / confirmation made by him; or
- (3) In the case of successful Bidder, if the Bidder fails or refuses within the specified time limit
 1. To execute the Contract Agreement, or
 2. To furnish the required performance security / guarantee within the prescribed time.
 3. The Proceeds of surety Bond (EMD) shall be payable to owner in case of breach of any of the terms and conditions of the tender by the bidder.

WE undertake to pay the owner up to the above amount upon receipt of its first written demand, without the owner having to substantiate its demand, and that in its demand the Owner / may note that the amount claimed by it is due to it, owing to the occurrence of any of the above named CONDITIONS or their combination, and specifying the occurred condition or conditions.

The Surety Bond shall not be affected by any change in the constitution or winding up, any absorption, merger or amalgamation of any of the parties to this surety bond, with any other person.

In the event that the obligations of Owner of this Surety Bond are assigned or novated to a third party, the Surety agrees that this Bond shall remain in full force and effect and shall be deemed to apply to the new principal as if originally named herein, provided that the Surety's liability shall not be increased or extended beyond the original terms of this bond.

This Surety Bond shall be governed by India Law and is to be construed in accordance with Indian Law in all its respects. Each hereby agrees to submit to the jurisdiction of the Courts at (#), and to comply with all the requirements necessary to give such Court the jurisdiction. All matters arising hereunder shall be determined in accordance with the law and practice of the Courts at (#)



~~Surety Bond is required, the same shall be extended to such required period (not exceeding one year) on receiving instructions from M/s. {Agency's Name} on whose behalf this insurance Surety Bond is issued.~~

~~In witness where of the insurer, through its authorized officer, has set its hand and stamp on this _____ day of _____ 20 _____ at _____~~

(Signature)

(Name)

(Designation with insurer Stamp and Complete Address,
Telephone and Email of the Authorized Signatory)

Authorized Vide Power of Attorney PoA No. _____

WITNESSES:

(i) Name & Signature

(ii) Name & Signature

Date _____

NOTE:

1. ~~(*) The amount shall be equivalent to EMD amount specified in the tender.
(**) This shall be the last date of bid submission deadline.
(@) This date shall be thirty (30) days after the last date for which the bid is valid.
(#) This shall be the place where the tender is floated by AAI.~~
2. ~~The insurance Surety Bond shall be from an insurer, registered under the Insurance Act, 1938 as per guidelines issued by Regulatory and Development Authority of India (IRDAI) as amended from time to time.~~
3. ~~The Owner shall be the Creditor, the Supplier shall be the Principal debtor and the Insurance company / Insurer shall be the Surety in respect of the Insurance Surety Bond to be issued by the Insurer.~~
4. ~~The Insurance Surety Bond shall be executed on Non Judicial stamp paper / e stamp paper of appropriate value as per stamp Act prevailing in the state (s) where the Insurance surety Bond is submitted or is to be acted upon or the rate prevailing in state where the Insurance Surety Bond is~~



~~executed, whichever is higher. The stamp paper / e stamp paper shall be purchased in the name of Supplier / Insurer issuing the Insurance Surety Bond.~~

- ~~5. While getting the Insurance Surety Bond issued, Suppliers are required to ensure compliance to the point mentioned in Form of Bank Guarantee / Insurance Surety Bond Verification Check List enclosed in this section of Bidding Documents. Further, Suppliers are required to fill up this Form and enclose the same with the insurance Surety Bond.~~
- ~~6. Each page of Insurance Surety Bond for EMD shall be duly signed / initialed by the executing officers and the last page shall be signed in full by the duly authorized signatory of insurance company along with two witnesses.~~



APPENDIX-II

PROFORMA FOR MANDATORY TESTS TO BE ATTACHED WITH RUNNING ACCOUNT BILLS

Name of work:.....Name of Contractor.....

Contract Agreement No. and Date..... R/A Bill

No.....

Sl. No.	Item	Quantities as per Agreement	Frequency as per Specification	No. of Tests Required	Upto date Quantity	No. of Tests Required	No. of Tests actually done	Remarks
1	2	3	4	5	6	7	8	9

Note: If the number of tests done are less than required, then reasons shall be recorded.

Signature of Sudt. (Engg)

Signature of Engineer in Charge. Signature of Manager / AM (Engg)



APPENDIX-III

REGISTER OF MATERNITY BENEFITS (Clause 19 F)

Name and address of the contractor.....

Name and location of the work.....

Name of the employee	Father's/husband's name	Nature of employment	Period of actual employment	Date on which notice of confinement given
1	2	3	4	5

--

Date on which maternity leave commenced and ended

Date of delivery/miscarriage	<u>In case of delivery</u>		<u>In case of delivery</u>	
	Commenced	Ended	Commenced	Ended
6	7	8	9	10

--

Leave Pay paid to the employee

<u>In case of delivery</u>		<u>In case of miscarriage</u>		Remark
Rate of leave pay	Amount paid	Rate of leave pay	Amount paid	
11	12	13	14	15

--



APPENDIX-IV

SPECIMEN FORM OF THE REGISTER, REGARDING MATERNITY BENEFIT ADMISSION TO THE CONTRACTOR'S LABOUR IN AIRPORTS AUTHORITY OF INDIA WORKS(CLAUSE 19F)

Name and address of the contractor -----
Name and location of the work -----

- 1) Name of the woman and her husband's name
- 2) Designation
- 3) Date of appointment
- 4) Date with months and years in which she is employed.
- 5) Date of discharge/dismissal, if any
- 6) Date of production of certificates in respect of pregnancy.
- 7) Date on which the woman informs about the expected delivery.
- 8) Date of delivery/miscarriage/death.
- 9) Date of production of certificate in respect of delivery/miscarriage.
- 10) Date with the amount of maternity/death benefit paid in advance of expected delivery
- 11) Date with amount of subsequent payment of maternity benefit
- 12) Name of the person nominated by the woman to receive the payment of the maternity benefit after the death.
- 13) If the woman dies, the date of her death, the name of the person to whom maternity benefit amount was paid, the month thereof and the date in the register.
- 14) Signature of the contractor authenticating entries in the register.
- 15) Remarks column for the use of Inspection Officer.



APPENDIX-V

Labour Board

Name of work-----

Name of Contractor-----

Address of Contractor-----

Name and address of A. A. I. Division-----

Name of A. A. I. Labour Officer-----

Address of A. A. I. Labour Officer-----

Sl. No.	Category	Minimum wage fixed	Actual wage paid	Number present	Remark
---------	----------	-----------------------	---------------------	-------------------	--------

Weekly holiday -----

Wage period -----

Date of payment of wages -----

Working hours -----

Rest interval-----



Various Formats to be maintained (Appendix)

Form-XIII
[See rule 2(1)]
[Part-A: For all Establishments]
Register of Workmen Employed by Contractor

APPENDIX-VI

Name and address of contractor.....

Name and address of establishment which contractor is carried on.....

Name and location of work.....

Name and address of Principal Employer.....

Name of the Establishment-----**Name of Owner**-----**LIN**-----

Sl. No.	Employee Code	Name	Surname	Gender	Father's/Spouse Name	Date of Birth#	Nationality	Education Level	Date of Joining	Designation
1	2	3	4	5	6	7	8	9	10	11

Category Address *(HS/S/SS/US)	Type of Employment	Mobile	UAN	PAN	ESIC IP	LWF	AADHAAR	Bank A/c Number	Bank	Branch (IFSC)	Present Address	Permanent
12	13	14	15	16	17	18	19	20	21	22	23	24

Servie Book No.	Date of Exit	Reason for Exit	Mark of Identification	Photo	Specimen Signature/Thumb Impression	Remarks
25	26	27	28	29	30	31

*(Highly Skilled/Skilled/Semi Skilled/Un Skilled)

#Note: In case the age is between 14 to 18 years, mention the nature of work, daily hours of work and Intervals of rest in the remarks Column.



APPENDIX-VII

Form-XVI
[See Rule 78(1) (a) (i)]

Muster Roll

Name and address of
contractor.....
.....

Name and address of establishment which contractor is
carried
on.....

Name and location of
work.....
.....

Name and address of Principal EmployerFor the month of
fortnight.....

Sl. 1	Name of work Man 2	Se x 3	Father's/ Husband's 4	Date					Remark
				1	2	3	4	5	



FORM B

[See Rule 78(1) (a) (i)]

APPENDIX-VIII

FORMAT FOR WAGE REGISTER

Name and address of contractor.....

Name and address of establishment which contractor is carried on.....

Name and location of work.....

Name and address of Principal Employer.....For the month of fortnight.....

Rate of Minimum Wages and since the date.....				
	Highly Skilled	Skilled	Semi-Skilled	Un Skilled
Minimum Basic				
DA				
Overtime				

Name of the Establishment _____ *Name of Owner* _____ *LIN* _____ Wage period

From _____ To _____ (Monthly/Fortnightly/Weekly/Daily/Piece Rated)

Sl. No. in Employee register	Name	Rate of Wage	No. of Days worked	Overtime hours worked	Basic	Special Basic	DA	Payments Overtime	HRA	Others	Total
1	2	3	4	5	6	7	8	9	10	11	12

Deduction								Net Payment	Employer Share PF Welfare Found
PF	ESIC	Society	Income Tax	Insurance	Others	Recoveries	Total		
13	14	15	16	17	18	19	20	21	22

Receipt by Employee/Bank Transaction ID	Date of Payment	Remarks
23	24	25

FORM C
FORMAT OF REGISTER OF LOAN/ RECOVERIES

Name of Establishment _____ *LIN* _____

Sl. Number In Employee register	Name	Recovery Type (Damage/loss/fine/advance/loans	Particulars	Date of damage/Loss*	Amount
1	2	3	4	5	6

Whether show cause issued*	Explanation heard in presence of*	Number of Installments	First Month/Year	Last Month/Year	Date of Complete Recovery	Remarks
7	8	9	10	11	12	13

*Applicable only in case of damage/loss/fine



Form-XVII [See Rule 78 (2) (a)]

Register of wages

Name and address of contractor.....

Name and address of establishment which contractor is carried on.....

Name and location of work.....

Name and address of Principal Employer.....For the month of fortnight.....

							Amount of wages								
S. No	Name of workman	Serial no in the register of workman	Description/ nature of work done	No. of days worked	Units of work done	Daily rates of wages/ piece rate	Basic wages	Dearness Allowance	Over-time	Other cash payment nt. (indicate nature)	Total	Deduction if any (indicate nature)	Net amount paid	Sig. or thumb impression of the workmen	Initial contract or his representative
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16

**WAGE CARD**

Wages Card No.....

Name and Address of Contractor.....Date of issue.....

Name and location of work.....Designation.....

Name of workman.....Month/Fortnight.....

Rate of Wages.....

1	2	3	4	5	6	7	8	9	1	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2	2	3	31
									<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>	<u>4</u>	<u>5</u>	<u>6</u>	<u>7</u>	<u>8</u>	<u>9</u>	<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>	<u>4</u>	<u>5</u>	<u>6</u>	<u>7</u>	<u>8</u>	<u>8</u>	<u>0</u>

Morning

Rate

Evening

Amount

Initial

Received from.....the sum of Rs..... on account of my wages

Signature

The Wage Card is valid for one month from the date of issue



19/Form-XIX
78 (2)
[See rule 78 (1) (b)]

APPENDIX-IX

Wages Slip

Name and address of contractor.....

Name and Father's/Husband name of workman.....

Name and location of work.....

For the week/Fortnight/Month ending.....

1. No. of days worked.....

2. No. of units worked in case of piece rate workers.....

3. Rate of daily wages/piece rate.....

4. Amount of overtime wages.....

5. Gross wages payable.....

6. Deduction, if any.....

7. Net amount of wages paid.....

Initials of the contractor or his representative



APPENDIX-X

14/Form-XIV
[See rule 76]
Employment Card

Name and address of contractor.....

Name and address of establishment under which is carried.....

Name of work and location of work.....

Name and address of Principal Employee.....

1. Name of the workman.....

2. SI. No. in the register of workman employed.....

3. Nature of employment/designation.....

4. Wage rate (with particulars of unit in case of piece work).....

5. Wage period.....

6. Tenure of employment.....

7. Remark.....

Signature of Contractor



APPENDIX-XI

FORM OF PERFORMANCE SECURITY (GUARANTEE)

Bank Guarantee Bond (On Non-Judicial Stamp Paper of Rs100/-)

1. In consideration of the Chairman, AAI (hereinafter called “AAI”) having offered to accept the terms and conditions of the proposed agreement between
..... [hereinafter called the said contractor(s)] for the work
..... (hereinafter “the said agreement”) having agreed to production of a irrevocable Bank Guarantee for Rs.
..... (Rupeesonly) as a security / guarantee from the contractor(s) for compliance of his obligations in accordance with the terms and conditions in the said agreement.
We..... (Indicate the name of the Bank) (hereinafter referred to as “the Bank”) hereby undertake to pay to the Chairman, AAI an amount not exceeding Rs.
..... (Rupeesonly) on demand by AAI.
2. We..... (Indicate the name of the Bank) do hereby undertake to pay the amounts due to payable under this Guarantee without any demure, merely on a demand from AAI stating that the amount claimed is required to meet the recoveries due or likely to be due from the said contractor(s). Any such demand made on the Bank shall be conclusive as regards the amount due and payable by the Bank under this Guarantee. However, our liability under this guarantee shall be restricted to an amount not exceeding Rs.
(Rupees only).
3. We, the said Bank, further undertake to pay the Chairman, AAI any money so demanded notwithstanding any dispute or disputes raised by the contractor(s) In any suit or proceeding pending before any court or tribunal relating thereto, our liability under this present being absolute and unequivocal.

The payment so made by us under this bond shall be a valid discharge of our liability for payment there under and the contractor(s) shall have no claim against us for making such payment.
4. We.....(Indicate the name of bank) further agree that the guarantee herein contained shall remain in full force and effect during the period that would be taken for the performance of the said agreement and that it shall continue to be enforceable till all the dues of AAI under or by virtue of the said agreement have been fully paid and its claims satisfied or discharged or till Engineer-In-Charge on behalf of AAI certified that the terms and conditions of the said agreement have been fully and properly carried out by the said contractor(s) and accordingly discharges this guarantee.



5. We..... (indicate the name of the bank) further agree with AAI that AAI shall have the fullest liberty without our consent and without effecting in any manner our obligations hereunder to vary any of terms and conditions of the said agreement or to extend time of performance by the said contractor(s) from time to time or to postpone for any time or from time to time any of the powers exercisable by AAI against in the said contractor(s) and to forebear and enforce any of the terms and conditions relating to the said agreement and we shall not be relieved from our liability by reason of any such variation, or extensions being granted to the said contractor(s) or for any forbearance, act of omission on the part of AAI or any indulgence by the AAI to the said contractor(s) or by any such matter or thing whatsoever which under the law relating to securities would, but for this provision, have effect of so relieving us.
6. This guarantee will not be discharged due to the change in the constitution of the Bank or the contractor(s).
7. We..... (Indicate the name of the bank) lastly undertake not to revoke this guarantee except with the previous consent of AAI in writing.
8. This guarantee shall be valid upto.....unless extended on demand by AAI. Notwithstanding anything mentioned above, our liability against this guarantee is restricted to Rs. (Rupees only) and unless a claim in writing is lodged within six months of the date of expiry or the extended date of expiry of this guarantee all our liabilities under this guarantee shall stand discharged.

In presence of

Dated this _____ Day of _____

Witness

- 1.
- 2.

For and on behalf of (The Bank)

Signature _____

Name & Designation _____

Authorization No. _____

Name & Place _____

Bank's Seal _____

The above Guarantee is accepted by Airports Authority of India. For and on behalf of Airports Authority of India

Signature _____

Name _____

Designation _____

Dated _____

Note: * Date of validity should be schedule date of completion + Six months.



APPENDIX-XI-A

Format for Letter of undertaking from the Depositor to Bank

*(To be submitted along with Security Deposit / Earnest Money / Performance Guarantee to
Airports Authority of India)*

(To be submitted in the Letter head of the firm)

The Branch Manager,
.....Bank,
.....

Sub: - My / Our Bank Guarantee bearing No.....dated for amount..... Issued in
favour of Airport Authority of India A/c.....

Sir,

The subject Bank Guarantee is obtained from your bank for the purpose of **Security Deposit / Earnest Money / Performance Guarantee** on account of contract awarded / to be awarded by M/s Airports Authority of India to me / us.

I hereby authorized the Airport Authority of India in whose favour the deposit is made to close the subject Bank Guarantee before maturity/ on maturity toward adjustment of dues without any reference /consent /notice from me / our side and the bank is fully discharged by making the payment to Airport Authority of India.

Signature of the Depositor

Place:

Date:



APPENDIX-XII

LIST OF ACTS AND OMISSIONS FOR WHICH FINES CAN BE IMPOSED

In accordance with rule 7(v) of the AAI Contractor's Labour Regulations to be displayed prominently at the site of work both in English and local Language.

1. Wilful insubordination or disobedience, whether alone or in combination with other.
2. Theft fraud or dishonesty in connection with the contractors beside a business or property of AAI.
3. Taking or giving bribes or any illegal gratifications
4. Habitual late attendance.
5. Drunkenness lighting, riotous or disorderly or indifferent behavior
6. Habitual negligence.
7. Smoking near or around the area where combustible or other materials are locked
8. Habitual Indiscipline
9. Causing damage to work in the progress or to property of the AAI or of the contractor.
10. Sleeping on duty.
11. Malingering or slowing down work.
12. Giving of false information regarding name, age, father's name, etc.
13. Habitual loss of wage cards supplied by the employer's
14. Unauthorized use of employer's property of manufacturing or making of unauthorized particles at the work place
15. Bad workmanship in construction and maintenance by skilled workers which is not approved by the Department and for which the contractors are compelled to undertake rectifications.
16. Making false complaints and/or misleading statements.
17. Engaging on trade within the premises of the establishments.
18. Any unauthorized divulgence of business affairs of the employees.
19. Collection or canvassing for the collection of any money within the premises of an establishment unless authorised by the employer.
20. Holding meeting inside the premises without previous sanction of the employers.
21. Threatening or intimidating any workman or employer during the working hours within the premises.



APPENDIX-XIII

Form-XVII

[See Rule 78 (2) (d)]

Register of Fines

Name and address of contractor.....

Name and address of establishment which contractor is carried on.....

Name and location of work.....

Name and address of Principal Employer.....

Sl. No.	Name of workman	Father's/ Husband's Name	Designation n nature of employment	Act or action for which fine imposed	Date of Offence	Whether workman showed cause against fine	Name of person in whose presence employee's explanation was heard	Wage period and wages payable	Amount of the imposed	Date on which fine realized	Remarks
1	2	3	4	5	6	7	8	9	10	11	12



APPENDIX-XIV

Form-XVII
[See Rule 78 (2) (d)]
Register of Deduction for Damage or Loss

Name and address of contractor.....

Name and address of establishment under which contract is carried on.....

Name and location of work.....

Name and address of Principal Employer.....

Sl. No.	Name of workman	Father's Husband's Name	Designation /nature of employment	Particular of Damages or Loss	Date of damages or loss	Whether workman showed cause against deduction	Name of person in whose presence employee's explanation was heard	Amount of deduction imposed	No. of installments	Date of recovery		Remark
										First Instalment	Last Instalment	
1	2	3	4	5	6	7	8	9	10	11	12	13



APPENDIX-XV

Form-XXII
[See Rule 78 (2) (d)]
Register of Advances

Name and address of contractor.....

Name and address of establishment under which contract is carried on.....

Name and location of work.....

Name and address of Principal Employer.....

Sl. No.	Name of workman	Father's Husband's Name	Designation /nature of employment	Wage period and wages payable	Date and amount of advance paid	Purpose for which advance paid	Number of installment by which advance to be repaid	Date and amount of each installment repaid	Date on which last installment was repaid	Remark
1	2	3	4	5	6	7	8	9	10	11



APPENDIX-XVI

Form-XXIII [See Rule 78 (2) (e)]
Register of Overtime

Name and address of contractor.....

Name and address of establishment under which contract is carried on.....

Name and location of work.....

Name and address of Principal Employer.....

S. No	Name of workmen	Father's/ Husbands Name	Sex	Designation/ nature of employment	Date on which overtime worked	Total overtime worked at project in case of piece rate	Normal rate of wages	Overtime rate of wages	Overtime earning	Rate on which overtime paid	Remarks
1	2	3	4	5	6	7	8	9	10	11	12



APPENDIX-XVII

Format Consent Letter [Refer Clause 25 Para 2 ii (b)]

To,

The Chairman/Member/Regional Executive Director,
Airports Authority of India,

SUB: Request for appointment of arbitrator under Clause ___ of the ___ agreement dated for _____

Sir/Madam,

1. We state that _____ (contractor/agency) was awarded work/ concession of _____ at _____ Airport/ _____ (other location) of Airports Authority of India through Award Letter dated _____
2. Dispute related to _____ arose between us (contractor/agency) and AAI.
3. On _____ (date), dispute was referred to Mediation as per AAI Mediation Policy and any settlement on the following claims/disputes was not reached between the parties:
 - (i)
 - (ii)
 - (iii)
4. A concise statement along with claim in respect of each of such disputes is attached herewith.
5. In view of the above, we invoke arbitration under clause _____ of the _____ agreement between us and AAI and as per proviso to Section-12(5) of the Arbitration & Conciliation Act, 1996, we hereby agree and request the Chairman/Member/Regional Executive Director AAI to appoint arbitrator from AAI 's panel of arbitrators.
6. I / We also give my / our consent for appointing any of an arbitrator from AAI's approved panel of arbitrators, **as per paragraph-5 above.**

Thanking you,

(_____)
Authorized signatory of _____

Encl. : As above



APPENDIX -XVIII

INTEGRITY PACT

The integrity pact shall be signed by both the parties in the following format

~~“This Pact made thisday of between Airports Authority of India, a body corporate constituted by the Central Government under the Airports Authority of India Act, 1994 and having its Corporate Office at Rajiv Gandhi Bhawan, New Delhi, and offices atin India, hereinafter called the Authority (which term shall unless excluded by or is repugnant to the context, be deemed to include its Chairman, or Member, Executive Directors, Airport Directors, officers or any of them specified by the Chairman in this behalf, and shall also include its successors and assigns) of the one part~~

~~AND~~

~~.....represented by of the other part, hereinafter called the “Bidder/Contractor “(which term shall unless excluded by or is repugnant to the context be deemed to include its heirs, representatives, successors and assigns of the Bidder/ Contractor)~~

~~WHEREAS the Authority intends to award, under laid down organizational procedures, tender/ contract for..... The Authority, while discharging its functions on business principles, values proper compliance with all relevant laws and regulations, and the principles of natural justice, ethics, equity, fairness and transparency in its relations with the Bidders/ Contractors.~~

~~WHEREAS the Authority is desirous to make its business mechanism more transparent, thus to ensure strict adherence of the aforesaid objectives/goals, the Authority hereby adopts the instrument developed by the renowned international non-governmental organization “Transparency International” (T I) headquartered in Berlin (Germany). The Authority will appoint an Independent External Monitor (IEM) who will monitor the tender process and the execution of the contract for compliance with the principles mentioned above.~~

~~AND WHEREAS the Bidder is submitting a tender to the Authority for In response to the NIT (Notice Inviting Tender) dated Contractor is signing the contract for execution ofNOW, therefore, To avoid all forms of corruption by following a system that is fair, transparent and free from any influence/prejudiced dealings prior to, during and subsequent to the currency of the contract to be entered into with a view to Enabling the Authority to obtain the desired said stores/equipment/execution of works at a competitive price in conformity with the defined specifications by avoiding the high cost and the distortionary impact of corruption on public procurement, and Enabling Authority to abstain from bribing or indulging in any corrupt practice in order to secure the contract by providing assurance to them that their competitors will also abstain from bribing and other corrupt practices and the Authority will commit to prevent corruption, in any form, by its officials by following transparent procedures. The parties hereto hereby agree to enter into this Integrity Pact and agree as follows:~~



~~1. Commitments of the Authority;~~

- ~~1.1 The Authority undertakes that no official of the Authority, connected directly or indirectly with the contract, will demand, take a promise for or accept, directly or through intermediaries, any bribe, consideration, gift, reward, favour or any material or immaterial benefit or any other advantage from the BIDDER, either for themselves or for any person, organization or third party related to the contract in exchange for an advantage in the bidding process, bid evaluation, contracting or implementation process related to the contract.~~
- ~~1.2 The Authority will, during the pre-contact stage, treat all BIDDERS alike, and will provide to all BIDDERS the same information and will not provide any such information to any particular BIDDER which could afford an advantage to that particular BIDDER in comparison to other BIDDERS.~~
- ~~1.3 All the officials of the Authority will report to the appropriate authority office any attempted or completed breaches of the above commitments as well as any substantial suspicion of such a breach.~~
- ~~1.4 In case any such preceding misconduct on the part of such official(s) is reported by the BIDDER to the Authority with full and verifiable facts and the same is prima facie found to be correct by the Authority, necessary disciplinary proceedings, or any other action as deemed fit, including criminal proceedings may be initiated by the Authority and such a person shall be debarred from further dealings related to the contract process. In such a case while an enquiry is being conducted by the Authority the proceedings under the contract would not be stalled.~~

~~2. Commitments of Bidders/Contractor.~~

~~The Bidder/Contractor commits itself to take all measures necessary to prevent corrupt practice, unfair means and illegal activities during any stage of its bid or during any pre-contract or post-contract stage in order to secure the contract or in furtherance to secure it and in particular commit itself to the following.~~

- ~~2.1 The Bidder/Contractor will not offer, directly or through intermediaries, any bribe, gift, consideration, reward, favour, any material or immaterial benefit or other advantage, commission, fees, brokerage or inducement to any official of the Authority, connected directly or indirectly with the bidding process, or to any person, organization or third party related to the contract in exchange for any advantage in the bidding, evaluation, contracting and implementation of the contract.~~
- ~~2.2 The Bidder/Contractor further undertakes that it has not given, offered or promised to give, directly or indirectly any bribe, gift, consideration, reward, favour, any material or immaterial benefit or other advantage, commission, fees, brokerage or inducement to any official of the Authority or otherwise in procuring the Contract or forbearing to do or having done any act in relation to the obtaining or execution of the contract or any other contract with the Authority for showing or~~



forbearing to show favour or dis favour to any person in relation to the contract or any other contract with the Authority.

- ~~23 The Bidder / Contactor has not entered and will not enter with other bidders into any undisclosed agreement or understanding, whether formal or informal. This applies in particular to prices, specification, certifications, subsidiary contracts, submission or non-submission of bids or any actions to restrict competitiveness or to introduce cartelization in the bidding process.~~
- ~~24 The Bidder/Contractor shall, when presenting his bid, disclose the name and address of agents and representatives and Indian BIDDERS shall disclose their foreign principals or associates.~~
- ~~25 The Bidder/Contactor shall when presenting his bid disclose any and all the payments he has made or, is committed to or intends to make to agents/brokers or any other intermediary, in connection with this bid/contract.~~
- ~~26 The Bidder/Contractor further confirms and declares to the Authority that the BIDDER is the original manufacturer/integrator/ authorized government sponsored export entity of the stores and has not engaged any individual or firm or company whether Indian or foreign to intercede, facilitate or in any way to recommend to the Authority or any of its functionaries, whether officially or unofficially to the award of the contract to the BIDDER, nor has any amount been paid, promised or intended to be paid to any such individual, firm or company in respect of any such intercession, facilitation or recommendation.~~
- ~~27 The Bidder/Contractor, either while presenting the bid or during pre-contract negotiations or before signing the contract, shall disclose any payments he has made or has committed to or intends to make to officials of the Authority or their family members, agents, brokers or any other intermediaries in connection with the contract and the details of services agreed upon for such payments.~~
- ~~28 The Bidder/Contractor will not collude with other parties interested in the contract to impair the transparency, fairness and progress of the bidding process, bid evaluation, contracting and implementation of the contract.~~
- ~~29 The Bidder/Contractor will not accept any advantage in exchange for any corrupt practice, unfair means and illegal activities.~~
- ~~2.10 The Bidder / Contactor shall not use improperly, for purposes of competition or personal gain, or pass on to others, any information provided by the Authority as part of the business relationship, regarding plans, technical proposals and business details, including information contained in any electronic data carrier. The Bidder / Contactor also under takes to exercise due and adequate care lest any such information is divulged.~~
- ~~2.11 The Bidder/Contractor will inform to the Independent External Monitor.~~
- ~~i) If he receives demand for an illegal/undue payment/benefit.~~



ii) ~~If he comes to know of any unethical or illegal payment/benefit.~~

iii) ~~If he makes any payment to any Authority's associate(s)~~

2.12 ~~The Bidder/Contractor commits to refrain from giving any complaint directly or through any other manner without supporting it with full and verifiable facts.~~

2.13 ~~The Bidder/Contractor shall not instigate or cause to instigate any third person to commit any of the actions mentioned above.~~

2.14 ~~If the Bidder/Contractor or any employee of the Bidder/Contractor or any person acting on behalf of the Bidder/ Contractor, either directly or indirectly, is a relative of any of the officers of the Authority, or alternatively, if any relative of an officer of the Authority has financial interest/stake in the Bidder's/Contractor's firm, the same shall be disclosed by the Bidder/Contractor at the time filing of tender. The term 'relative' for this purpose would be as defined in Section 6 of the Companies Act 1956.~~

2.15 ~~The Bidder/Contractor shall not lend to or borrow any money from or enter into any monetary dealings or transactions, directly or indirectly, with any employee of the Authority.~~

2.16 ~~That if the Bidder/ Contractor, during tender process or before the award of the contract or during execution of the contract/work has committed a transgression in violation of section 2 or in any other form such as to put his reliability or credibility as Bidder/Contractor into question, the Authority is entitled to disqualify him from the tender process or to terminate the contract for such reason and to debar the BIDDER from participating in future bidding processes.~~

3. ~~Previous Transgression~~

3.1 ~~The Bidder/Contractor declares that no previous transgression occurred in the last three years immediately before signing of this Integrity Pact, with any other company in any country in respect of any corrupt practices envisaged hereunder or with any Public Sector Enterprise in India or any Government Department in India that could justify Bidder's exclusion from the tender process.~~

3.2 ~~The Bidder/Contractor agrees that if it makes incorrect statement on this subject, he can be disqualified from the tender process or the contract, if already awarded, can be terminated for such reason and he may be considered for debarment for future tender/contract processes.~~

3.3 ~~That the Bidder/Contractor undertakes to get this Pact signed by the subcontractor (s) and associate(s) whose value of the work contribution exceeds Rs 0.5 Cr. (Rupees zero point five Cr.) and to submit the same to the Authority along with the tender document/ contract before contract signing.~~

3.4. ~~That sub-contractor(s)/ associate(s) engaged by the Contractor, with the approval of the Authority after signing of the contract, and whose value of the work contribution exceeds Rs 0.5 Cr. (Rupees Zero point five Cr.) will be required to~~



~~sign this Pact by the Contractor, and the same will be submitted to the Authority before doing/ performing any act/ function by such subcontractor(s) / associate(s) in relation to the contract/ work.~~

~~3.5 That the Authority will disqualify from the tender process all Bidder(s) who don't sign this Pact or violate its provisions or fails to get this Pact signed in terms of policy of authority~~

~~3.6 That if the Contractor(s) does/ do not sign this Pact or violate its provisions or fails to get this Pact signed in terms of policy of authority. Authority will terminate the contract and initiate appropriate action against such Contractor(s).~~

~~4. Earnest Money, Security Deposit, Bank Guarantee, Draft, Pay order or any other mode and its validity i/e Warranty Period, Performance Guarantee/Bond.~~

~~While submitting bid, the BIDDER shall deposit an EMD/SD/BG/DRAFT/PAY ORDER ETC I/C WARRANTY PERIOD, PG/BOND, VALIDITY etc., which is as per terms and conditions and details given in NIT / tender documents sold to the Bidders.~~

~~5. Sanctions for Violations/Disqualification from tender process and exclusion from future Contacts.~~

~~5.1 Any breach of the aforesaid provisions by the BIDDER or any one employed by it or acting on its behalf (whether with or without the knowledge of the BIDDER) shall entitle the Authority to take all or any one of the following actions, wherever required:~~

~~i) To immediately call off the pre-contract negotiations without assigning any reason or giving any compensation to the BIDDER. However, the proceedings with the other BIDDER(s) would continue.~~

~~ii) To immediately cancel the contract, if already signed, without giving any compensation to the BIDDER.~~

~~iii) If the Authority has disqualified / debarred the Bidder from the tender process prior to the award under section 2 or 3 or 4, the Authority is entitled to forfeit the earnest money deposited/bid security.~~

~~iv) To recover all sums already paid by the Authority, and in case of an Indian BIDDER with interest thereon at 2% higher than the prevailing Prime Lending Rate of State Bank of India, while in case of a BIDDER from a country other than India with interest thereon at 2% higher than the LIBOR. If any outstanding payment is due to the BIDDER from the Authority in connection with any other contract or any other stores, such outstanding payment could also be utilized to recover the aforesaid sum and interest.~~



- ~~v) To en-cash the advance bank guarantee and performance bond/warranty bond, if furnished by the BIDDER, in order to recover the payments, already made by the BUYER, along with interest.~~
- ~~vi) To cancel all or any other Contracts with the BIDDER. The BIDDER shall be liable to pay compensation for any loss or damage to the Authority resulting from such cancellation/reseission and the Authority shall be entitled to deduct the amount so payable from the money(s) due to the BIDDER.~~
- ~~vii) To debar the BIDDER from participating in future bidding processes for a period upto two years.~~
- ~~viii) To recover all sums paid in violation of this Pact by BIDDER(s) to any middleman or agent or broker with a view to securing the contract.~~
- ~~ix) In case where irrevocable Letters of Credit have been received in respect of any contract signed by the Authority with the BIDDER, the same shall not be opened.~~
- ~~x) Forfeiture of Performance Bond in case of a decision by the BUYER to forfeit the same without assigning any reason for imposing sanction for violation of this Pact.~~
- ~~xi) That if the Authority have terminated the contract under section 2 or 3 or 4 or if the Authority is entitled to terminate the contract under section 2 or 3 or 4, the Authority shall be entitled to demand and recover from the contractor damages equivalent to 5% of the contract value or the amount equivalent to security deposit or performance bank guarantee, whichever is higher.~~
- ~~xii) That the Bidder / Contractor agrees and undertakes to pay the said amount without protest or demur subject only to condition that if the Bidder/Contractor can prove and establish to the satisfaction of the Authority that the disqualification / debarment of the bidder from the tender process or the termination of the contract after award of the contract has caused no damage to the Authority.~~

~~5.2 The Authority will be entitled to take all or any of the actions mentioned at para 5.1 above.~~

~~5.3 (i) to (xii) of this Pact also on the Commission by the BIDDER or any one employed by it or acting on its behalf (whether with or without the knowledge of the BIDDER), of an offence as defined in Chapter IX of the Indian Penal code, 1860 or Prevention of Corruption Act, 1988 or any other statute enacted for prevention of corruption.~~



- 5.4 ~~That if the Bidder/Contractor applies to the Authority for premature revocation of the debarment and proves to the satisfaction of the Authority that he has installed a suitable and effective corruption prevention system and also restored/recouped the damage, if any, caused by him, the Authority may, if thinks fit, revoke the debarment prematurely considering the facts and circumstances of the case, and the documents/evidence adduced by the Bidder/Contractor for first time default.~~
- 5.5 ~~That a transgression is considered to have occurred if the Authority is fully satisfied with the available documents and evidence submitted along with Independent External Monitor's recommendations/suggestions that no reasonable doubt is possible in the matter.~~
- 5.6 ~~The decision of the Authority to the effect that a breach of the provisions of this Pact has been committed by the BIDDER shall be final and conclusive on the BIDDER. However, the BIDDER can approach the Independent External Monitor(s) appointed for the purpose of this Pact.~~

6. ~~Allegations against Bidders/Contractors/ Sub-Contractors/ Associates:~~

~~That if the Authority receives any information of conduct of a Bidder/ Contractor or Sub Contractor or of an employee or a representative or an associate of the Bidder, Contractor or Sub Contractor which constitute corruption, or if the Authority has substantive suspicion in this regard, the Authority will inform the Vigilance Department for appropriate action.~~

7. ~~Independent External Monitor(s),~~

- 7.1. ~~That the Authority has appointed competent and credible Independent External Monitor(s) for this Pact.~~
- 7.2 ~~The task of the Monitor(s) is to review independently and objectively, whether and to what extent the parties comply with the obligations under this Pact. He will also enquire into any complaint alleging transgression of any provision of this Pact made by the Bidder, Contractor or Authority.~~
- 7.3. ~~That the Monitor(s) is not subject to any instructions by the representatives of the parties and would perform his functions neutrally and independently. He will report to the Chairperson of the Board of the Authority.~~
- 7.4 ~~That the Bidder / Contractor accepts that the Monitor(s) has the right to access without restriction to all project documentation of the Authority including that provided by the Bidder/Contractor. The Bidder/Contractor will also grant the Monitor, upon his request and demonstration of a valid interest, unrestricted and unconditional access to his project documentation including minutes of meeting. The same is applicable to Sub Contractors and Associates. The Monitor is under obligation to treat the information and documents of the Authority and Bidder/ Contractor / Sub Contractors/ Associates with confidentiality.~~
- 7.5. ~~That as soon as the Monitor notices, or believes to notice, a violation of this Pact, he will so inform the management of the Authority and request the management~~



~~to discontinue or heal the violation, or to take other relevant action. The Monitor(s) can in this regard submit his recommendations/ suggestions. Beyond this, the Monitor(s) has no right to demand from the parties that they act in a specific manner, refrain from action or tolerate action.~~

~~7.6 That the Authority will provide to the Monitor(s) sufficient information about all meetings among the parties related to the project provided such meetings could have an impact on the contractual relations between the Authority and the Contractor / Bidder. The parties offer to the Monitor(s) the option to participate in such meetings.~~

~~7.7 That the Monitor(s) will submit a written report to the Chairperson of the Board of the Authority within 2 weeks from the date of reference or intimation to him by the Authority and, should the occasion arise, submit proposals for correcting problematic situations.~~

~~7.8 That if the Monitor(s) has reported to the Chairperson of the Board a substantiated suspicion of an offence under relevant Anti Corruption Laws of India and the Chairperson has not, within reasonable time, taken visible action to proceed against such offence or reported it to the Vigilance Department, the Monitor may also transmit this information directly to the Central Vigilance Commissioner, Government of India.~~

~~7.9 The word 'Monitor' would include singular and plural.~~

~~8. Facilitation of Investigation.~~

~~In case of any allegation of violation of any provisions of this Pact or payment of commission, the Authority or its agencies shall be entitled to examine all the documents including the Books of Accounts of the BIDDER and the BIDDER shall provide necessary information and documents in English and shall extend all possible help for the purpose of such Examination.~~

~~9. Law and Place of Jurisdiction.~~

~~That this Pact is subject to provisions under Indian Law. The place of performance and jurisdiction is the Corporate Headquarter /the Regional Headquarter / office of the Authority, as applicable.~~

~~10. Other Legal Actions~~

~~10.1 That the changes and supplements as well as termination notice need to be made in writing.~~

~~10.2 That if the Bidder / Contractor are a partnership or a consortium, this Pact must be signed by all the partners and consortium members or their authorized representatives.~~



11. ~~Pact duration (Validity)~~

~~11.1 That this Pact comes into force when both the parties have signed it. It expires for the Contractor 12 months after the final payment under the respective contract, and for all other Bidders 3 months after the contract is awarded.~~

~~11.2. That if any claim is made / lodged during this period, the same shall be binding and continue to be valid despite the lapse of this Pact as specified herein before, unless it is discharged/determined by Chairman of the Authority.~~

~~11.3 That should one or several provisions of this Pact turn out to be invalid; the remainder of this Pact shall remain valid. In this case, the parties will strive to come to an agreement to their original intentions.~~

12. ~~Company Code of Conduct~~

~~Bidders are also advised to have a company code of conduct (clearly rejecting the use of bribes and other unethical behavior) and a compliance program for the implementation of the code of conduct throughout the company.~~

~~13. The parties hereby sign this Integrity Pact at _____ on _____~~

Buyer

~~Name of the Officer~~

~~Designation~~

~~Deptt./Ministry/PSU~~

~~Witness~~

1. _____

2. _____

Bidder

~~CHIEF EXECUTIVE OFFICER~~

~~Witness~~

1. _____

2. _____



APPENDIX XIX

(To be filled by
Contractor) (CLAUSE-
47)

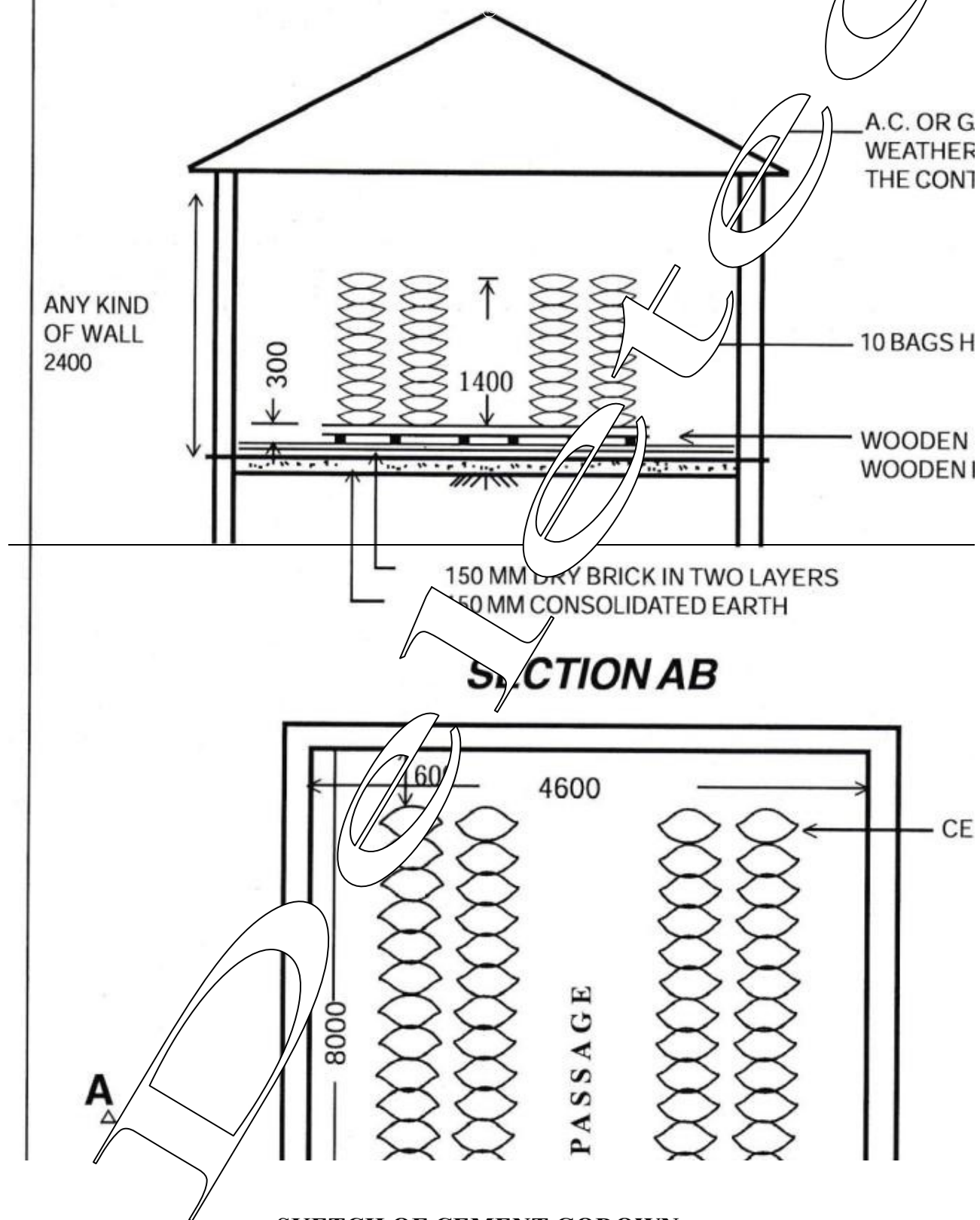
Ratio of direct payment to the specialized : % of the net payment to be made to
Specialized agency in case of composite contract agency

Sl.	Sub-head	Nature of work	% of the net payment to be made to Specialized agency
1	Sub-head I		

Note:

1. NIT approving authority must ensure that all sub heads of works are covered in above table. The bidder must indicate percentage payable to specialized agency in case of all sub heads.
2. If % is not filled in by the contractor against one or more subhead in this schedule, then 75% of the net payment admissible as per AAI for the subhead under consideration shall be paid directly to specialized agency in case of composite contract.

सीमेन्ट गोदाम का रेखाचित्र / SKETCH OF CEMENT GODOWN



SKETCH OF CEMENT GODOWN



SCHEDULES

SCHEDULE 'A'

All rates shall be quoted in the format provided and no other format is acceptable. The price bid has been given as a standard BOQ format at page no **BoQ 1-1** with the tender document, then the same is to be downloaded and to be filled by all the bidders. Bidders are required to download the BOQ file, open it and complete the white colored (unprotected) cells with their respective financial quotes and other details (such as name of the bidder). No other cells should be changed. Once the details have been completed, the bidder should save it and submit it online, without changing the File name. If the BOQ file is found to be modified by the bidder, the bid will be rejected and bidder shall be suspended for one year and shall not be eligible to bid for AAI tenders from date of issue of suspension order.

SCHEDULE 'B'

Schedule of materials to be issued to the contractor.

Sl. No.	Description of Item	Quantity	Rates in figures & words at which the material will be charged to the contractor	Place of Issue
1	2	3	4	5
NIL				



SCHEDULE `C`

Tools and plants to be hired to the contractor.

Sl.No.	Description	Hire charges per day	Place of Issue
1	2	3	4
AS PER GCC AND SCC			

SCHEDULE `D`

Extra schedule for specific requirements/ documents for the work, if any: - **SCC, Technical specifications, CPWD Specification, OEM recommendation, List of Preferred Makes, Wayfinding Manual(AAI).**

SCHEDULE `E`

Reference to General Condition of contract

Name of work **Provision of Shed over Footpath along Approach Roads at Surat Int Airport
SH: Provision of Illuminated Outdoor Signage**

Estimated cost of work **Rs.10.27Lakh (Excluding GST)**

i. Earnest Money: **Rs.30,810/-**

ii Performance Guarantee: ~~5% of contract value~~

iii Additional Performance Security: As per Clause 49 of GCC

iv Security deposit: 10% of contract value

v Defect Liability Period: **Defects Liability Period (DLP) shall be 01 year**

vi Warranty: The LED modules and electronic drivers/controllers shall be covered by a minimum **5-year manufacturer's warranty**



SCHEDULE 'F'

GENERAL RULES & DIRECTION

Officer inviting tender : AGM (E E)-I, AAI, Surat International Airport, Surat

Maximum percentage for quantity of items of work to be executed beyond which rates are to be determined in accordance with Clauses 12.2 & 12.3	See below
--	-----------

Definitions:

Office inviting tender : AAI, Surat International Airport, Surat

2(v) Engineer-in-Charge : As per AAI's DOP.

2(viii) Accepting Authority : As per AAI's DOP.

2(x) Percentage on cost materials & Labour to cover all overheads & Profits : 15%

2(xi) Standard schedule of rates : Market Rates,

2(xii) Department : AAI, Engineering – Electrical

Clause 1

(i)	Time allowed for submission of Performance Guarantee from the date of issue of letter of acceptance	within 30 Days
(ii)	Maximum allowable period of extension	As per Clause 1

Clause 2

	Authority for fixing compensation under Clause 2	As per DOP
--	--	------------

Clause 2A

	Whether Clause 2A shall be applicable	Yes/No
--	---------------------------------------	--------

Clause 5

	Number of days from the date of issue of letter of acceptance for reckoning date of start	10 days or date mentioned in work order
--	---	---

**Mile Stone(s) as per table given below:**

Sl.No.	Description of Milestones (Physical)	Time allowed in days (from date of start)	Amount to be withheld in case of non achievement of milestone
--------	---	--	--

Time allowed for execution of work.

: **03 (Three) Months****Authority to decide:**

C. Extension of time.....

Engineer-in-Charge/As per DOP

ii. Rescheduling of milestone

Engineer-in-Charge/As per DOP

iii. Shifting of date of start in case of
delay in handing over of site.....

Engineer-in-Charge/As per DOP

Clause 6, 6A

Clause applicable – (6 or 6A) :

6A**Clause 7**

Gross work to be done together with net payment/adjustment of advances for material collected, if any since the last such payment for being eligible to interim payment.	on accumulation of minimum Rs.5Lakhs
--	---

Clause 10A**Testing equipment to be provided by the contractor at site lab**

All the Testing equipment's required for conducting test works

as per CPWD, OEM recommendation and AAI specifications as applicable. : **As per SCC****Clause 10 B(II)**

Whether Clause 10B(II) shall be applicable	Yes /No
Interest on Mobilization Advance	per Annum

Clause 10C:**Applicable/ ~~Not Applicable~~****Component of labour expressed as percent of value of work: NA**



Clause 10-CA

Materials covered under this clause	Nearest Material (other than cement*, reinforcement bars, structural steel & Bitumen) for which All India Wholesale Price index is to be followed	Base price and its corresponding period of all the materials covered under clause 10CA
1. Cement (OPC/ PPC)		Base price for cement and reinforcement steel to be determined as issued under authority of DG (Works). CPWD or concerned Zonal Chief Engineer, CPWD as on last date of receipt of tender. In case base price for cement, reinforcement steel and Bitumen as to be issued by CPWD is not available concerned ED (Engg) empowered to determine the same.
2. Reinforcement steel bars (TMT)		
3. Structural Steel		
4. Bitumen		

***Note:**

1. Includes cement component used in RMC brought at site from outside approved RMC plants, if any.
2. ~~Base price and its corresponding period of all the materials covered under clause 10CA is to be mentioned at the time of approval of NIT. In case of recall of tenders, the base price may be modified by adopting latest base price and its corresponding period.~~

Clause 10-CC

Clause 10CC to be applicable in contracts with stipulated period of completion exceeding the period shown in next column	18 Months
--	-----------

~~Schedule of component of other materials, Labour, POL etc. for price escalation.~~

~~Component of civil (except material covered under clause 10-CA) / Electrical construction materials express as percentage total value of workXm%.~~

~~Component of labour, expressed as % of total value of work.....Y.. %.~~

~~Component of POL, expressed as % of total value of work.....Z..%~~

Note: ~~Xm % should be equal to (100) — (material covered under clause 10-CA i.e. cement, steel and~~

~~Other materials specified in clause 10-CA + component of labour + component of POL).~~

**Clause 11**

Specification to be followed for execution of work	a) “CPWD Specification with up to date correction slips, AAI, BIS, other specification as applicable. b) Technical specification. c) Manufacturer’s Specification.
--	--

Clause 12

12.2 & 12.3	Deviation limit beyond which clauses 12.2 & 12.3 shall apply for buildings, pavements and all other works above foundation level.	15% (Fifteen Percent)
12.5	Deviation limit beyond which clauses 12.2 & 12.3 shall apply for foundation work	100% (Hundred Percent)
	Overall Deviation i/c extra items, if any.	30% (Thirteen Percent)

Clause 16

	Competent Authority for deciding reduced rates	DGM/ Jt.GM(Engg)
--	--	------------------

Clause 18**Mandatory machinery tools & plants to be deployed by the contractor at site:**

To be provided as per SCC required for timely completion of work.

Clause 25

Place of Arbitration: As decided by Competent Authority.

Clause 36(1)**Requirement of Technical Representative(s) and recovery rate**

Sl. No.	Minimum Qualification of Technical Representative	Discipline	Designation (Principal Technical representative)	Minimum Experience	Number	Rate at which recovery shall be made from the contractor in the event of not fulfilling provision of clause 36	
						Figures (Rs.)	Words (Rupees)
1	Diploma	Electrical	Technical representative	03years	1	18000/- per month	Eighteen thousand per month

- Assistant Engineers retired from Government services that are holding Diploma will be treated at par with Graduate Engineers.
- Diploma holder with minimum 10-year relevant experience with a reputed construction company can be treated at par with Graduate Engineer for the purpose of such deployment subject to the condition that such diploma holder should not exceed 50% of requirement of degree engineers

**Clause 37**

Licence Fee for unpaved land

Rs. N/A

Clause 41(b)

Integrity Pact applicable

Yes/No

Clause 42

(i)	Schedule/statement for determining theoretical quantity of cement & bitumen on the basis of Delhi Schedule of Rates	DSR 2016 printed by C.P.W.D with up-to-date correction slips till last date of submission of tender, technical specifications & BOQ.
(ii)	Variations permissible on theoretical quantities	
a.	Cement for works with estimated cost put to tender not more than Rs.5 lakhs.	3% plus/minus
	For works with estimated cost put to tender more than Rs.5 lakhs	2% plus/minus
b.	Steel Reinforcement and structural steel section for each diameter, section and category	2% plus/minus
c.	Bitumen	2.5% plus only & NIL on minus side
d.	All other materials	

RECOVERY RATES FOR QUANTITIES BEYOND PERMISSIBLE VARIATION

Sl. No.	Description of items	Rates in figures and words at which recovery shall be made from the contractor	
		Excess beyond permissible variation	Less use beyond the permissible variation*
1.	Cement		
2.	Steel reinforcement		
3.	Structural Sections		
4.	Bitumen issued free		
5.	Bitumen issued at stipulated fixed price		

* ——— Provided work is considered technically sound. Otherwise work has to be re-executed as per direction of Engineer in charge

Clause 48**Escrow Account:** Applicable / Not applicable.

Annexure to clause 34 (x)

Annexure to clause 34 (x) showing quantities of materials for areas of surfacing to be considered for working out minimum period for which hire charges of road roller are to be recovered.

SL.N o.	Material of surfacing	Quantity or areas
1.	Consolidation of earth subgrade	1860 Sq.m
2.	Consolidation of stones soling 15 cm to 22.5 cm thick	170 Cu.m
3.	Consolidation of brick soling 10 cm to 20 cm thick	230 Cu.m
4.	Consolidation of wearing coat of stone ballast 7.5 cm to 11.5 cm thick	30 Cu.m
5.	Consolidation of wearing coat of brick ballast 10 cm thick	60 Cu.m
6.	Spreading and consolidation of red bajri 6mm	1860 Sq.m
7.	Painting one coat using stone aggregate 12.5mm nominal size	
	(a) @ 1.65 m ³ per 100 m ² and paving bitumen A 90 or S 90 @ 2.25 Kg per m ² or	
	(b) @ 1.50 m ³ per 100 m ² and bitumen emulsion or Road tar @ 2.25 Kg per m ²	930 Sq.m.
8.	Painting two coats using	
	(a) For first coat, stone aggregate 12.5 mm nominal size	
	(i) @ 1.50 m ³ per 100 m ² and paving bitumen A 90 or S 90 @ 2 Kg per m ² or	
	(ii) @ 1.35 m ³ per 100 m ² and bitumen emulsion @ 2 Kg per m ² 600 Sq.m. or	
	(iii) @ 1.25 m ³ per 100 m ² with roadtar @ 2.25 Kg per m ²	600 Sq.m.
	(b) For 2nd Coat, stone aggregate 10 mm nominal size 0.9 Cu.m. per 100 Sq.m. with	
	(i) 1kg of paving bitumen A 90 or S 90 or bitumen emulsion per Sq.m. or	
	(ii) 1.25 Kg. of road tar, per Sq.m. 600 Sq.m.	600 Sq.m.
9.	Re painting with stone aggregate 10 mm nominal size 0.9 Cu.m. per 100 Sq.m. with	
	(i) 1kg of paving bitumen A 90 or S 90 per Sq.m. ;k or	
	(ii) 1.25 kg of bitumen emulsion per Sq.m. 1670 Sq.m.	1670 Sq.m.



10.	2 cm premix carpet surfacing using 2.4 m ³ of stone aggregate 10 mm nominal size per 100 m ² and binder including tack coat, the binder being hot cut back bitumen or bitumen emulsion in specified quantities.	930 Sq.m
11.	2.5 cm premix carpet surfacing using 3 m ³ of stone aggregate 10 mm nominal size per 100 m ² and binder including tack coat, the binder being hot cut back bitumen or bitumen emulsion in specified Quantities.	930 Sq.m
12.	4 cm thick bitumen concrete surfacing using stone aggregate 3.8 Cu.m. (60% 20 mm nominal size and 40% 12.5 mm nominal size) per 100 m ² and coarse sand 1.9 Cu.m. per 100 m ² and hot cut back bitumen over a tack coat of hot cut back bitumen.	460 Sq.m.
13.	5 cm thick bitumen concrete surfacing using stone aggregate 4.8 Cu.m. (60% 25 mm nominal size and 40% 20 mm nominal size) per 100 m ² and coarse sand 2.4 Cu.m. per 100 m ² and hot cut back bitumen over a tack coat of hot cut back bitumen.	370 Sq.m.
14.	6 cm thick bitumen concrete surfacing using stone aggregate 5.8 Cu.m. (60% 40 mm nominal size and 40% 25 mm nominal size) per 100 m ² and coarse sand 2.9 Cu.m. per 100 m ² and hot cut back bitumen over a tack coat of hot cut back bitumen.	280 Sq.m.
15.	7.5 cm thick bitumen concrete surfacing using stone aggregate 7.3 Cu.m. (60% 50 mm nominal size and 40% 40 mm nominal size) per 100 m ² and coarse sand 3.65 Cu.m. per 100 m ² and hot cut back bitumen over a tack coat of hot cut back bitumen.	230 Sq.m.
16.	2.5 cm bitumastic sheet using stone aggregate 1.65 Cu.m. (60% 12.5 mm nominal size 40% 10 mm nominal size) per 100 Sq.m. and coarse sand 1.65 Cu.m. per 100 Sq.m. and hot cut back bitumen over a tack coat of hot cut back bitumen.	750 Sq.m.
17.	4 cm bitumastic sheet, using stone aggregate 2.6 Cu.m. (60% 12.5 mm nominal size, 40% 10 mm nominal size) per 100 Sq.m. and coarse sand 2.5 Cu.m. per 100 Sq.m. and hot cut back bitumen over a tack coat of hot cut back bitumen.	560 Sq.m.



18.	Laying full grouted surface using stone aggregate 40 mm nominal size 6.10 Cu.m. per 100 Sq.m. with binder, binding with 20 mm to 12.5 mm nominal size stone grit. 1.83 Cu.m. per 100 Sq.m. and seal coat of binder and stone grit 10 mm nominal size, 1.07Cu.m. per 100 Sq.m., the binder being hot bitumen or tar as specified.	460 Sq.m.
19.	Laying full grouted surface using stone aggregate 50 mm nominal size 9.14 Cu.m. per 100 Sq.m. with binder, binding with stone grit 20 mm to 12.5 mm nominal size 1.83 Cu.m. per 100 Sq.m. and seal coat of binder and stone grit 10 mm nominal size, 1.07Cu.m. per 100 Sq.m., the binder being hot bitumen or tar,	370 Sq.m.
20.	4cm. thick premix macadam surfacing using stone aggregate 25 mm nominal size 4.57 Cu.m. per 100 Sq.m. and hot bitumin binding with stone aggregate 12.5 mm nominal size 1.52 Cu.m. per 100 Sq.m. and seal coat of hot bitumen and stone aggregate 10 mm nominal size 1.07 Cu.m. per 100 Sq.m.	560 Sq.m.
21.	5cm. thick premix macadam surfacing using stone aggregate 25 mm nominal size 6.10 Cu.m. per 100 Sq.m. and hot bitumin binding with stone aggregate 12.5 mm nominal size 1.52 Cu.m. per 100 Sq.m. and seal coat of hot bitumen and stone aggregate 10 mm nominal size 1.07 Cu.m. per 100 Sq.m.	460 Sq.m.



AIRPORTS AUTHORITY OF INDIA GENERAL GUIDELINES FOR THE TENDERER

1. Digitally Signed & Sealed (Encrypted) item rate online e-tenders are invited through the etendering, CPP Portal on behalf of Chairman, Airports Authority of India by **AGM (E-E)-I, AAI, E&M Workshop Complex, Dumas Road, Surat Airport, Surat-394550, Phone No.0261-2700224, (Bid Manager)** from eligible Class – 1 local supplier as per Public Procurement Policy of Government of India for the work with estimated cost as mentioned in NIT, This estimate however is given merely as rough guide.

2. The Tenders are invited in open e-Tender two envelope system

Envelope- I (Tender processing fee, EMD, technical bid and pre-qualification):

A) Tender processing fee and EMD :

It shall contain Scanned copy of details of online payment made through SBI payment Gateway using SBI / Other Banks/ NEFT / RTGS mode on CPP Portal against Tender Processing Fee and EMD.

OR

~~Valid registration certificate of MSME / MSEs / NSIC, claiming exemption of EMD~~

B) Technical Bid containing the following:

- i) It shall Contain scanned copy of undertaking under public procurement policy for make in India as per format given performa at **Page no.171**, Tender Acceptance Letter of AAI's Tender Conditions as per the format given at tender document **Page no.180**.
- ii) It shall contain scanned copy of self-attested documents like PAN, ~~Valid Electrical Contractors License~~, Form A, Form-B, GST Registration Certificate, EPF & ESIC registration certificate, undertaking **regarding black listing / debarment**, ~~undertaking regarding compliance of minimum wages~~, Undertaking for **"Registered under GST and compliance of GST** provision, list of Tools & Plant machinery undertaking, Authorization Letter/Power of Attorney, PQ Performa, GFR undertaking and other undertakings as per NIT ~~Valid registration certificate of MSME / MSEs / NSIC.~~

C) Qualifying requirements of contractors/ tenderers containing the following

- i) It shall Contain scanned copy of Details of experience from Govt. organizations or private clients, Balance Sheet, turnover, TDS certificate, minimum net worth certificate (Form-C),

Envelope-II- (Financial Bid): - The Financial e-Bid through CPP Portal.

- i. The Bidders shall quote their item rates online through CPP portal only.
- ii. The Price Bids / Financial Bids of those Bidders who are fulfilling the criteria Envelope-I shall be opened.



- iii. All rates shall be quoted in the format provided and no other format is acceptable. If the price bid has been given as a standard SOQ format with the tender document, then the same is to be downloaded and to be filled by all the bidders. Bidders are required to download the SOQ file, open it and complete the unprotected cells with their respective financial quotes and other details (such as name of the bidder). No other cells should be changed. Once the details are filled, the bidder should save it and submit it online, without changing the filename. If the SOQ file is found to be modified by the bidder, the bid will be rejected.
 - iv. In event no rate has been quoted for any item(s) leaving amount blank, it will be presumed that the contractor has included the cost of this / these item(s) in other items and rate for such item(s) will be considered as zero and work will be required to be executed accordingly.
 - v. All rates shall be quoted online in the CPP Portal in Indian Rupees only in the Envelope-II (Price Bid Folder).
 - vi. AAI does not give any concessional forms / certificates / permits towards any taxes, duties & levies etc.
 - vii. Once the bidder has uploaded the digitally signed unconditional acceptance Letter as an attachment, he is not permitted to upload any additional file or put any remark(s)/ conditions(s) in / along with the Tender Document, in case, the same is found violated, the tender shall be rejected and 10% of the EMD amount shall be forfeited.
 - viii. Please note there is no separate provision of header discount, loading of Taxes and duties in standard SOQ format. Hence bidders are advised to quote the item rate considering all these factors as a whole and then quote the rate as mentioned in above paras.
3. Only 'Class-I local supplier', as defined under the **"Public Procurement Policy (Preference to Make in India), order 2017 dated 19.07.2024"** or amended upto date, notified by Government of India, Ministry of Commerce and Industry, Department of Promotion of Industrial & Internal Trade (Policy Procurement Section) vide letter No. P-45021/2/2017-PP (BE-II) dated 16th Sep 2020 shall be eligible to bid in this tender.
- 'Class-1 local supplier' means a supplier or service provider, whose goods, services or works offered for procurement, meets the minimum local content as prescribed for 'Class-I local supplier' under this Order.
- Minimum Local Content: The 'local content' requirement to categorize a supplier as 'Class-1 Local Supplier' is minimum 50%.**



Verification of local content:

- a) The 'Class-1 local supplier' shall submit in Envelope-I an undertaking as given under **Annexure-VI** at **page no.171** of the tender document.
 - b) In case of false declarations, bidder or its successors can be debarred for up to two years for participating in tenders of AAI along with other actions as may be permissible under law.
 - c) A supplier who has been debarred by any other procuring entity for violation of this order shall not be eligible for participate for the duration of the debarment.
4. The works are required to be completed within the period as mentioned in NIT & Schedule-F.
 5. Not more than one Tender shall be submitted by a contractor or a firm. Not more than one concern in which an individual is interested as Proprietor and/or partner shall tender for the execution of the same work. If they do so, all such Tenders shall be liable to be rejected.
 6. The Accepting Authority as mentioned in schedule "F" shall be the Accepting Officer hereinafter referred to as such for the purpose of this contract.
 7. In the event of the tender being submitted by a partnership firm, it must be signed separately by each partner thereof or in the event of the absence of any partner, it must be signed on his behalf by a person holding a power-of-attorney authorizing him to do so. Such power of attorney to be uploaded with the tender, and it must disclose that the firm is duly registered under the Indian Partnership Act, 1952.
 8. Tender document consisting of plans, specifications, Schedule(s) of quantities of the various classes of work to be done, the conditions of contract and other necessary documents will be available on e-tender portal, can be downloaded from the NIC CPP e-tendering portal.
 9. Tenderers are advised to inspect and examine the site and its surroundings and satisfy themselves before submitting their Tenders as to the nature of the ground and sub soil (so far as is practicable), the nature of the site, the means of access to the site, the accommodation they may require, working conditions including space for stacking of materials, installation of T&P, rates of various materials to be incorporated in works, conditions affecting accommodation and movement of labours etc. and in general shall themselves obtain all necessary information as risks, contingencies and other circumstances which may influence or effect their Tender. A Tenderer shall be deemed to have full knowledge of the site whether he inspects it or not and no extra charges consequent on any misunderstanding or otherwise shall be allowed.



10. Submission of a Tender by a Tenderer implies that he has read this notice and all other contract documents and has made himself aware of the scope and specifications of the works to be done and of conditions and rates at which land for stores, tools and plant, etc. will be allotted to him by Airports Authority of India, local conditions, local material rates and other factors bearing on the execution of the works.
11. All rates shall be quoted in the format provided on CPP Portal and no other format is acceptable.
12. As this tender is an Item rate Tender, rates for all items quoted shall only be considered. Any Tender containing percentage below/above the total estimated cost is liable to be rejected. Tenderers which propose any alteration in the works specified in the said form of invitation to tender, or in the time allowed for carrying out the work, or which contain any other conditions of any sort including conditional rebates will be summarily rejected. Any Tender containing percentage below/above the rates quoted is liable to be rejected
13. Tenders shall be received through CPP Portal up to the date and time as mentioned in e-NIT and shall be opened on the date and time as mentioned at e-NIT. Any change or extension of date shall be intimated through e-tendering portal.
14. Earnest Money amount as mentioned at **Page No. 149** under **Schedule E** shall be deposited by due date as mentioned in e-NIT.
15. Notification of Award of contract will be made in writing to the successful bidder by the Accepting Authority or his representative. The contract will normally be awarded to the qualified and responsive Bidder offering lowest evaluated bid in conformity with the requirements of the specifications and contract documents and the Accepting Authority shall be the sole judge in this regard. The Accepting Authority does not bind himself to accept the lowest or, any tender or to give any reason for his decision.
- 15.1 A responsive tenderer is one who submits priced Tender and accepts all terms and conditions of the specifications and contract documents.
- 15.2 A major modification is one which affects in any way the quality, quantity and period of completion of the work or which limits in any way the responsibilities or liabilities of the Bidder or any right of AAI, as required in the specifications and contract documents. Any modification in the terms and conditions of the Tender which are not acceptable to AAI shall also be treated as a major modification.
- 15.3 A Tenderer shall submit a responsive bid, failing which his Tender will be liable to be rejected.



- 16 The Accepting Authority reserves to himself the right to accept the whole or any part of the Tender and Tenderer shall be bound to perform the same at his quoted rates. No claim whatsoever will be entertained on this account.
- 17 On acceptance of Tender, "Earnest Money" will be treated as part of the security deposit.
- 18 Airports Authority of India shall return the earnest money where applicable to every unsuccessful Tenderer except as mentioned in the Tender document.
- 19 Canvassing in connection with Tenders is strictly prohibited and the Tenders submitted by the Tenderers who resort to canvassing will be liable to be rejected.
- 20 The Tenderer shall not be permitted to tender for works in Airports Authority of India Engineering Department, responsible for award and execution of contracts, in which his near relative is posted as Manager Finance & Accounts or Sr. Officer or as an engineer in any capacity. He shall also intimate the names of persons who are working with him in any capacity or are subsequently employed by him and who are near relatives to any officer in Airports Authority of India. Any breach of this condition by the contractor would render him liable to be debarred from Tendering for next 2 years.
- 21 No Engineer or other Executive employed in Engineering or Administrative duties in an Engineering Department of Airports Authority of India/Govt. of India is allowed to work as a contractor for a period of two years of his retirement from Airports Authority of India/Government service, without the previous permission of Airports Authority of India/Govt. of India. The contract is liable to be cancelled if either the contractor or any of his employees is found at any time to be such a person who had not obtained the permission of Airports Authority of India/Govt. of India as aforesaid before submission of the Tender or engagement in the contractor's service.
- 22 On acceptance of the Tender, the name of the accredited representative(s) of the contractor who would be responsible for taking instructions from the Engineer-in-Charge shall be communicated to the Engineer-in-Charge.
- 23 A tenderer shall submit the tender which satisfies each and every condition laid down in this notice failing which the Tender will be liable to be rejected. Also if the credential submitted by the firm found to be incorrect or have some discrepancy which disqualifies the firm then the AAI shall take the following action:

Forfeit the entire amount of EMD submitted by the firm

a) The agency shall be liable for debarment from tendering in AAI, apart from any other appropriate contractual/legal action.
- 24 The site for the work is available & shall be handed over.



25 MODE OF SUBMISSION OF TENDERS:

25.1 Tender for the work shall be submitted online through CPP Portal in open tender

two envelope system as detailed below:

Tenderer should download the Tender Documents from the CPP Portal, fill up the required information and upload the same after digitally signing well in time along with authorization letter /power of attorney, if any, required. The Last date for the online submission of e-bid (Envelope I&II) is as per e-NIT.

25.2 Tender processing Fee and EMD for online E-Tender

Scanned copy of all the Documents of Envelope-I mentioned above shall be uploaded online on the CPP Portal upto due date and time as per critical data sheet. Any documents in any other mode shall not be accepted.

Non-submission of tender processing fee, EMD and Technical particulars shall lead to disqualification of tenderers.

26 Refund of EMD

The refund of EMD to tenderers who fails to qualify in the eligibility/ technical criteria, shall be initiated as below:

- a) The online payment made against tender processing fee by the tenderer will remain on '**Tender Settlement Account**' and EMD amount will remain in '**Pooling Account**'.
- b) After Opening the tender and submission of technical evaluation report on the CPP Portal, The EMD of technically qualified bidders will remain in the pooling account and EMD amount of rejected tenderers will be refunded to their source account.
- c) After submission of financial evaluation report on the CPP Portal, the EMD of L1 tenderers will remain in the pooling account and EMD amount of rejected bidders will be refunded to their source account.
- d) After A.O.C. completion on the portal, EMD amount of L1 bidder will be refunded to their source account subject to Adjustment of Security Deposit (SD) as per NIT Condition.

26.1 This Notice Inviting Tender shall form part of the contract documents. The successful Tenderer/contractor, on acceptance of his Tender by the Accepting Authority, shall **within 15 days from the stipulated date of start of the work** sign the contract consisting of Notice inviting Tenders, General conditions of contract, special/additional condition, General and particular specifications, drawings, Tender conditions as issued at the time of invitation of Tender and acceptance thereof with any correspondence leading there to.

27. PROCEDURE FOR OPENING OF TENDER

Following steps shall be followed for opening of tender documents.

- i. **Envelope-I:** Envelope-I shall be opened as mentioned in NIT.



- ii. **Envelope-II: (Financial Bid):** Envelope-II will be opened only of those bidders who will be qualifying/meeting the Eligibility Criteria as per Envelope –I of e-NIT.

28. Rejection of Tender

- i. Airports Authority of India reserves the right to reject any or part of tender without assigning any reason. The documentation submitted by tenderers shall not be returned. AAI also reserves the right at its sole discretion not to award any order under this tender call. This decision does not commit AAI to pay any costs or loss incurred directly or indirectly what so ever.
 - ii. If the tenderer deliberately gives wrong information in his tender, AAI reserves the right to reject such tender at any stage or to cancel the contract, if awarded, and to forfeit the Earnest Money, absolutely.
 - iii. Canvassing in any form in connection with the tenders is strictly prohibited and the tenders submitted by firms who resort to canvassing are liable for rejection.
 - iv. Tender in which any of the particulars and prescribed information are missing or are incomplete, in any respect and/or prescribed conditions are not fulfilled, shall be considered non-responsive and is liable to be rejected.
 - v. No correspondence shall be entertained from the tenderers after the opening of Price bid of the tender unless called by AAI.
 - vi. Tenders with incomplete / ambiguous details are liable to be rejected without seeking any further clarification.
29. Purchase preference to the Central Public Sector Undertakings shall be given, as applicable, on the date of opening of tender.

30. Validity of Tender

The tender for works shall remain open for acceptance for a period of **Ninety (90) Days** from the **last date of submission of bids i/c extension**, if any. If any tenderer withdraws his tender before the said period or makes any modifications in the terms and conditions of the tender which are not acceptable to the Department, then Airports Authority of India shall without prejudice to any other right or remedy, be at liberty to forfeit the full said earnest money absolutely.

- 31. Tenderers are advised to get themselves acquainted for e-tendering participation requirements at “instruction for Online Bid Submission”, register themselves at CPP Portal, obtain ‘User ID’ & ‘Password’ and go through the ‘self-help files’ available in the home page after login to the CPP Portal www.etenders.gov.in. They should also obtain Digital Signature Certificate (DSC) in parallel which is essentially required for submission of their application.
- 32. Tenderers are advised to go through the “instruction for Online Bid Submission” given on the CPP Portal <https://etenders.gov.in>, for online guidance, before online registration and submission of their applications/bids and submit their applications



along with firms bio-data & self-attested documents/credentials etc. as required as an attachment before due date as per e-NIT.

33. AAI is not responsible for any postal delay or delay due to link failure /internet problem etc. in respect of submission /receipt of any documents or in submission of e-Bid. Bidders who are intending to submit responsive e-Bids are requested to submit the same well in advance before the due date & time. It is the responsibility of the Bidder to make sure that the required documents /e- Bid is submitted in time.
34. Issues faced/queries of the bidders pertaining to technical support on e-portal for submission of tender documents should normally be addressed to AAI Help Desk Support (Details as mentioned in the web-NIT). In case of technical support regarding E-Tender portal. If the AAI Help Desk Support is non-responsive, the Bid Manager, **Name - Umesh K Singh, AGM (Engg.-Elect.)-I may be contacted at telephone no:- 0261-2700267, Mobile No. 7874694631, e-mail ID:- umeshksingh@aai.aero**



Annexure-I

UNDERTAKING

(To be submitted in Envelope-I)

(To be Executed in Rs. 100/- Non judicial stamp paper duly notarized)

I, (_____), age _____
years S/o _____ proprietor /
Managing Partner / Managing Director of M/s
_____ having address
_____ do hereby
solemnly affirm and state as follows;

I am competent to swear this affidavit on behalf of _____
(name of the agency) and hereby confirm that I am fully complying with the legal obligations
with regards to payment of minimum wages as per minimum wages Act – 1948 and deduction of
Provident Fund Authorities as per EPF & MP Act – 1952 and Contract Labour (Regulation and
Abolition) Act, 1970.

Date:

**Name & Signature of contractor / Firm
(with rubber stamp)**



Annexure - II

UNDERTAKING

(To be submitted in Envelope-I)

(To be submitted on company's letter head)

Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int Airport

SH: Provision of Illuminated Outdoor Signage

Tender ID : 2026_AAI_282510_1

I/We _____ (name and post of authorized signatory) on behalf
of _____ (Name of firm) do here by solemnly affirm and declare as follows:

- (i) Our firm _____ is not restrained/ debarred/ blacklisted by AAI or Central /State Govt.Depts./ PSUs/World Bank/ ADB etc. and the debarment is not in force as on last date of submission of Tender.
- (ii) None of Proprietor /Partners /Board Members /Directors of **M/s. (Name of firm)**_____ has remained Proprietor /Partner /Board Member /Director in any firm which stands debarred /blacklisted by AAI or Central /State Govt. Depts./PSUs/World Bank/ ADB etc. and the debarment is not in force as on lastdate of submission of Tender.
- (iii) Our firm understands that if our firm either debarred before the date of opening of tender or debarred before the date of contract by AAI/MoCA/DoE, our bid is liable to be rejectedat that stage.
- (iv) Our firm understands that at any stage, if above statements are found to be false,our firm shall be liable for debarment from bidding in AAI, apart from any other appropriate contractual legal action including debarment/ blacklisting, termination of the contract etc. as deemed fit.

Date:

Place :

**Name & Signature of contractor / Firm
(with rubber stamp)**



Annexure -III

Undertaking against Tax liability

(Not Applicable for those bidders whose Threshold limit exceeds Rs.20 Lacs)

(To be submitted in Envelope-I on company's letter head)

I/We _____ (Name of company/Firm)
_____ hereby undertakes that we are not liable to take GST registration
i.e., we are having turnover below threshold of Rs.20 lacs.

Further, if our Turnover exceeds the threshold limit of Rs.20 Lacs (Rs.10 Lacs for North Eastern States & Special Category State) then we will notify AAI within 15 days from the date of becoming Liable and such registration shall be submitted to AAI.

**Name & Signature of contractor / Firm
(with official rubber stamp)**

Date: _____



Annexure -IV

Undertaking for GST Registration & Complying its Provisions
(To be submitted in Envelope-I on company's letter head)

Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int Airport
SH: Provision of Illuminated Outdoor Signage

Tender ID : 2026_AAI_282510_1

To
AGM (Engg.-Elect)-I
AAI, Surat International Airport, Surat.

Name of Work :- Provision of Shed over Footpath along Approach Roads at Surat Int. Airport. SH: Provision of Illuminated Outdoor Signage

With reference to above said tender ID of the said work, I/We _____
_____ (Name of company/Firm) hereby
undertake that:

1. I/we are registered under GST and complying the GST provision.
2. In case of non-compliance of GST provisions and blockage of any input credit, I/We shall be held responsible to indemnify AAI.
3. All input credits shall be passed on to AAI by me/us.

Name & Signature of contractor / Firm
(with rubber stamp)

Date: _____



To be submitted by L-1 Tenderer before award of work

UNDERTAKING on company's letter head

I/we, (Name of the company / firm) hereby undertake that in case the Registration Certificate no. dtd. issued by (Name of Department) & experience certificate no. dtd. issued by (Name of Department) submitted by me/us, is found to be Forged/false at any stage, I/we may be debarred from AAI for taking participation in all future AAI works & any other suitable action may be taken against our company/firm as deemed fit by AAI.

**Name & Signature of contractor / Firm
(with rubber stamp)**



Annexure -VI

UNDERTAKING TO BE SUBMITTED BY AGENCIES
UNDER PUBLIC PROCUREMENT POLICY FOR MAKE IN INDIA

(on company's letter head)

(To be submitted in Envelope-I)

**Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int Airport
SH: Provision of Illuminated Outdoor Signage**

Tender ID : 2026_AAI_282510_1

Name of Contractor/Firm:

.....

I / we have applied for above tender for the work of “Provision of Shed over Footpath along Approach Roads at Surat Int Airport SH: Provision of Illuminated Outdoor Signage” and hereby undertake that:-

- I / we have gone through the “Make in India Policy” of Government of India and have understood the provisions available in the policy.
- I / we have quoted the make in India local content not less than 50% of the total quoted amount as per BOQ.

Signature of Contract:
(with rubber stamp)
Date:



Annexure -VII

FORM - A

DETAILS DETAILS OF SIMILAR WORKS SUCCESSFULLY COMPLETED OR SUBSTANTIALLY COMPLETED DURING THE LAST SEVEN YEARS ENDING ON...

Sl. No.	Details of Work	W-1	W-2	W-3
i	Name of work/ project and Location			
ii	Name and Address of client			
iii	Awarded Cost of Work (in Rs. Lakhs)			
iv	Date of commencement as per contract			
v	Stipulated date of Completion			
vi	Actual date of Completion			
vii	Completion Cost/ Actual work done			
viii	Whether the work was done on back to backbasis Yes/No			

**SIGNATURE OF BIDDER
(WITH STAMP)**

Note:- The contractor should give list of only of eligible category works of requisite amount with supporting documents issued from client.



Annexure -VIII

FORM – B

FINANCIAL INFORMATION

Name of the firm / contractor.....

1. Financial Analysis - Details to be furnished turnover on construction works with profit / loss as per figure in balance sheet account for the last three years duly certified by the Chartered Accountant as submitted by the applicant to the Income - Tax Department.

Fig in lakhs (Rs.)

Sl. No.	Particulars	Financial Year (Last Three years)		
		FY 2022-23	FY 2023-24	FY 2024-25
1	Turn-Over on Construction Works			
2	Profit/loss after Taxes (Standalone)			

2. Financial arrangements for carrying out the proposed work.

Unique Document Identification Number (UDIN).....

Signature of Chartered Accountant with Seal

SIGNATURE (S) OF BIDDER(S)



FORM – C

**CERTIFICATE OF NET WORTH FROM CHARTERED ACCOUNTANT
(TO BE SUBMITTED IN ENVELOPE-I)**

“It is to certify that as per the audited balance sheet and profit & loss account during the Financial year _____, the Net Worth of M/s _____ (Name & Registered Address of individual /firm/ company), as on _____ (the date of certificate) is Rs. _____ after considering all liabilities. It is further certified that the Net Worth of the company has not eroded by more than 30% in the last three years ending on 31st March 2025 (the relevant Year*)”.

Unique Document Identification Number (UDIN)

Signature of Chartered Accountant

.....

Name of Chartered Accountant

.....

Membership of ICAI

Date and Seal

SIGNATURE (S) OF BIDDER (S)

*The relevant year shall be the financial year ending 31st March preceding the calendar year of bid submission or 31st March of the financial year preceding the previous financial year, if the balance sheet of the previous financial year has not been audited.



Request Letter Transmission Of Bank Guarantee Cover Message To Be

Submitted By Applicant To BG Issuing Bank

(TO BE SUBMITTED IN ENVELOPE-I)

Date: _____

The Manager,

(Bank),

(Branch)

Sub: Inclusion of unique identifier code of AAI while transmitting BG cover messages where beneficiary bank is ICICI Bank (IFSC-ICICI00000007)

Dear Sir,/Madam,

I/We, _____, request you to include unique identifier _____ in field 7037 of the SFMS cover messages IFN COV 760 (for BG issuance) and IFN COV 767 (for BG amendment) while transmitting the same to the beneficiary bank (ICICI Bank. IFSC-ICICI00000007).

Thanking You,

(Vendor/Customer/Concessionaire)



Annexure -XI

Performa for declaration by Bidder for compliance of order on Restriction under Rule 144(xi) of the General Financial Rules (GFRs)-2017

(Scanned copy to be submitted by Bidder in Envelope-I on letter head of Company/Firm)

**Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int Airport
SH:Provision of Illuminated Outdoor Signage**

Tender ID : 2026_AAI_282510_1

I, the undersigned, _____ (full names), do hereby declare, in my capacity as _____ of M/s _____ (**Name of company/Firm**) _____ that:

- 1) I am competent to swear this undertaking on behalf of M/s _____ (**Name of company/Firm**) _____
- 2) I have read the Order(s) on the subject of Restrictions under Rule 144 (xi) of the General Financial Rules (GFRs), 2017 regarding restrictions on procurement from a bidder of a country which shares a land border with India and comply to all the provisions of the Order(s).
- 3) I certify that M/s _____ (**Name of company/Firm**) _____) **is not from such a country / is from such a country, has been registered with the Competent Authority (strike out whichever is not applicable).** I hereby certify that this BIDDER fulfills all requirements in this regard and is eligible to be considered [**Where applicable, evidence of valid registration with the Competent Authority is attached**].
- 4) I understand that the submission of incorrect data and / or if certificate/ declaration given by M/s _____ (**Name of company/Firm**) _____ is found to be false, this would be a ground for immediate termination and further legal action in accordance with law as per Clause 12 of the Public Procurement Order on Restrictions under Rule 144 (xi) of the General Financial Rules (GFRs), 2017.

Signature and name of the authorized signatory of the firm
with Rubber Stamp

Date:

Place:



UNDERTAKING FOR DEPLOYMENT OF TOOLS AND MACHINERY

(on company's letter head)

(To be submitted in Envelope-I)

Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int Airport
SH: Provision of Illuminated Outdoor Signage

Tender ID : 2026_AAI_282510_1

I / we will deploy sufficient plant and machinery as per the requirement of work in consultation with the Engineer-in-Charge(E-I-C) to achieve the milestones/targets and overall completion within the time period.

Signature of Contract:
(with rubber stamp)

Date:



Annexure -XIII

PROFORMA FOR EARNEST MONEY DECLARATION

(on company's letter head)

(To be submitted in Envelope-I)

Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int Airport

SH: Provision of Illuminated Outdoor Signage

Tender ID : 2026_AAI_282510_1

I / We (Name of Agency), _____ have submitted bid for the work of **Provision of Shed over Footpath along Approach Roads at Surat Int Airport**
SH: Provision of Illuminated Outdoor Signage

I/We, hereby submit following declaration in lieu of submitting Earnest Money Deposit

(1) If, after the opening of tender, I/We withdraw or modify my/our bid during the period of validity of tender (including extended validity of tender) specified in the tender documents,

OR

(2) If after the award of work, I/We fail to sign the contract, or to submit performance guarantee before the deadline defined in the tender documents,

I/We shall be suspended for one year and shall not be eligible to bid for AAI tender from date of issue of suspension order.

Signature of Contract(s):
(with rubber stamp)
Date:



Annexure -A

Illustrative Example (for project cost put to bid Rs 400 crore)

ANNE

Bid Price of Bidder (Rs crore)	Amount of Performance Bank Security (Rs crore)	% below the project cost put to bid	Percentage Additional Performance Security	Amount of Additional Performance Security (Rs crore)	Total Performance Bank Security (Rs crore)
	5%				
400	20.00	0.00%	0.00%	0.00	20.00
396	19.80	1.00%	0.00%	0.00	19.80
392	19.60	2.00%	0.00%	0.00	19.60
388	19.40	3.00%	0.00%	0.00	19.40
384	19.20	4.00%	0.00%	0.00	19.20
380	19.00	5.00%	0.00%	0.00	19.00
376	18.80	6.00%	0.00%	0.00	18.80
372	18.60	7.00%	0.00%	0.00	18.60
368	18.40	8.00%	0.00%	0.00	18.40
364	18.20	9.00%	0.00%	0.00	18.20
360	18.00	10.00%	0.00%	0.00	18.00
356	17.80	11.00%	0.25%	0.89	18.69
352	17.60	12.00%	0.50%	1.76	19.36
348	17.40	13.00%	0.75%	2.61	20.01
344	17.20	14.00%	1.00%	3.44	20.64
340	17.00	15.00%	1.25%	4.25	21.25
336	16.80	16.00%	1.50%	5.04	21.84
332	16.60	17.00%	1.75%	5.81	22.41
328	16.40	18.00%	2.00%	6.56	22.96
324	16.20	19.00%	2.25%	7.29	23.49
320	16.00	20.00%	2.50%	8.00	24.00
316	15.80	21.00%	3.00%	9.48	25.28
312	15.60	22.00%	3.50%	10.92	26.52
308	15.40	23.00%	4.00%	12.32	27.72
304	15.20	24.00%	4.50%	13.68	28.88
300	15.00	25.00%	5.00%	15.00	30.00
296	14.80	26.00%	5.75%	17.02	31.82
292	14.60	27.00%	6.50%	18.98	33.58
288	14.40	28.00%	7.25%	20.88	35.28
284	14.20	29.00%	8.00%	22.72	36.92
280	14.00	30.00%	8.75%	24.50	38.50
276	13.80	31.00%	9.75%	26.01	40.81



TENDER ACCEPTANCE LETTER

(To be given on Contractor's Letter Head in Envelope-I)

To,

Date:

AGM (Engg.- Electrical)-I
AIRPORTS AUTHORITY OF INDIA
Surat International Airport,
Surat- 394 550

Sub: Acceptance of Terms & Conditions of Tender

Tender ID : 2026_AAI_282510_1

**Name of Work: Provision of Shed over Footpath along Approach Roads at Surat Int
Airport SH: Provision of Illuminated Outdoor Signage**

Dear Sir,

1. I/ We have downloaded/ obtained the tender document(s) for the above mentioned 'Tender/ Work' from CPP Portal web site(s) namely: **<https://etenders.gov.in>** as per your advertisement, given in the above mentioned website(s).
2. I/ We hereby certify that I / we have inspected the site and read the entire terms and conditions of the tender documents, corrigendum(s) and reply to query if any made available to me/ us which shall form part of the contract agreement and I / we shall abide hereby by the terms / conditions / clauses contained therein.
3. I/ We hereby unconditionally accept the tender conditions of AAI's tender documents in its totality / entirety for above mentioned work.
4. I/We declare that I/We have not paid and will not pay any bribe to any officer of AAI for awarding this contract at any stage during its execution or at the time of payment of bills, and further if any officer of AAI asks for bribe/gratification, I will immediately report it to the Appropriate Authority in AAI'.
5. I/ We hereby submitted that I/ We paid/ submitted the required earnest money as per NIT conditions.
6. I/ We certify that all information/ documents furnished by our Firm is true & correct and in the event at any stage, the information/ documents is found to be incorrect/ untrue or found violated, then we shall be liable for debarment from tendering in AAI without giving any notice or reason therefore or summarily reject the bid or terminate the contract, without prejudice to any other rights or remedy including the forfeiture of the full said earnest money deposit absolutely.

Yours Faithfully,

(Signature of the Bidder, with Official Seal)



SPECIAL CONDITION OF CONTRACT (SCC)

1. GENERAL

Special conditions of contract shall be read in conjunction with General Conditions of Contract, Technical specification, Drawing and any other documents forming part of this contract wherever the context so requires.

Notwithstanding the sub-division of the document into these separate sections and volume every part of each shall be deemed to be supplementary, to and complementary to every other part and shall be read with into the CONTRACT so far as it may practicable to do so.

Wherever any portion of the General Condition of contract is repugnant to or at variance with any provisions of the special Conditions of Contract, unless a different intension appears, the provisions of the special conditions of contract shall be deemed to over-ride the provisions of the General conditions of contract and shall to the extent of such repugnancy or variations, prevail.

The electrical Installation work shall be carried out in accordance with Indian Standard Code of Practice as applicable. It shall also be in conformity with the current Indian Electricity rules and regulations and requirements of the Local Electricity Supply Authority and Fire Insurance regulations, so far as these become applicable to the installation.

The work in general shall be carried out as per following Specifications.

- a) IS / IE rule / IE Acts
- b) AAI General Specifications for Internal Electrical Works.
- c) CPWD General Specifications for Electrical Works, Part – I and part – II:
- d) 2007 Sub Station and Power Distribution System: 2019

All the codes and standards mean the latest publication. Wherever not specified, the installation shall generally follow the Indian Standard code of practice, in absence of which the relevant British Standard code of Practice shall be followed.

Wherever these specifications calls for a higher standard of material and Or workmanship than those required by any of the above mentions regulations and specification then the specification here under shall take precedence over the said regulations and standards.

The quantity of materials indicated in BOQ is tentative, the quantities of materials as actual as per site requirement shall be got approved by the contractor from the Engineer In-Charge before procurement.

The contractor has to submit Materials approval request with Technical Data sheets, samples (if required), Test certificates for approval by AAI before finalization of materials with the manufacturers/ suppliers etc.

Materials will be supplied by the contractor only after obtaining dispatch clearance from AAI. The electricity required for operating the working tools shall be provided by AAI on free of cost, if technically feasible.



2. ADMISSION TO SITE

The site of work is the rooftop of the Terminal Building at Surat International Airport. As the work is to be executed within the operational premises of the Airport, the contractor shall strictly comply with all applicable Airport Authority of India (AAI), Airport Operator, BCAS, CISF and other statutory safety, security and operational regulations. The contractor shall obtain all necessary permits, gate passes and work permissions, and shall coordinate with the Engineer-in-Charge for execution of the work without causing any disruption to airport operations.

3. PLANNING & COORDINATION

As the Surat Airport is busy & operational airport. Hence, the extra care shall be taken by the agency in execution of the work. The work shall be carried out systematically in coordination with Engineer-in-charge. Whenever the site is required during execution, the agency has to arrange the required men, material, tools etc. in advance to complete the work within given period without operational disturbance.

4. COMPLETENESS / SUFFICIENCY OF TENDER

- a) All sundry fittings, assemblies, accessories, hardware items, foundation bolts, termination lugs for electrical connections as required and all other sundry which are useful and necessary for proper assembly and efficient working of the various components of the work shall be deemed to have been included in the tender, whether such items are specifically mentioned in the tender documents or not.
- b) All incidental charges of any kind whatsoever including cartage, storage, cutting and wastage etc. shall be borne exclusively by the contractor and nothing extra shall be payable to him on this account. The rate for all items shall unless and until clearly specified otherwise include cost of all the components of labour, material and other input involved on the execution of the item. The contractor shall adjust his labour, staff, plant machinery etc. according to the requirement of work from time to time and no claim shall be entertained on account of idle labour, plant, machinery etc. due to any reason whatsoever.

5. BYE-LAWS

The contractor shall comply with all bye-laws and regulations of local and statutory authorities having jurisdiction over the works and shall be responsible for obtaining prior approval, if any, and payment of all fees and other charges, giving and receiving of all necessary notices and keeping AAI informed of the said compliance with the bye-laws, payments made, notices issued and received.

The Contractor shall indemnify AAI against all claims in respect of royalties, patent rights, design trademarks of name or other protected rights in respect of any plant, machine, work or materials used for or in connection with the work or temporary works and from and against all claims, demands proceedings, costs,



charges and expenses whatsoever in respect of or in relation thereto. The Contractor shall defend all actions arising from such claims and shall himself and every sort that may be legally incurred in respect thereof.

The Contractor shall comply with proper and legal orders and directions of local or public authority or municipality and abide by their rules and regulations and pay all fees and incidental charges which may be liable during the contract period.

6. SCOPE OF THE WORK:-

The item-wise Bill of Quantities (BOQ) is enclosed, based on which the work shall be executed.

This work has been taken up for the **Design, Fabrication, Supply, Installation, Testing and Commissioning of the illuminated Terminal Building Announcer Signage displaying "SURAT INTERNATIONAL AIRPORT" in Gujarati, Hindi and English along with AAI Logo on either side**, including dismantling and shifting of the existing "SURAT AIRPORT" signage, complete as specified.

The work shall be executed on the rooftop of the Terminal Building at Surat International Airport. The exact location of installation, site requirements and sequence of execution shall be communicated to the contractor by the Engineer-in-Charge or his authorized representative. The contractor shall execute the work within the stipulated time, ensuring minimum disruption to airport operations and complying with all applicable safety, security and operational requirements of the Airport.

For the detailed scope of work and technical requirements, the contractor shall refer to the "Scope of Work" section of the Technical Specifications.

7. SCHEDULE OF QUANTITIES (SOQ)

The bill of quantities shall be read in conjunction with general conditions of contract, special conditions of contract, technical specifications and any other document forming a part of this tender. The quantities shown against the various items are only approximate and subject to variations as made in general conditions of the contract. Only required items & quantities are to be supplied/ installed.

Contractor shall take detailed site measurements, before placing purchase order/taking procurement action. Contractor shall monitor the requirements of various items and shall keep informing Engineer- in- charge time to time with the progress of work.

8. CONTRACTOR'S REPRESENTATIVES, AGENTS AND WORKMEN/ WORK WOMEN

The contractor shall employ only Indian Nationals and verify their antecedents and loyalty before employing them on the work. He shall ensure that no person of doubtful antecedents and nationality is in any way associated with the work.



9. SAFETY CODES AND LABOUR REGULATIONS

In respect of all labour employed directly or indirectly on the work, the successful tenderer, here in after called the contractor, at his own expense will arrange for the safety provision to comply with the statutory regulations.

In case of default, the department shall be at liberty to make arrangements and provide facilities as aforesaid and recover the cost from the contractor.

The contractor shall provide necessary barriers, warning signals and other safety measures to avoid accidents. He shall also indemnify AAI against claims for compensation arising out of negligence in this respect.

Nothing in these specifications shall be construed to relieve the contractor of his responsibility for the design, manufacture and installation of the equipment with all accessories in accordance with applicable statutory regulations and safety codes in force from the safety angle.

10. MAN POWER

Agency is required to deploy competent man power suitable for execution of the work.

11. INSPECTION OF SITE

The site of work is located at Surat Airport, Surat. The site for the purpose of this contract/tender shall be the area demarcated as “Site” in contract drawing.

For the purpose of inspection of site and relevant documents, the contractor is required to contact the concerned SM/AGM (E-E) who shall give reasonable facilities for inspection of the same. The contractor shall be deemed to have satisfied himself as to the nature of the site of work. Local facilities of access, availability of materials and all other matters affecting his prices for the execution and completion of work. He is required to make himself fully acquainted with the nature and scope of work. Nothing extra shall be paid by AAI for any misunderstanding by bidder after tender quote.

12. WORKMANSHIP AND STANDARDS:

- i. The work shall be carried out as per the AAI specifications/OEM recommendations for the Electrical works (copies available with Engineer-in-charge), where AAI specification is not available CPWD specifications /NBC/Indian Electricity Rules as applicable shall be followed. The work shall be carried out as per the instructions of Engineer-in-charge following good engineering practices.
- ii. The original installations shall not be disturbed /modified unless instructed by EIC as per AAI requirement.
- iii. The timings of execution of work etc. shall be as decided by Engineer-in-charge from time to time depending upon operational & technical requirement.



- iv. The contractor shall carry out the work strictly as per the specification and schedule of work (quality and quantity), failing which AAI shall be empowered to carry out such works (after serving notices in this regard) through any other agency, the cost of the same shall be recovered from the contractor. The decision of Engineer-in-charge shall be final and binding on the contractor in this regard.

13. PRICES:

- i. The rate quoted for all items shall be in Indian Rupees only. Price shall be all inclusive of all applicable taxes & duty, work contract tax, octroi, labour, tools & plants, packing, freight / transportation & insurance, loading, unloading etc. but **excluding GST**.
- ii. Fee(s) payable (if required) for obtaining statutory license/approval etc from concerned department i.e. CEA approval etc. shall be included in the scope of the agency.
- iii. AAI shall not give any concessional forms/ certificates/ permits towards any taxes, duties & other levies like sales tax, road taxes/ permits, etc.
- iv. Price shall be firm throughout the contract period or any extended period of completion.

14. WATCH AND WARD:

The Contractor shall provide and maintain at his own expense all lights, guards, fencing and watching when and where necessary or required by the Engineer-in-Charge for the protection of the Works or for the safety and convenience of those employed on the Works.

15. PAYMENT TERMS

The payment will be released by AAI subject to the submission of the following Documents in the form of running bills duly approved by E-I-C in accordance with the progress of work in the following manner:-

(A) FOR SITC ITEMS

- i. 70% of the item rate on pro rata basis on supply at site, and approval by AAI.
- ii. 20% of the item rate on installation, Testing and approval by AAI.
- iii. 10% of the item rate on successful commissioning and handing over of the system.

(B) FOR SUPPLY ITEMS

- i. 80% of the item rate on pro rata basis on supply at site, and approval by AAI.
- ii. 20% of the item rate on commissioning of the system and handing over to AAI.

(C) FOR ITC ITEMS

- i. 85% of the item rate on pro rata basis on installation and testing at site and approval by AAI.
- ii. 15% of the item rate on commissioning of the system and handing over to AAI.

All above payments shall be made subject to deduction of Security Deposit, Income Tax, labour cess etc. as per contract and statutory requirements.

The security deposit will be released only after the successful completion of the



guarantee and defects liability period.

(D) General Terms

- i. The bill shall be submitted after completion of testing and submission of its acceptance reports to AAI.
- ii. The payment due to the contractor shall be made after submission of the bill by the contractor and the measurements shall be verified by the Engineer-in-Charge or his representative within 30 days of submission of the bill.
- iii. Contractor shall submit valid GST invoice and invoice of all purchased material from other agencies and related test certificates/documents to process the bill for payment.
- iv. 100% payment shall be made on submission and acceptance of reports.
- v. Security deposit shall be deducted as per General Conditions of contract in Indian Rupees.
- vi. Income Tax deductions shall be made from all payments made to the Contractor as per the rules and regulations in force in accordance with the Income Tax Act prevailing from time to time.
- vii. GST TDS shall be deducted from all payments made to the contractor as per the rules and regulations in force in accordance with the GST Act prevailing from time to time.
- viii. Labour cess as per rules and regulations in force shall be deducted from the bills of the contractors and deposited with designated authorities.

16.INSURANCE

The Contractor shall arrange, secure and maintain insurance as may be necessary and for all such amounts to protect his risks as detailed herein. The form and the limit of such insurance as defined herein shall be as acceptable to AAI.

However, irrespective of such acceptance, the responsibility to maintain adequate insurance coverage on comprehensive all risks basis at all times during the period of contract shall be of the Contractor. The Contractor's failure in this regard shall not relieve him of any of his contractual responsibilities and obligations. Any loss or damage to the construction equipment or materials during handling, transporting, storage and erection, till such time as the work is certified by AAI as having been completed in all respects & is taken over by AAI shall be to the account of the Contractor and his responsibility preferring all claims and make good for the damage or loss by way of repairs and/or replacement of the portion of the work damaged or lost. The completion of work shall not, in any, way relieve the Contractor of the above responsibilities during the period of the contract. The Contractor shall provide AAI with a copy of all insurance policies and documents taken by him in pursuance of this contract.



Such copies of documents shall be submitted to AAI immediately after such insurance coverage. The Contractor shall also inform AAI in writing at least twenty (20) days in advance regarding the expiry / cancellation and/ or change in any of such documents and insurance revalidation/ renewal, etc., well in time as may be necessary. The risks that are to be covered under the insurance shall include but not be limited to the loss or damage in transit, theft, pilferage, riot, civil commotion, weather conditions, accidents of all kinds, fire, etc. The scope of such insurance shall cover the entire value of the work from time to time. However, AAI, may from time to time during the contract, ask the Contractor in writing to limit the insurance coverage risks and in such a case the parties to the contract will agree for a mutual settlement for reduction in contract price to the extent of reduced premium account.

17. INSURANCE FOR STAFF

The Contractor shall also take insurance for all his staff working at site against injury, loss of life etc., and no claims of compensation to the staff /workers will be entertained by AAI in this regard. The Contractor shall indemnify AAI against all such claims.

18. PROGRAMME OF EXECUTION OF WORKS, PROGRESS REPORT AND PERFORMANCE:-

(i) PERFORMANCE:-

- a. The contractor shall perform all works in substantial and acceptable manner in accordance with the plans and specification and in accordance with such further explanatory drawings, details and instructions as may from time to time be given by the Engineer-in-Charge. The work must be done within such sections and such times as directed by the Engineer-in-Charge.
- b. The contractor shall provide and do everything necessary for the proper execution of the works according to the true intent and meaning of the drawing and specification taken together the same may or not be particularly shown on the provided that the same can be reasonably inferred there from. Figured dimensions to be followed in preference to scale dimensions and all particulars to be taken from the actual work.
- c. It must be clearly understood that the whole of the conditions are intended to be strictly enforced and that no extra charges in respect of extra work will be allowed unless they are clearly outside the spirit and meaning of the conditions or unless such works shall have been ordered in writing by the Engineer-in-Charge.

(ii) PROGRAMME FOR EXECUTION OF WORK:-

- a. Time is the essence of the contract and it shall be clearly understood that the tenderer has a definite program to carry out the work within the time limit set.



(iii) PROGRESS OF WORKS:-

- a. It shall be ensured that the works are carried out according to the agreed program and no changes are made except with the prior approval or at the instance of the Engineer-in-Charge.
- b. The progress of work will be reviewed periodically by the Engineer-in-Charge with the contractor and shortfalls, if any sorted out. The contractor shall there upon take such actions as may be necessary to bring back his work to schedule without additional cost to the department either by employing overtime operation, increasing the number of shifts, capacity of equipment or as otherwise directed by the Engineer-in-Charge.
- c. Should the work be suspended by reason of strike, lockouts or other cause, the contractor shall take all precautions necessary for the protection of the work at his own expenses & shall make good any damage arising from any of these causes.
- d. If on handing over site or at any time thereafter during the execution of the works the contractor considers that any drawing or information necessary for the execution of the work has not been provided, he has to inform the Engineer-in-charge in writing giving details.

19. TEST/SITE TESTS/ PERFORMANCE TESTS

Necessary site tests/ performance tests shall be conducted on the equipment to ascertain the functional / design/ site requirements. Reports shall be prepared recording the various values, parameters, observations, settings made etc. In case of unsatisfactory results, the same shall be replaced/ rectified as per the requirement.

Equipment for measurement of work and testing the installation shall be procured by the Contractor for their use at their own cost.

As per the requirement material can be tested by independent test agency in order to prove its soundness. Expenses in this regard will be borne by the contractor and nothing extra will be paid.

20. WATER AND ELECTRIC SUPPLY

AAI will provide supply of water and Electric power to the Contractor for execution of work free of cost.

21. CLEAN UP OF WORKS AT SITE

During erection, the contractor shall at all times keep the working and storage free from waste or rubbish. On completion of erection, he shall remove all temporary structures, debris and leave the premises clean to the full satisfaction of the Engineer-in-charge.

22. HANDING OVER/ CERTIFIED DATE OF COMPLETION

Upon the satisfactory commissioning of the entire system, the work shall be handed over officially and completion date recorded by Engineer-in- charge with all the prescribed formalities for handing over.



This date shall be reckoned, as the certified date of completion and the defects liability period shall commence from this date.

Until the handing over of the installation, the responsibility lies with the contractor for safety, upkeep etc.

23. MANUFACTURE'S INSTRUCTIONS

Where manufacturers have furnished specific instructions, relating to the materials used in this job, covering points not specifically mentioned in these documents these instructions shall be followed in all cases.

24. REJECTION OF DEFECTIVE PLANT / EQUIPMENT:-

If the complete work / equipment or any portion thereof, before it is taken over, be found defective or fails to fulfil the intent of the specifications, the contractor shall, on receipt of a written notice from the Engineer-in-charge forthwith make good the defective works/equipment.

Should the contractor fail to rectify the defects and or make good the defective work/equipment within stipulated time, mentioned in the written notice, or replace the plant at no extra cost, the Authority may make good, reject and/or replace at the risk and expense of the contractor the whole or any portion of the work/equipment which is defective or fails to fulfil the requirements of the contract.

The Authority shall have the right to operate all equipment, in any operating condition, whether or not such Equipments have been accepted as complete and

satisfactory. Repairs and alterations shall be made at such time and as directed by the Engineer-in-charge.

25. TECHNICAL MANUAL / DOCUMENTATION

- a) All manuals and documents shall be in English Language and in such a way that a qualified engineer/technician is able to fully understand and carry out the
- b) preventive as well as breakdown maintenance with the help of these manuals. Documentation containing full technical details should be provided along with printed Technical manuals of all equipment from OEMs.
- c) After Award of Work the contractor shall submit the following drawing for approval by the department:
 - i. General arrangement or location drawing of the equipment complete with dimensions and clearances.
 - ii. Any other drawing or data that may be necessary for the job.
 - iii. Approval of drawings shall not absolve the contractor of any of his obligations to meet the requirements of specifications under this contract.

26. GUARANTEE AND DEFECTS LIABILITY PERIOD

- a. The **Defects Liability Period (DLP) shall be 01 year**. The security deposit shall be released only after the completion of DLP which shall be reckoned from the date of completion as recorded under the completion certificate issued.
- b. The LED modules and electronic drivers/controllers shall be covered by a minimum **5-year manufacturer's warranty**. A valid warranty certificate issued



- by the Original Equipment Manufacturer (OEM) shall be submitted by the contractor to the Engineer-in-Charge at the time of commissioning and handing over of the work
- c. Any defects noticed during the guarantee period shall be rectified / replaced in part or in full by the firm free of cost without charging anything extra to AAI. The contractor shall guarantee that all the material, machinery and components supplied, fabricated, designed and installed by him shall be free from defects due to faulty design material and/or workmanship
 - d. The security deposit of the contractor shall be refunded after completion of successful DLP.

27. SECURITY DEPOSIT

Security deposit shall be deducted @10% from the running bills and will be released only after expiry of defect liability period.

28. MEASUREMENT

The measurement shall be made as per BOQ, Specifications & conditions for items.

29. DAMAGE TO PERSON AND PROPERTY

The contractor shall indemnify and keep indemnified AAI against all losses and claims injuries or damage to any person or any property whatsoever, which may arise out of or in consequence of the construction and maintenance of works by them and against all claims, demands and proceedings of or in relation thereof.

30. SECURITY PASS :

- a) Work is to be carried out in restricted area of the airport, necessary entry & security passes shall be obtained by the contractor for himself & his authorized representative, workers, supervisors, vehicle, tools & plants etc. from the
- b) concerned authority. The AAI shall make no extra payment in this regard. The Contractor shall apply in writing in advance for issue of necessary entry passes to workmen engaged by him.
- c) The submission of applications for Temporary Photo Identification Cards (PICs) in advance along with Certificate of Police Verification etc. as per the prevailing practice and regulations of BCAS/ AAI will be the responsibility of contractor. Any financial expenditure involved such as fees for PICs, Photos, fees for Police Verification if anything will be borne by the contractor. The PICs has to be re-validated in advance to ensure that the employees are always in possession of their valid entry passes. No employee will be permitted in the terminal buildings and operational areas without valid PICs/Entry Passes. Employees without valid



PICs will be considered as equivalent to absence of staff and necessary recovery will be made from the bills of the contractor for this period.

- d) The contractor and his employees shall abide by security regulations framed by AAI and BCAS and the Police Authorities. Any worker of the contractor, whose presence is found undesirable due to security reasons, shall not be allowed to work in airport.
- e) The contractor shall be fully responsible for all activities of his working staff.

31. COMPLIANCE OF THE PROVISIONS OF STATUTORY REQUIREMENTS:

The contractor shall comply with all necessary rules & regulations of central/ local state government related to the contract and the contractor shall be responsible to maintain all requisite documents for reference to statutory authorities and AAI as & when asked for any expenditure in compliance with the statutory requirements related to the contract shall be borne by the contractor.

32. MATERIALS & MAKES

The materials required for this work should conform to relevant IS specifications. The copies of purchase vouchers & Gate passes should be produced along with the materials. The materials and equipment's supplied by the contractor shall be as per the list of preferred makes mentioned in the tender documents. However, Any other items or makes which are not covered under the list of preferred makes, may also be accepted/approved subject to meeting the tender specifications & requirement of the site for which prior approval of makes of materials shall be taken from AAI while execution of work but before placing the order for purchase of material. All materials and equipment supplied under this contract shall be brand new and free from manufacturing defects & suitable in every respect for reliable operation

33. STORAGE OF MATERIALS

The contractor shall provide proper and adequate storage facilities to protect all the materials and equipment against damage from any cause whatsoever. The watch & ward of the stores, equipment & materials shall be the responsibility of the contractor till the completion, commissioning & handing over to AAI. The contractor shall take away the balance of any materials left at the site after commissioning of the system. The cost, if already paid, for such items shall be deducted from the subsequent running bills. AAI shall not be liable to pay for any of the incidental charges connected with the above.

34. SAMPLES

The Contractor shall provide applicable samples of the materials as required for this work sufficiently in advance free of cost to obtain approval of AAI. Approved samples shall be retained by AAI until the completion of the work and all materials and workmanship incorporated in the work are to conform to the approved samples



in all respects. Rejected materials shall be removed from the site immediately under the supervision of AAI

35. FACTORY INSPECTION

- All major items (Category I items) listed in the list of approved makes shall be factory inspected. The decision to inspect/ waive shall rest with the AAI.
- While the above list is indicative, AAI can add/ delete/ modify the same in the interest of organization/ work from time to time considering cost, quantity, significance, completion schedules etc.
- At least 15 days advance notice to be given for factory inspection by AAI official(s). • While the inspection call is given, the actual status and details of tests offered shall be communicated. Relevant Indian Standards shall be made available. A copy of factory test conducted on equipment offered for inspection shall also be submitted.
- Routine tests/ Acceptance tests shall be carried out in the presence of the inspecting officer from AAI. Type test certificates shall be produced for similar equipment. Inspection shall be done at OEM's factory.
- If any equipment/ material fails in the tests conducted during factory inspection, necessary rework/ replacement shall be done and equipment shall be re offered for inspection.
- Further, the traveling, boarding & lodging expenses of inspecting officer for reinspection, as per AAI rules, shall be recovered from the contractor's bills.
- The factory inspection of equipments shall be offered in one lot only.

36. JOB REQUIREMENT:

The contractor shall ensure that the work under the contract are carried out as per Schedule of Quantities / specifications to ensure the quality throughout the contract period as per the site requirement and defects has to be attended on top most priority within minimum possible time as per the instructions of AAI.

37. CONTRACT AGREEMENT

The contract agreement shall be executed on a non-judicial stamp paper of value Rs. 300/- and cost of the stamp paper shall be borne by the contractor.

38. PLANTS AND TOOLS:

The tenderer shall work out the requirement of plants & tools required for execution and timely completion of works as per schedule and shall deploy the required nos of plant & tools and manpower accordingly. The details of such plant & tools shall be submitted. Tenderer shall closely monitor the progress and if required additional loads, plants, and if required additional tools, plants and labour (both skilled & unskilled) shall be deployed to complete the work in time.



The machines owned or hired by the contractor should have a serial number with contractor's identity.

39. HANDING OVER / TAKING OVER OF THE SITE UNDER THE CONTRACT:

The contractor shall visit all the site under the contract in reference to the scope of work before taking over of the site after award of work and he shall be responsible to handover the site back to AAI/ authorized contractor by AAI in working condition at the time of closing of the contract.

40. ISSUE OF INSTRUCTIONS:

Engineer-in-charge or his authorized representative of AAI shall be competent to issue the instructions to the contractor/ site in charge for the performance of work contract.

41. SITE PRECAUTIONS

- a) Strict precaution must be exercised by the Contractor to avoid interference with operational area; the contractor shall abide by all rules and regulation laid down in this regard by AAI.
- b) Any materials or T&P etc. found lying outside the sites approved by Engineer-in-Charge shall be got removed at once by the Engineer-in-Charge at the risk and cost of the contractor.
- c) The contractor shall provide red flag barricades, caution boards at site designated by the Engineer-in-Charge. One supervisor have to present at site all the time during work testing with walki-talki for coordination.
- d) Every transport vehicle shall carry a permit issued by the AAI and shall be produced on demand by him or his authorized agent. All vehicles entering the Airport shall follow the routes prescribed by the AAI for entering the areas and shall display red flags yellow light on top. No vehicle shall be allowed in operational area period during the day when visibility is 800 metre or less.
- e) The contractor shall take all precautions to avoid all accidents by exhibiting necessary day & night caution boards, speed limit boards, red flags, red lights and providing barriers reflective Jackets to staff. He shall be responsible for all damages and accidents caused due to negligence on his part.
- f) Contractor has to obtained Airport driving permit for their drivers and any expenditure on this account shall be on his part.
- g) No labour huts shall be permitted to be constructed inside the operational area.
- h) Contractor shall be responsible for the police and antecedent verification of the labour employed by him in the operational area of hotel and shall indemnify the department of any security problems arising thereof.
- i) Operational requirements may also not allow availability of the site on certain days due to unavoidable reasons when it will not be possible to execute any work



at all on those days. Nothing extra shall be paid towards the idle labour establishment and machinery etc. on this account.

42. The contractor has to comply all the rules and regulations of contract labour (Regulation & Abolition) Act. 1970. The agency / contractor shall execute and submit notarized affidavit on non – judicial stamp paper of Rs. 100/- regarding compliance of minimum wages as per the performa at **page no. 161.**

43. — Benefits to Micro & Small Enterprises(MSEs):-

I. — Exemption from paying tender processing fees & Earnest Money Deposit.

~~Micro and small Enterprises (MSEs) registered with district industries centers or khadi and village industries commission or khadi village industries board or coir board or. National Small Industries Corporation or Directorate of handicraft and handloom or any other body specified by the ministry of micro small and medium enterprises as MSMED act. 2006 for goods produced and services rendered shall be issued tender documents free of cost and shall be exempted from paying earnest money deposit (EMD)~~

II. — Price Preference.

~~Further in tender participating MSEs quoting price within the price band of L1+L5 percent. Shall also be allowed to supply a portion of requirement by bringing down their prices to L1 price in a situation where L1 price is from someone other than a micro and small enterprise and such micro and small enterprises shall be allowed to supply at least 20 percent of total tendered value in case of more than one such MSEs the supply will be shared proportionately (to tendered quantity) further out of 20%, 4% (20% of 20%) shall be from MSEs owned by SC/ST entrepreneurs. This quota is to be transferred to other MSEs in case of non-availability of MSEs owned by SC/ST enterprises~~

~~“In case of tender item is non-split able or non-dividable etc. MSE quoting price within price band L1+15% may be awarded for full/complete supply of total tendered value to MSE, considering spirit of policy for enhancing the Govt. procurement from MSE.”~~

Note:-

- ~~1. This benefit as above to MSEs shall be available only for goods/services produced and provided by MSEs for which they are registered.~~
- ~~2. MSEs seeking exemption and benefits should enclose an attested/self-certified copy of valid Registration certificate giving details of such validity stores/services etc., failing which they run risk of their bid being passed over as ineligible for the benefits applicable to MSEs.~~



Amendment to the public Procurement Policy for Micro & Small Enterprises (MSEs) Order, 2012

2

THE GAZETTE OF INDIA : EXTRAORDINARY

MINISTRY OF MICRO, SMALL AND MEDIUM ENTERPRISES

ORDER

New Delhi, the 9th November, 2018

S.O. 5670(E).—In exercise of powers conferred by section 11 of the Micro, Small and Medium Enterprises Development Act, 2006 (27 of 2006), the Central Government hereby makes the following amendments to the Public Procurement Policy for the Micro and Small Enterprises (MSEs) Order, 2012, namely :—

1. (i) This Order may be called the Public Procurement Policy for Micro and Small Enterprises (MSEs) Amendment Order, 2018.
- (ii) This shall come into force on the date of its publication in the Official Gazette.
2. Throughout the Public Procurement Policy for Micro and Small Enterprises (MSEs) Order, 2012 (hereinafter referred to as the said Order), for the figures and word “20 per cent”, wherever it appears, the figures and word “25 per cent” shall be substituted.
3. After paragraph 4 of the said Order, the following paragraph shall be inserted, namely :—
“4A. Special provision for Micro and Small Enterprise owned by women. Out of the total number of Micro and Small Enterprises owned by women, not less than 5 per cent shall be reserved for the Micro and Small Enterprises owned by women.”



TECHNICAL SPECIFICATIONS

1. GENERAL:

Internally illuminated **LED type** Terminal Building Announcer Signage displaying **"SURAT INTERNATIONAL AIRPORT"** in **Gujarati, Hindi and English** along with the **AAI Logo on either side** shall be designed, fabricated, supplied, installed, tested and commissioned as per the approved drawings, technical specifications and site requirements.

The signage shall be aesthetically designed to complement the architectural appearance of the Airport Terminal Building and shall be suitable for continuous outdoor operation under prevailing environmental conditions. The technical specifications provided herein are intended to define the minimum performance and quality requirements. Alternative standard specifications of manufacturers may be accepted only if they fully comply with or exceed the specified technical, structural, functional and performance requirements stipulated in the tender document.

2. SCOPE OF WORK:

The scope of work shall comprise the **Design, Fabrication, Supply, Installation, Testing and Commissioning (DFSITC)** of the **Terminal Building Announcer Signage displaying "SURAT INTERNATIONAL AIRPORT" in Gujarati, Hindi and English along with AAI Logo on either side**, complete in all respects as specified in the Schedule of Quantities, drawings, technical specifications and site requirements. The scope of work shall include, but not be limited to, the following:

- a) **Design, fabrication, supply, installation and testing** of the illuminated trilingual Terminal Building Announcer Signage, including individual letters, AAI logos, acrylic faces, aluminium back channels, LED illumination system, drivers/controllers, bird spikes, mounting spacers, support structures and all associated accessories required for satisfactory completion of the work.
- b) Design, fabrication and installation of additional support structure, wherever required, by utilizing the **existing mounting structure to the maximum extent possible after necessary reconditioning**, ensuring adequate structural strength and stability for mounting the complete trilingual signage and AAI logos. The complete structure, including the existing reconditioned structure and newly provided support members, shall be designed to safely withstand the prevailing wind conditions at Surat Airport.
- c) For all details related to the trilingual text, font style, font proportions, AAI logo design, dimensions, layout arrangement, colour scheme and other graphical requirements, the contractor shall refer to Annexure-1. In case of any discrepancy, the



details provided in Annexure-1 and the directions of the Engineer-in-Charge shall prevail.

- d) Provision of all necessary **tools, tackles, lifting equipment, hydra, cranes, scaffolding, safety equipment, consumables, fasteners, anchor bolts, electrical cabling, connectors and other accessories** required for safe execution of the work at 20 m (approx.) installation height.
- e) **Electrical Works:** Refer Para8 of this technical specification.
- f) Rectification of defects and maintenance of the installed signage during the **Defect Liability Period (DLP)** as specified in the contract.

3. LOCATION AND MOUNTING OF SIGNAGE:

The **trilingual** Terminal Building Announcer Signage displaying "**SURAT INTERNATIONAL AIRPORT**" along with the **AAI Logo on either side** shall be installed on the **roof/top of the Airport Terminal Building** at the locations indicated in the drawings and/or as directed by the Engineer-in-Charge.

The signage shall be rigidly mounted on the existing roof-mounted support structure, utilizing the existing structure to the maximum extent possible after necessary reconditioning. Any additional support members, mounting brackets, spacers or structural elements required for safe and satisfactory installation shall be designed, fabricated and installed by the contractor as required to ensure structural stability and compliance with the wind load requirements.

The installation sequence of the signage, when viewed from the front, shall be as follows from **left to right**:

- i) **AAI Logo (Left Side)**
- ii) **"SURAT INTERNATIONAL AIRPORT" in Gujarati Language**
- iii) **"SURAT INTERNATIONAL AIRPORT" in Hindi Language**
- iv) **"SURAT INTERNATIONAL AIRPORT" in English Language**
- v) **AAI Logo (Right Side)**

The arrangement, spacing, alignment and overall appearance of the signage shall be uniform, aesthetically pleasing and subject to approval of the Engineer-in-Charge before fabrication and installation.

A representative sample photograph of a similar trilingual Terminal Building Announcer Signage is provided below for reference only. The photograph is intended to indicate the general arrangement, positioning and visual appearance of the signage comprising the AAI Logos and the text in Gujarati, Hindi and English. However, the contractor shall



prepare the detailed design, dimensions, spacing, structural supports and installation details based on the approved drawings, site conditions and technical specifications. Any discrepancy between the reference photograph and the approved drawings/technical specifications shall be governed by the latter.



Figure 1: Sample Photo for Reference Only (after completion of work)



Figure 2: Existing Terminal Building Announcer Signage (Front side)



Figure 3: Existing Terminal Building Announcer Signage (Back side)



Figure 4: Existing Terminal Building Announcer Signage (Back side)



Figure 5: Existing Terminal Building Announcer Signage (Back side)



Figure 60: Existing Terminal Building Announcer Signage (Back side)



4. SUBMISSION OF DRAWINGS AND TECHNICAL SUBMITTALS

Based on the BOQ, drawings and technical specifications, the Contractor shall submit detailed technical submittals, shop drawings and structural drawings for the complete Terminal Building Announcer Signage displaying "SURAT INTERNATIONAL AIRPORT" in Gujarati, Hindi and English along with AAI Logo on either side, for approval of Engineer In-charge, AAI before procurement and commencement of fabrication and installation work.

The submission shall, as a minimum, include the following:

- a) Detailed GA (General Arrangement) drawings showing overall dimensions, spacing, alignment and installation sequence of the trilingual signage and AAI logos.
- b) Detailed fabrication drawings of letters, logos, acrylic faces, aluminium back channels, mounting spacers, support structures and all associated components.
- c) Technical data sheets, catalogues and specifications of acrylic sheets, aluminium channels, LED modules, drivers/controllers, bird spikes and other major components proposed for use.
- d) Electrical drawings indicating power supply requirements, wiring details, driver/controller arrangement and load calculations.

The Contractor shall furnish all clarifications, calculations, samples and additional information as may be required by AAI for review and approval of the proposed design and materials.

Fabrication and installation work shall be undertaken only after obtaining written approval of the technical submittals and drawings from AAI.

Approval of drawings, designs, calculations and technical submittals by AAI shall not relieve the Contractor of his responsibility for the correctness, adequacy, safety, performance, durability and compliance of the completed signage with the requirements of the Contract.

5. CONSTRUCTION, ILLUMINATION AND ELECTRICAL REQUIREMENTS OF SIGNAGE:

- (i) The Terminal Building Announcer Signage shall consist of individually fabricated three-dimensional (3D) illuminated letters forming the text "SURAT INTERNATIONAL AIRPORT" in Gujarati, Hindi and English along with **AAI Logo on either side**. The overall dimensions, letter sizes, logo sizes and spacing shall be as approved by the Engineer-in-Charge.



- (ii) **Letter Face:** The front face of all letters and AAI logos shall be manufactured from **5 mm thick white translucent 040 acrylic sheet**, accurately cut and finished to the required shape and dimensions. The acrylic face shall be UV resistant and suitable for outdoor applications.
- (iii) **Back Channel:** The letters and logos shall be fabricated using **100 mm deep aluminium back channels** of suitable thickness and size for housing the acrylic face, LED modules, wiring and drivers/controllers. The aluminium channels shall be free from sharp edges, corrosion and manufacturing defects and shall provide adequate rigidity to the complete signage.
- (iv) **Structural Support and Mounting:** The complete signage assembly shall be mounted on the existing roof-mounted support structure, utilizing the existing structure to the maximum extent possible after necessary reconditioning. Additional mounting brackets, spacers, supports and structural members, wherever required, shall be designed, fabricated and installed by the contractor. The complete mounting arrangement shall be designed to safely withstand the prevailing wind conditions at Surat Airport.
- (v) **Illumination:** All letters and logos shall be internally illuminated using high-efficiency **Power LED modules of minimum 1.5 W per module** along with suitable electronic drivers/controllers. The LED modules shall be arranged uniformly within the letters and logos to ensure bright and uniform illumination across the entire acrylic face without visible dark spots, bright spots, shadowing or hot spots.
- (vi) **LED Drivers/Controllers:** Suitable electronic drivers/controllers shall be provided for operation of the LED modules. The drivers/controllers shall be designed for operation on **220–240 V, 50 Hz AC supply** and shall incorporate adequate protection against overload, short circuit, voltage fluctuations and overheating.
- (vii) **Technical Submittals:** The contractor shall submit technical catalogues, data sheets and specifications of the proposed acrylic sheets, LED modules, drivers/controllers and other major components for approval of the Engineer-in-Charge before procurement and installation.
- (viii) **Weather Protection:** The signage shall be designed and fabricated to prevent ingress of water, dust, insects and moisture. All joints, openings and cable entry points shall be properly sealed. The completed signage shall be free from light leakage and suitable for continuous outdoor operation under all prevailing weather conditions at site.
- (ix) **Electrical Wiring and Connections:** The contractor shall provide all internal wiring, interconnections, terminations, connectors, cables, conduits, glands, cable supports and associated accessories required for complete and satisfactory operation of the signage. All wiring shall be neatly routed and adequately protected against mechanical damage and environmental exposure.
- (x) **Earthing:** The complete illuminated signage system, including all metallic parts, support structures and associated equipment, shall be properly earthed in accordance with relevant Indian Standards and statutory requirements.
- (xi) **Bird Protection:** UV-stabilized, transparent polycarbonate bird spikes of **75 mm height** shall be installed above the entire trilingual signage arrangement, including the AAI logos, to prevent bird perching and nesting.



- (xii) **Testing and Commissioning:** The completed signage shall be tested for structural stability, illumination uniformity, electrical safety, proper functioning of LED modules and drivers/controllers, and overall satisfactory performance before commissioning.
- (xiii) **Workmanship:** All fabrication, assembly and installation work shall be carried out in a professional manner. The completed signage shall be structurally sound, aesthetically pleasing, properly aligned and free from dents, distortions, scratches, sharp edges, visible defects and poor workmanship.

6. MAKES, MATERIALS AND SAMPLES

Prior to commencement of fabrication work, the Contractor shall submit samples of all major materials and components proposed to be used in the work for approval of the Engineer-In-Charge. The samples shall be representative of the actual materials intended for installation and shall be submitted at the location designated by the Engineer-in-Charge.

The Contractor shall also submit a sample section/mock-up of the proposed illuminated channel letter construction, along with details of fabrication, illumination arrangement, acrylic face, aluminium back channel, mounting arrangement and finish for review and approval.

The following materials/components shall be submitted for approval, as applicable:

- a) 5 mm thick white translucent 040 acrylic sheet.
- b) Aluminium back channel and associated mounting accessories.
- c) LED modules and electronic drivers/controllers.
- d) Fasteners, sealants and other major accessories proposed for use.

The makes of materials shall be of reputed manufacturers and shall conform to the specifications and approved technical submittals. The following makes are preferred:

- a) **Acrylic Sheet:** Astari / Marca / equivalent approved make.
- b) **LED Modules & Drivers:** Philips / Osram / Samsung / Cree / Nichia / equivalent approved make.
- c) **Aluminium Sections/ Channels:** Hindalco / Jindal / Nalco / equivalent approved make.

Approval of samples and makes by the Engineer-in-Charge shall not absolve the Contractor from its contractual obligation to comply with the specifications, quality requirements, and performance of the completed signage.



7. WORKMANSHIP

All fabrication and installation work shall be carried out by experienced and skilled personnel having adequate expertise in the manufacture and installation of illuminated channel letter signages. The materials, methods of fabrication, assembly, mounting, fastening, wiring, illumination arrangements and erection shall conform to the approved drawings, technical specifications, approved technical submittals and accepted engineering practices.

All newly supplied materials and components shall be new, free from defects and suitable for the intended outdoor application. The existing mounting structure, wherever proposed to be reused, shall be thoroughly inspected, repaired and reconditioned as necessary to ensure its structural adequacy and suitability for the proposed signage installation. The completed signage, including letters, logos, mounting arrangements and support structures, shall possess adequate mechanical strength and durability to safely withstand all operational and environmental loads, including the specified wind load requirements.

All components shall be accurately fabricated, properly aligned and securely assembled. The finished signage shall be aesthetically pleasing and free from dents, distortions, scratches, sharp edges, corrosion, loose components, light leakage, visible defects and poor workmanship.

All electrical installations shall be neat, safe and carried out in accordance with good engineering practices and high-quality workmanship standards, with proper routing and protection of cables, secure terminations and effective earthing. The completed installation shall be thoroughly cleaned and tested before commissioning and handing over to AAI.

8. ELECTRICAL GENERAL REQUIREMENTS

- a) A suitable capacity power supply intake point shall be made available by AAI at or near the signage installation location. The contractor shall be responsible for extending the power supply from the designated point up to the signage, including supply and installation of all cables, conduits, connectors, glands, termination accessories and associated materials required for satisfactory operation of the signage.

NOTE: The connected load of the complete signage system shall be intimated by the contractor to AAI

- b) The contractor shall supply, install, test and commission all electrical equipment, materials, LED modules, drivers/controllers, wiring, earthing conductors and other accessories necessary for the complete and satisfactory operation of the illuminated signage system. The cost of the same shall be deemed to be included in the quoted cost.
- c) All electrical works shall be carried out in accordance with relevant Indian Standards, statutory regulations, approved drawings and good engineering practices. All wiring shall be properly supported, protected and neatly routed to ensure safety, reliability and ease of maintenance.



- d) The contractor shall carry out all cutting, drilling, anchoring, fixing, sealing, dressing and making good of surfaces as required for installation of the signage and associated electrical works. Any damage caused during execution of the work shall be restored to its original condition at no extra cost to AAI.
- e) All metallic parts of the signage, support structures and associated electrical equipment shall be effectively earthed in accordance with applicable standards and statutory requirements.
- f) Upon completion of installation, the contractor shall conduct all necessary tests to verify proper operation, illumination performance, electrical safety and earthing continuity before commissioning and handing over the system to AAI.

9. *STRUCTURAL SUPPORTS AND ASSOCIATED CIVIL WORKS*

- a) The contractor shall inspect the existing roof-mounted signage support structure and utilize the same to the maximum extent possible after necessary reconditioning, repair, strengthening, rust treatment and protective finishing, as required.
- b) The contractor shall design, fabricate and install any additional support structures, mounting brackets, spacers, clamps, anchor arrangements and associated accessories required for safe and satisfactory installation of the complete trilingual Terminal Building Announcer Signage and AAI logos.
- c) The complete support system, including the reconditioned existing structure and newly provided structural members, shall be designed to safely withstand all dead loads, wind loads and other applicable loads. The complete mounting arrangement shall be designed to safely withstand the prevailing wind conditions at Surat Airport.
- d) All structural steel components, if used, shall be adequately protected against corrosion through suitable surface preparation, primer and finishing coat system. Aluminium members and other metallic components shall be suitable for outdoor service conditions.
- e) The contractor shall carry out all drilling, anchoring, fixing, grouting, sealing, waterproofing, strengthening and making-good works required for installation of the signage. Any damage caused to the existing structure, roof, waterproofing system or building finishes during execution of the work shall be rectified by the contractor at no additional cost to AAI.
- f) Detailed structural drawings and design calculations for the complete support arrangement shall be submitted to the Engineer-in-Charge for approval before commencement of fabrication and installation work.

10. *DISMANTLING, LOWERING, TRANSPORTATION AND SAFE STACKING OF EXISTING SIGNAGE*

The existing illuminated fascia signage displaying "SURAT AIRPORT" in Gujarati, Hindi, and English, including the existing AAI logos, mounting brackets, electrical connections, wiring, and accessories installed on the rooftop support structure of the existing Terminal Building at an approximate height of 20 m, shall be dismantled, lowered, and shifted to the AAI Store. The work shall include the provision of all



necessary tools and tackles, Hydra/crane, scaffolding, lifting equipment, manpower, safety arrangements, and consumables required for the safe execution of the work.

The dismantled signage components shall be carefully lowered without causing damage to the existing support structure, building, surrounding installations or the dismantled materials. The dismantled materials shall be transported and stacked at the designated AAI store/location within the Airport premises as directed by the Engineer-in-Charge.

The item shall include disconnecting electrical connections, removal of all associated fixtures and accessories, loading, unloading, transportation, handling and safe stacking complete in all respects as specified and as directed by the Engineer-in-Charge.



Standard Operating Procedure
for
Online payment, refund and settlement of EMD and Tender Fee through CPP Portal

e-Tendering brings in economy, efficiency and transparency in the procurement of goods, works and services. CVC are inclined to force implementation of e-Tendering in all Govt. departments & PSUs. Online payment gateway for payment, refund and settlement of EMD and Tender Fee is part of the implementation of e-Tendering system i.e. CPPP <https://etenders.gov.in>.

Stakeholders:

1. **Tender Floating Department:** Airports Authority of India (AAI)
2. **The Technical Service Providers (TSP)** - NIC to facilitate CPP Portal with entire back end process and providing technical support to the Government Dept.
3. **Bank** - AAI has authorized State Bank of India as nodal bank provides payment gateway services and receives Tender fees and Earnest Money Deposits (EMDs) from various bidders participating in e- Tendering/ e-procurement process, holds the amount in Current/Savings Bank account till the time of finalization of tendering process. Bank will settle the Tender Fee of all bidders, Bank will refund EMD to unsuccessful bidders and the EMD of L 1 bidder will remain in the pooling account and after AOC completion on the portal, the L 1 bidders EMD amount will be refunded to their source account. This will be happened as per instruction received from TIA through online portal. Customized MIS will be provided to the Tender Floating Department i.e. AAI.
4. **The Bidders** - The bidders are organizations/corporate/individuals who apply for the tender floated by the tender floating department and participate in the tendering process.
Bidders are directly involved in making the use of this e-System for making payments and getting refunds into their accounts.

Eligibility (Prerequisite for e-Tendering)

1. Tender Inviting Authorities (TIA) & the bidders should enroll on CPP Portal <https://etenders.gov.in> to carry out the procurement activities.
2. Portal login will be through two factor authentication i.e. User id & password followed by the login through DSC.
 - TIA must have Digital Signature Certificate (DSC) with Signing and Encipherment feature
 - Bidders must have DSC with Signing feature

Bank Account Details

- a. Common Pooling A/C for EMD and Tender Fee Collection
- b. Tender Fee Settlement A/c for Settlement of Non-refundable Tender Fee amounts
- c. Forfeited EMD Settlement A/c for Settlement of forfeited EMD amounts

Payment gateway for End to End Procedures:

1. **Collection Process:**
 - a. **Online collection of EMD and Tender Fee:** As per current provision in the portal, TIA will allow the option of **Online Mode** for collection of EMD and Tender Fee while publishing



tender, so that the bidders can deposit these fees through **Net Banking** (SBI and Other Banks) and **NEFT/RTGS**.

- b. **Collection of EMD through Bank Guarantee(BG):** During the tender creation TIA will allow the option of “**EMD through BG or EMD Exemption**” so that bidders will be able to upload the copy of BG or Exemption certificate as per tender terms and condition.

***Note:** Keeping in the view of running tender status, the portal currently has both online and offline payment options for next few days, after which the offline mode will be disabled.*

2. During the collection process the amount will be debited from the bidder account and credited to the collection pooling account of the AAI.
3. Till the tender opening all the collected amount will be residing in the collection pooling account of AAI.
4. **Refund and Settlement process:**
 - a. **Step-I:** After opening the tender, bid submitted successfully along with the online payment, the tender fee settled to 'Tender Fee Settlement Account' and EMD amount will remain in 'Pooling Account'.
 - b. **Step-II: On Technical Evaluation:** After submission of technical evaluation report on the CPP portal, the 'EMD of Technically Qualified bidders will remain in the pooling account' and EMD amount of rejected bidders will be refunded to their source account.
 - c. **Step-III: On Financial Evaluation:** After submission of financial evaluation report on the CPP portal, the 'EMD of L1 bidder will remain in the pooling account' and EMD amount of rejected bidders will be refunded to their source account.
 - d. **Step-IV: EMD Refund of L1:** After AOC completion on the portal, the L1 bidders EMD amount will be refunded to their source account and for this Bid managers are advised to complete the AOC process:
 - Only after receiving the PBG and its confirmation from the bank.
 - or**
 - Adjustment of Security Deposit (SD) as per NIT Condition.
5. **In the case of "Cancellation of tender" before opening and "Re-Tender":**
 - All the submitted amount will be refunded to the bidders.
6. **In the case of "Cancellation of tender" after opening and "Re-Tender":**
 - The tender fee has already settled to the AAI's tender fee settlement account at the EoD of tender opening.
 - Now only EMD residing in the collection pooling account, the EMD will be refunded to the bidders.
7. **In case of 'Withdraw of bid' by the vendor:**
 - Procurement system allows the bidder to withdraw till the bid submission closing date, assume that the bidder has paid the amount and withdrawn the bid, eProcurement system will initiate the refund of EMD on the day of tender opening.



LIST OF PREFERRED MAKES FOR ELECTRICAL ITEMS

Note: The following list of preferred makes is exhaustive. However, additional manufacturers or brands may be considered for any specified product or item, depending on market availability, delivery timelines and proven satisfactory performance in similar projects or works—preferably where such a make or product has been used in quantities constituting at least eighty percent (80%) of the estimated or proposed requirement for the relevant project or work. To establish performance, completion certificates, performance certificates and purchase orders accompanied by tax invoices will be considered, provided that the products comply with the technical specifications stipulated in the tender document.

ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2026)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
A. PANEL, SWITCHGEARS AND RELATED ITEMS			
1	LT PANELS (TTA)	MAK / SHIV SHAKTI ENGINEERS / TECHNOCRAFTS / TENCO / KONTACT / ABB / RISHA / MARINE ELECTRICALS / POWERTECH SWITCHGEARS / ULTIMA / RITTAL / URJAYANT / EXCEL CONTROL SYSTEMS / BALAJI ELECTRO CONTROLS PVT LTD / KRUTI / CMKI (CORE METAL) / KEPLI (KHOKHAR) / LEGRAND (NOVATEUR) / CONQUERENT / MITSUBISHI / LS POWER / ZENIYA / NEPTUNE / LAURITZ KNUDSEN / C&S / BCH / ADVANCE / TRICOLITE / SCHNEIDER / SUDHIR / EAP / TRISQUARE / MILESTONE / ADLEC / UNILEC / CONSOL (RR ISPAT) / PEATON / HAROLD / SPC ELECTROTECH / SIEMENS	CATEGORY-1
2	LT PANELS / FEEDER PILLAR (PTTA) / BUS TRUNKING	EXPERT ENGINEERS / MAK / APPLICATION CONTROL PANEL / AMBIT / ADLEC / SHIV SHAKTI ENGINEERS / TECHNOCRAFTS / EXCEL CONTROL SYSTEMS / GLOBAL / SUPERTech CONTROL SYSTEMS / SWITCHGEARS & FABRICATORS / KONTACT / MARINE ELECTRICALS / R.P. CONTROLS / GOURAV EnerGen / TENCO / POWERTECH SWITCHGEARS / HAROLD / BALAJI ELECTRO CONTROLS PVT LTD / URJAYANT / KRUTI / ASE / ITE-GURGAON (INDIAN TRANSFORMERS) / LEGRAND (NOVATEUR) / CONQUERENT / CORONET / RST ELECTRICALS PVT LTD / HPL / C&S / LS POWER / ZENIYA / PRECISION / ABB / EAP / TRICOLITE / SUDHIR / SCHNEIDER / LAURITZ KNUDSEN / NEPTUNE / HENSEL / ADVANCE / KEPLI (KHOKHAR) / PEATON / RISHA / TRISQUARE / CMKI (CORE METAL) / SPC ELECTROTECH / BCH / MILESTONE / YOGIJI DIGI (P) LTD / ELINS / EVA / UNILEC / HAROLD / ENGINEERS & ENGINEERS / SIEMENS / ULTIMA / NITYA	CATEGORY-1
3	AIR CIRCUIT BREAKERS	LS ELECTRIC / BCH / MITSUBISHI / HPL / LAURITZ KNUDSEN / LEGRAND (NOVATEUR) / ABB / C&S / HAVELLS / SCHNEIDER / SIEMENS	CATEGORY-2
4	MOULDED CASE CIRCUIT BREAKERS (MCCB)	LS ELECTRIC / BCH / MITSUBISHI / LAURITZ KNUDSEN / LEGRAND (NOVATEUR) / ABB / C&S / HAVELLS / INDO ASIAN (NOVATEUR) / HPL / SCHNEIDER / SIEMENS	CATEGORY-2
5	CHANGE OVER SWITCH/ FUSE DISCONNECTOR SWITCH/ SWITCH FUSE UNITS	BENITEC / BCH / INDO ASIAN (NOVATEUR) / SOCOMEC / LAURITZ KNUDSEN / C&S / LEGRAND (NOVATEUR) / HPL / ABB / HAVELLS / SIEMENS / SCHNEIDER	CATEGORY-2
6	METERS / MULTIFUNCTION METERS -ANALOGUE/DIGITAL	ELMEASURE / KRYKARD / SELEC / C&S / ABB / BENITEC / SELEC / C&S / MITSUBISHI / ABB / NEPTUNE / SOCOMEC / HPL / LAURITZ KNUDSEN / FINDER / SIEMENS / SCHNEIDER / CONSERVE / SECURE	CATEGORY-3
7	SELECTOR SWITCH, PUSH BUTTON SWITCH / EMERGENCY SWITCH	ABB / TRINITY TOUCH / LAURITZ KNUDSEN / C&S / BCH / EATON / TEKNIC / SIEMENS / SCHNEIDER	CATEGORY-3
8	CT's / PT's	GLOBAL / KRUTI / WAGO / CG POWER / SELEC / NEWTEK / ANANT POWER (ADVANCE) / KAPPA	CATEGORY-3
9	PROTECTIVE RELAYS (ALL TYPE)	P2 POWER / WAGO / SELEC / HAVELLS / MITSUBISHI / LAURITZ KNUDSEN / CG POWER / C&S / ABB / SIEMENS	CATEGORY-2
10	CONTACTORS	MITSUBISHI / HPL / LAURITZ KNUDSEN / C&S / BCH / HAVELLS / ABB / TDK / SIEMENS / LEGRAND (NOVATEUR) / SCHNEIDER	CATEGORY-3
11	TIMERS / TIME SWITCH- ANALOGUE/DIGITAL	HAVELLS / LAURITZ KNUDSEN / SELEC / BCH / ABB / LEGRAND (NOVATEUR) / EATON / FINDER / SIEMENS / SCHNEIDER / C&S	CATEGORY-3
12	LED INDICATION LAMPS	EATON / OLIVE / ABB / LAURITZ KNUDSEN / C&S / BCH / VINAY LED / VAISHNOV / SCHNEIDER	CATEGORY-3

(Signature)
SM(EE)
MIS 9570

(Signature)

(Signature)

1 of 10



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
B. SUBSTATION RELATED ITEMS			
13	TRANSFORMER UP TO 500 KVA (DRY/OIL)	POWERWARE / ITE, GURGAON / ESENNAR / PVJ POWER / TRANSCON / AMES IMPEX / POWER STAR / JAY BEE / RTS / CG POWER / SUDHIR / VOLTAMP / BHARAT BIJLEE / KOTSONS/ SCHNEIDER / KIRLOSKAR	CATEGORY-1
14	TRANSFORMER MORE THAN 500 KVA (DRY/OIL)	POWERWARE / ITE, GURGAON / ESENNAR / PVJ POWER / TRANSCON / AMES IMPEX / POWER STAR / JAY BEE / RTS / CG POWER / SUDHIR / VOLTAMP / KOTSONS/ SCHNEIDER / BHARAT BIJLEE / KIRLOSKAR / SIEMENS	CATEGORY-1
15	H T PANEL	APPLICATION CONTROL PANEL / SHIV SHAKTI ENGINEERS / ITE, GURGAON / TECHNOCRAFTS / TENCO / MARINE ELECTRICALS / PASCAL / KEPL(KHOKHAR) / CONQUERENT / RISHA / CORONET / L.S POWER / ZENIYA / EAP / CG POWER (CFPISL) / TRICOLITE / SUDHIR / LAURITZ KNUDSEN / ABB / TRISQUARE / SCHNEIDER / MILESTONE / EATON / ANANT POWER (ADVANCE) / ADLEC / SIEMENS	CATEGORY-1
16	BUS DUCT-SANDWICH	RISHA / ADVANCE / RR KABEL / LAURITZ KNUDSEN / C&S / LEGRAND (NOVATEUR) / EAE / SCHNEIDER	CATEGORY-2
17	H.T /L.T.TERMINATION & JOINTING KIT.	DENSONS / CABSEAL® (HARI CONSOLIDATED) / COMPAQ / RAYCHEM	CATEGORY-3
18	POWER CABLES ABOVE 1.1 KV	V-MARC / SBEE / SUYOG ELECTRICALS LTD / DICABS / APAR / GEMSCAB / HPL / RR KABEL / SPECIAL CABLES / JMW KABEL / PARAMOUNT / TIRUPATI / KEC / POLYCAB / DYNAMIC / HAVELLS / KEI / UNISTAR / GLOSTER / RAVIN CABLES / NICCO	CATEGORY-1
19	POWER CABLES UP TO AND INCLUDING 1.1 KV	ALLCAB / AURAFLEX / V-MARC / VISHAL / SBEE / POLYCORE / VIN POWER / TORTEK / SUYOG ELECTRICALS LTD / GEMSCAB / RR KABEL / PLAZA / SPECIAL CABLES / KEI / JMW KABEL / POLYCAB / AVOCAB (CHANDRESH) / DYNAMIC / PARAMOUNT / SVARN / RALLISON (LKB) / BCH / TIRUPATI / KEC / GRANDLAY / HPL / GLOSTER / BONTON / HAVELLS / UNISTAR / APAR / RAVIN CABLES / NICCO	CATEGORY-1
20	CONTROL CABLES	GEMSCAB / ALLCAB / AURAFLEX / V-MARC / SBEE / POLYCORE / TORTEK / NICCO / SUYOG ELECTRICALS LTD / RR KABEL / PLAZA / SPECIAL CABLES / JMW KABEL / AVOCAB (CHANDRESH) / PARAMOUNT / SVARN / RALLISON (LKB) / BCH / BONTON / TIRUPATI / KEI / KEC / GRANDLAY/ UNISTAR / NATCAB (KUALITY) / HPL / POLYCAB / DYNAMIC / ALOKE (ANKUR) / HAVELLS / GLOSTER / FINECAB / APAR / BATRA HENLAY/ RAVIN CABLES	CATEGORY-1
21	TELEPHONE CABLE	POLY INFOCOM CABLES PVT LTD / ORBIT / DUCAB / RR KABEL / PLAZA / JMW KABEL / PARAMOUNT / ALOKE (ANKUR) / RALLISON (LKB) / BONTON / TIRUPAT / HAVELLS / KEI / KEC / KVVS (INDUSTIRAL) / HPL / POLYCAB / NICCO	CATEGORY-2
22	CO- AXIAL/ INSTRUMENTATION/ FIBRE OPTIC/ CAT-6 / CAT-6A CABLES	AURAFLEX / SBEE / TORTEK / SUYOG ELECTRICALS LTD / ORBIT / POLYCORE / POLY INFOCOM CABLES PVT LTD / BATRA HENLAY / GEMSCAB / RR KABEL / PLAZA / SPECIAL CABLES / JMW KABEL / POLYCAB / PARAMOUNT / LEGRAND(NOVATEUR) / SVARN / RALLISON (LKB) / BONTON / HAVELLS / KEI / ROSENBERGER / KEC / GRANDLAY / GLOSTER / SCHNEIDER / APAR	CATEGORY-2
23	GI / SS CABLE MANAGEMENT SYSTEM (CABLE TRAY-PRE-FABRICATED/ PERFORATED/ LADDER TYPE / WIRE MESH TYPE, ETC.)	GLOBAL / OBO BETTERMANN / MM ENTERPRISES / GLOBE / BEC / RMCON (RMG) / EXCEL CONTROL SYSTEMS / ADVANCE- ANANT / RMSCO (RAJASTHAN METAL) / SUMIP / CTM / L.S POWER / LEGRAND (NOVATEUR) / INDIANA / MM ENGG / SLOTCO / MEM	CATEGORY-3
24	UNDER FLOOR RACEWAYS & ITS ACCESSORIES	OBO BETTERMANN / BEC / ADVANCE- ANANT / SPC ELECTROTECH / CTM / MM ENTERPRISES	CATEGORY-3
25	CAPACITORS	SELEC / NEPTUNE / LAURITZ KNUDSEN / P2 POWER / LEGRAND (NOVATEUR) / HAVELLS / TDK INDIA / SCHNEIDER	CATEGORY-2

Amilgale
SUCCE)

h

Day



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
26	APFC PANEL/ ACTIVE & PASSIVE (HYBRID) PANEL	MAK / APPLICATION CONTROL PANEL / SHIV SHAKTI ENGINEERS / TENCO / RISHA / INPHASE POWER TECHNOLOGIES PVT LTD / GLOBAL / R.P. CONTROLS / ULTIMA / SUPERTech CONTROL SYSTEMS / SWITCHGEARS & FABRICATORS (SGF) / POWERTECH SWITCHGEARS / HAROLD / AB POWER / URJAYANT / SELEC / EAP / CG POWER / P2 POWER / KEPL (KHOKHAR) / ITE-GURGON (INDIAN TRANSFORMERS) / CONQUERENT / BCH / ANANT POWER (ADVANCE) / RISHA / HAVELLS / CORONET / SPC ELECTROTECH / PEATON / L.S POWER / MILESTONE / LAURITZ KNUDSEN / LEGRAND (NOVATEUR) / C&S / NEPTUNE / SCHNEIDER / NEPTUNE / P2 POWER / SELEC / ANANT POWER (ADVANCE) / SCHNEIDER / SPC ELECTROTECH / ADLEC / RST ELECTRICALS PVT LTD / TDK INDIA / TRICOLITE / AMBIT	CATEGORY-1
27	LIGHTENING PROTECTION SYSTEM (LPS) COMPLYING IUPATED IFC / NRC	JEF / OBO BETTERMANN / GROUND ECA3G / NEXPO POWER SOLUTIONS / CAPE / JMV / ABB / DEHN / PHEONIX / TERCEL	CATEGORY-3
28	EARTHING SYSTEM (CHEMICAL)	JEF / OBO BETTERMANN / GROUND ECA3G / TERCEL / BEC / DEHN / ABB / JMV / NEXPO POWER SOLUTIONS / RMSCO (RAJASTHAN METAL) / CAPE / JK CHEMRODE / PROTEC-DHRUVA (DHRUVA) / APS	CATEGORY-3
29	SURGE PROTECTION DEVICES	OBO BETTERMANN / DSS / GROUND ECA3G / TERCEL / WAGO / HAVELLS / ABB / CAPE / LAURITZ KNUDSEN / LEGRAND (NOVATEUR) / DEHN / MERSEN / JMV / PHOENIX CONTACT / PROTEC ALLIED / SECOM / CITEL	CATEGORY-3
30	SCADA (HARDWARE & SOFTWARE, EXCEPT COMPUTER & ACCESSORIES)	LAURITZ KNUDSEN / WAGO / PHOENIX CONTACT / HONEYWELL / SCHNEIDER / SIEMENS	CATEGORY-2
31	SF6 CIRCUIT BREAKER/ VACUUM CIRCUIT BREAKER	EATON / VOLTAMP / LAURITZ KNUDSEN / PASCAL / EATON / CG POWER / ABB / SCHNEIDER / SIEMENS	CATEGORY-2
32	SERVO / AUTOMATIC VOLTAGE STABILIZER	POWERWARE / KRYKARD / FUJI ELECTRIC / PVJ POWER / SELEC / ITE-GURGON (INDIAN TRANSFORMERS) / P2 POWER	CATEGORY-2
33	AUTO TRANSFER SWITCH (ATS)	EATON / HPL / LAURITZ KNUDSEN / LEGRAND (NOVATEUR) / SOCOMEC / HAVELLS / ASCO (SCHNEIDER)	CATEGORY-2
34	COMPACT SUB STATION	PVJ POWER / CORONET / ITE-GURGON (INDIAN TRANSFORMERS) / CONQUERENT / SUDHIR POWER / PEATON / L.S POWER / VOLTAMP / LAURITZ KNUDSEN / ABB / SCHNEIDER	CATEGORY-1
35	EMERGENCY LIGHT - LED (PORTABLE)	LIFE-GUARD / PROLITE	CATEGORY-3
36	CABLES GLANDS	HENSEL / POLYCAB / TRINITY TOUCH / ROXTEC / BRACO / MCI / (METAL/ CRAFT)	CATEGORY-3
37	LUGS & THIMBLES	WAGO / POLYCAB / TRINITY TOUCH	CATEGORY-4
38	SYNTHETIC / PVC INSULATING MATS	CPRI certified for required voltage level	CATEGORY-2
39	INSULATION TAPE (HT / LT)	MODI's / BENLO / ANCHOR	CATEGORY-4
C	DG SETS & RELATED ITEMS		
40	DIESEL ENGINE ABOVE 250 KVA	GREAVES COTTON / BAUDOUIN (SHANDONG) / MAHINDRA POWEROL / PERKINS / CUMMINS / KOEL / CATERPILLAR	CATEGORY-1
41	DIESEL ENGINE UPTO AND INCLUDING 250 KVA	GREAVES COTTON / BAUDOUIN (SHANDONG) / TMTL (TAFE MOTORS) / CUMMINS / MAHINDRA POWEROL / ASHOK LEYLAND / KOEL / CATERPILLAR	CATEGORY-1

(Signature)
SUREK
MIS45D

(Signature)

(Signature)



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
42	ALTERNATOR	TDPS (TD POWER SYSTEM) / KIRLOSKAR / CATERPILLAR / GREAVES COTTON	CATEGORY-1
43	BATTERIES-LED ACID/LI-ION	CLN / EXIDE / AMARON	CATEGORY-3
44	BATTERY CHARGER	SELEC / VERTIV / DELTA	CATEGORY-2
45	UPS - ABOVE 10 KVA	DELTA / ORION / FUJI ELECTRIC / KRYKARD / 3EM / PROSTARM / UNILINE / TMEIC / POWER ONE / RIELLO / ABB / SOCOMEC / EATON / SCHNEIDER / NUMERIC-LEGRAND/ VERTIV (EMERSON)	CATEGORY-3
46	UPS - UPTO 10 KVA	DELTA / ORION / FUJI ELECTRIC / KRYKARD / PROSTARM / RIELLO / UNILINE / ABB / POWER-ONE / DELTA / SOCOMEC / EATON / SCHNEIDER / NUMERIC-LEGRAND / VERTIV (EMERSON)	CATEGORY-3
D INTERNAL WIRING RELATED TEAMS			
47	MCB / ISOLATOR / MCBDB / RCCB / RCBO / ELCB	ANCHOR (PANASONIC) / ORIENT ELECTRIC / LAURITZ KNUDSEN / MITSUBISHI / LEGRAND (NOVATEUR) / C&S / HPL / ABB / POLYCAB / HAVELLS / SCHNEIDER / INDO ASIAN (NOVATEUR) / GM / MK HONEYWELL / BCH / EATON	CATEGORY-2
48	MS CONDUIT (ISI MARKED)	VPL / BEC / AKG / STEEL KRAFTS / TRINITY TOUCH / RMCON (RMG STEELS) / SUPER / JPC PIPES	CATEGORY-3
49	PVC CONDUIT (ISI MARKED)	VPL / FUSION / ASTRAL / SKYDA / BEC / NORPACK / MODI's / ANCHOR (PANASONIC) / POLYCAB / TRINITY TOUCH / AKG / GM / JPC PIPES	CATEGORY-3
50	INDUSTRIAL SOCKET IN SHEET STEEL ENCLOSURE WITH MCB/SWITCH	AJMER ELECTROTECH LLP / LAURITZ KNUDSEN / POLYCAB / NEPTUNE-BALS / LEGRAND (NOVATEUR) / C&S / BCH / HAVELLS / HPL / SCHNEIDER	CATEGORY-4
51	INSULATED COPPER WIRE	RAJNIGANDHA / GEMSCAB / ALLCAB / AURAFLEX / V-MARC / SBEE / UNISTAR / POLYCORE / TORTEK / BATRA HENLAY / RR KABEL / AKG / ANCHOR (PANASONIC) / BENTEC / JMW KABEL / POLYCAB / AVOCAB (CHANDRESH) / SVARN / PARAMOUNT / RALLISON (LKB) / HAVELLS / NATCAB (KUALITY) / BUNTON / GRANDLAY / GLOSTER / BCH / PLAZA / APAR / GM / PARAGON (ELEKTRON) / FINECAB / ZENIUM	CATEGORY-2
52	SWITCHES/ SOCKETS/ TELEPHONE/ TV/ DATA SOCKET/ BOXES (MODULAR TYPE)	RR KABEL / ANCHOR (PANASONIC) / ORIENT ELECTRIC / INDO ASIAN (NOVATEUR) / C&S / POLYCAB / HPL / LAURITZ KNUDSEN / LEGRAND (NOVATEUR) / HAVELLS / GM / MK HONEYWELL / WESTERN VEGA / ABB	CATEGORY-3
53	SWITCHES/ SOCKETS/ TELEPHONE/ TV/ DATA SOCKET/ BOXES (PIANO TYPE)	ANCHOR (PANASONIC) / BENTEC / HAVELLS / HPL / POLYCAB / MK HONEYWELL / WESTERN VEGA	CATEGORY-3
E FIRE ALARM EQUIPMENTS			
54	FIRE / SMOKE DETECTOR/ MIJ TI CRITERIA DETECTOR/ FIRE ALARM PANEL / REPEATER PANEL/ HOOTER / MANUAL CALL POINT / RESPONSE INDICATOR/ FAULT ISOLATOR	NOTOFIRE / VELOX / SCHNEIDER / PANASONIC / EATON / HOCHIKI / RAVEL / SIEMENS / BOSCH / APOLLO / EDWARDS (UTC) / G + M / SCHRACK / HONEYWELL / KIDDE (UTC) / GST (UTC) / TYCO / ASES	CATEGORY-2

Amal Kumar
SM (EE)

W. S.

Deep



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
55	FIRE SURVIVAL CABLE	GEMSCAB / SBEE / FRTEK / BATRA HENLAY / RR KABEL / SEPCIAL CABLES / SVARN / JMW KABEL / POLYCAB / ALOKE (ANKUR) / RALLISON (LKB) / KEC / GRANDLAY / RAVEL / GLOSTER / KEI / BONTON / BOSCH / WREXHAM / FUSION POLYMER	CATEGORY-2
56	FIRE SIGNAGES	ASES / LIFEGUARD (UNITED FIRE) / EATON / FIRE SHIELD / BOSCH / RAVEL / DELITE / AUTOGLO (PROLITE)	CATEGORY-3
57	ASPIRATION SYSTEM	SHOOTFIRE (VIMAL FIRE) / HOCHIKI / BOSCH / RAVEL	CATEGORY-2
F LED LIGHT FIXTURE AND FANS			
58	LIGHT FIXTURE WITH LED INDOOR	PYROTECH / GOLDWYN LED / KI KALINGIA / GM / NESSA / PLUS LIGHT TECH / LEGERO / MAGIK / LIGHTBOOK / LEKSA LIGHTING / R R KABEL (RR/ AARAYSTORM) / PANASONIC / EVEREADY / INSTAPOW / POLYCAB / SURYA / HALONIX / HAVELLS / SIGNIFY / JAQUAR (JAQUAR LIGHTING) / HPL / BAJAJ / WIPRO / ORIENT / CROMPTON / REGENT	CATEGORY-2
59	LIGHT FIXTURE WITH LED - OUTDOOR/FACADE	PYROTECH / GOLDWYN LED / KI KALINGIA / GM / NESSA / PLUS LIGHT TECH / MAGIK / LIGHTBOOK / LEKSA LIGHTING / R R KABEL (RR/ AARAYSTORM) / PANASONIC / HPL / BENTEC (BENLO) / EVEREADY/ POLYCAB / K-LITE / SURYA / TRANSRAIL / HALONIX / HAVELLS / JAQUAR (JAQUAR LIGHTING) / SIGNIFY / INSTAPOW / BAJAJ / WIPRO / ORIENT / CROMPTON / REGENT	CATEGORY-2
60	LINEAR LED/ CUSTOMISED/ DECORATIVE LED LIGHT FIXTURE	PYROTECH / GOLDWYN LED / KI KALINGIA / GM / LIGHT FORMS / PLUS LIGHT TECH / LEGERO / MAGIK / WMEL / FORUS / HUBLIT / LIGHTBOOK / PANASONIC / POLYCAB / R R KABEL (RR/ AARAYSTORM) / EVEREADY / SURYA / HALONIX / HAVELLS / HPL / SIGNIFY / BAJAJ / WIPRO / ORIENT / CROMPTON / REGENT	CATEGORY-2
61	AVIATION WARNING /OBSTRUCTION LIGHT	PYROTECH / FORUS / KI KALINGIA / HARYANA GENERAL INDUSTRIES / VSTP / K-LITE / SURYA / TRANSRAIL / HPL / INSTAPOW / BAJAJ / WIPRO / CROMPTON /	CATEGORY-3
62	CEILING/ WALL / EXHAUST / PEDESTAL FAN (CONVENTIONAL / BLDC)	ORIENT ELECTRIC / RR KABEL / ANCHOR (PANASONIC) / POLYCAB / HALONIX / HAVELLS / ALMONARD / USHA / KHAITAN	CATEGORY-3
63	HVLS FANS	MARUT AIR / RR KABEL / RITE HITE	CATEGORY-3
G AIRCONDITIONING AND FIRE FIGHTING ACCESSORIES			
64	G I / M S PIPE (ISI MARKED)	VPL / ITL / BEC / APL APOLLO / PRAKASH SURYA / JINDAL STAR / TATA / SAIL / HIRA PIPES (RR ISPAT) /	CATEGORY-2
65	MANUAL VALVE - BUTTERFLY/ SLUICE / CHECK / NRV / FOOT/GATE / GLOBE	LEHRY / SANT / VENUS / NEWAGE FIRE / CASTLE / ZOLOTO / VTM (VA VALVES) / EMERALD / ADVANCE VALVES / DIVINE / C&R	CATEGORY-2
66	MOTORISED VALVE - BALANCING / MODULATING / PICB / DELTA T / CONTROL / MIXING	SANT / VTM (VA VALVES) / CASTLE / DANFOSS / ZOLOTO / ANERGY	CATEGORY-2
67	SUCTION / POT / Y- STRAINER	VENUS / CASTLE / ZOLOTO / ANERGY / SANT / VTM (VA VALVES) / EMERALD	CATEGORY-2
68	FLEXIBLE CONNECTION FOR SPRINKLER / SPRINKLER	LIFEGUARD (UNITED FIRE) / FIRE SHIELD / NEWAGE / EXFLAME / HD / SAFEFIRE	CATEGORY-2
69	FIRE HYDRANT LANDING VALVES/ INSTALLATION VALVE/ FIRE BRIGADE CONNECTION.	SHOOTFIRE (VIMAL) / LIFEGUARD (UNITED FIRE) / ZOLOTO / KALPEX (KALPATARU) / NEWAGE / EXFLAME / SAFEFIRE / HD / FIRE SHIELD	CATEGORY-2

Amilgale
(SMCEE)

hite

Ry



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
70	FIRE HOSE PIPES/ FIRST AID HOSE REEL/ BRANCH PIPE / NOZZLE / COUPLINGS	SHOOTFIRE (VIMAL) / LIFEGUARD (UNITED FIRE) / KALPEX (KALPATARU) / NEWAGE / FIRE SHIELD / EXFLAME / SAFEFIRE	CATEGORY-2
71	FIRE EXTINGUISHERS	DSS / KANEX / SHOOTFIRE (VIMAL) / LIFEGUARD (UNITED FIRE) / CEASEFIRE / SAFEFIRE / AFS (ADVANCED) / KALPEX (KALPATARU) / EXFLAME / SUPREMEX / FIRE SHIELD / MINIMAX / SAFEX	CATEGORY-2
72	GAS BASED FIRE SUPPRESSION SYSTEM	SYNERGY & SYNERGY PLUS / FIRECEASE / FIRETREX / VIVINA / ASES / CEASEFIRE / SHOOTFIRE (VIMAL) / LIFEGUARD (UNITED FIRE) / KALPEX(KALPATARU) / FOAMTECH / SUPREMEX / SIEMENS / FIRETREX (SVS)	CATEGORY-2
73	KITCHENHOOD GAS BASED SUPPRESSION SYSTEM	SYNERGY / FIRECEASE / FIRETREX / VIVINA / SHOOTFIRE (VIMAL) / UNITED / FOAMTECH / CEASEFIRE / KALPATARU /	CATEGORY-2
74	HIGH/LOW PRESSURE WATER MIST BASED FIRE SUPPRESSION SYSTEM	SYNEAQUAMIST / FIRETREX / SHOOTFIRE	CATEGORY-2
75	FLOW SWITCH/PRESSURE SWITCH	OMICRON / ANERGY / DANFOSS / EMERALD / SWIZER	CATEGORY-3
76	FIREMAN AXE	LIFEGUARD (UNITED FIRE) / NEWAGE / FIRE SHIELD / ADVANCE	CATEGORY-3
77	DIESEL ENGINE DRIVEN PUMP FOR FIRE FIGHTING	TMTL (TAFE MOTORS) / KSB / WILO / GRUNDFOS / KIRLOSKAR / ASHOK LEYLAND / CATERPILLAR / MAHINDRA POWEROL	CATEGORY-2
78	PUMPS -VERTICAL/ HORIZONTAL / SUBMERSIBLE	HAVELLS / WILO / GRUNDFOS / ANDRITZ / KSB / KIRLOSKAR / XYLEM / AQUA_ANS / MATHER & PLATT / CROMPTON	CATEGORY-2
79	MOTORS	LHP / ROTOMOTIVE / KSB / HAVELLS / TMEIC / GRUNDFOS / BCH / KIRLOSKAR / BHARAT BIJLEE / ALSTOM / SEIMENS / CROMPTON	CATEGORY-2
80	MOTOR STARTER	BENTEC / KSB / HAVELLS / L.S POWER / GRUNDFOS / PHOENIX / C&S / BCH / SCHNEIDER / EATON / MOTOVARIO / SIEMENS / SCHNEIDER	CATEGORY-2
81	SINGLE PHASE PREVENTER / OVER LOAD PROTECTION/HIGH VOLTAGE/LOW VOLTAGE/EARTH FAULT PROTECTION	C&S / LAURITZ KNUDSEN / SELEC / SIEMENS	CATEGORY-3
82	G I SHEETS	JSW STEEL / TATA / HSL / SAIL	CATEGORY-2
83	GRILLS /DIFFUSERS	PRECISE / ASAWA INSULATION / MAPRO (AIR FLOW) / CRYSTAL / TRISTAR	CATEGORY-3
84	INSULATION MATERIAL - ROCK WOOL/ GLASS WOOL	ENSAVE / ROCK INSUL / AEROLAM / SUNROCK (THERMOCARE ROCK WOOL) / INSUFLEX (THE SUPREME) / LIONROCK / POLYBOND / EPACK / TWIGA INSUL	CATEGORY-3
85	INSULATION MATERIAL - XLPE/EPDM/ NITRILE RUBBER	AEROFOAM / PARAMOUNT / SAFARI / AEROLAM / INSUFLEX (THE SUPREME) / EPACK / SUNROCK (THERMOCARE ROCK WOOL) / INSUFLEX (THE SUPREME) / LIONROCK / POLYBOND / TWIGA INSUL	CATEGORY-3

Signature
SM(BE)

Signature

Signature



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
86	PRE-INSULATED DUCT	ASAWA INSULATION / MECHEASY	CATEGORY-3
87	PRE-FABRICATED GI DUCT	ASAWA INSULATION / WAD / DUCTOFAB / WAVES / ZECO / ADVANCE VENTILATION	CATEGORY-3
88	FIRE DAMPERS	MAPRO (AIR FLOW) / GREENHECK / TRISTAR / RUSKIN / CARRIER	CATEGORY-2
89	AIR CURTAINS	EURONICS / MITZVAH / TECHNOCRATS / DOLPHY	CATEGORY-2
90	MODULATING MOTOR/FIRE DAMPER MOTOR	LHP / ANERGY / HONEYWELL / GRUNDFOS / BALEMO / SIEMENS	CATEGORY-2
91	AIR FILTERS (MERV/ESP/HEPA) FOR HVAC SYSTEM	MECHMAARK / ADITYA / O2 CURE / WAVES / HUMIDIN / INTELLIGREEN	CATEGORY-3
92	THERMOSTATS / HUMIDISTS	OMICRON / ANERGY / FINDER / DANFOSS / HONEYWELL	CATEGORY-3
93	THERMOMETERS/ PRESSURE GAUGE	OMICRON / ANERGY / EMERALD / FIEBIG	CATEGORY-3
94	INTEGRATED BUILDING MANAGEMENT SYSTEM (IBMS)/BMS/ SCADA SYSTEM (HARDWARE* & SOFTWARE, EXCEPT COMPUTER & ACCESSORIES)	SCHNEIDER / ENLITE / PANASONIC / WAGO / PHOENIX / SIEMENS / AZBIL / LAURITZ KNUDSEN / TRIDIYM (* includes all hardware of BMS)	CATEGORY-3
95	FIELD DEVICES (FOR IBMS/BMS/SCADA)	SELEC / OMICRON	CATEGORY-3
96	VFD DRIVE	YASKAWA / SELEC / FUJI / TMEIC / LAURITZ KNUDSEN / DANFOSS / SCHNEIDER / SIEMENS	CATEGORY-3
H	AC PLANTS, AC UNITS & EQUIPMENTS		
97	AIR-CONDITIONER UNITS - SPLIT / WINDOW / CASSETTE/ TOWER	HAVELLS / HITACHI (JOHNSON) / LG / BLUE STAR / DAIKIN/ VOLTAS / SAMSUNG / HAIER / O GENERAL / PANASONIC / CARRIER	CATEGORY-2
98	PRECISION AIR CONDITIONING (PAC)	CLIMAVENTA / SWEGON BLUE BOX / SIDWAL	CATEGORY-3
99	PACKAGED AIRCONDITIONER	DAIKIN / HITACHI (JOHNSON) / VOLTAS / LG / SIDWAL / CARRIER / DAIKIN / BLUE STAR	CATEGORY-2
100	CHILLERS	KIRLOSKAR / DAIKIN / CARRIER / VOLTAS / BLUE STAR / LG / CLIMAVENETA / TRANE / YORK / SWEGON BLUE BOX / DUNHAMBUSH	CATEGORY-1
101	AIR HANDLING UNITS (AHU)	CRYSTAL / CITIZEN / WAVES / EDGETECH / CARRIER / ZECO / HUMIDIN / TRISTAR	CATEGORY-1
102	FAN COIL UNIT (FCU)	WAVES / CRYSTAL / ZECO / CITIZEN / EDGETECH / CARRIER / DAIKIN / TRISTAR / YORK	CATEGORY-2
103	VRV/ VRF HVAC UNIT	LG / HITACHI (JOHNSON) / SAMSUNG / DAIKIN / VOLTAS / HAIER / CARRIER / BLUE STAR	CATEGORY-2

Amelgand
SME
MSE & SD

Wte

P



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
104	COOLING TOWER UP TO 200 TR.	DELTA / BELL COOLING TOWERS / MIHIR / PAHARPUR	CATEGORY-2
105	COOLING TOWER ABOVE 200 TR.	DELTA / BELL COOLING TOWERS / MIHIR / PAHARPUR	CATEGORY-2
106	EXPANSION TANK	ANERGY	CATEGORY-3
107	AIR & DIRT SEPARATOR	ANERGY	CATEGORY-3
108	FAN - AXIAL FLOW / INLINE / VENTILATION / PROPELLER / PLUG	DYNAIR-MAICO / DUSTECH / KRUGER / WAVES / HUMIDIN / WOLTER / AIR FLOW / RR KABEL / CRYSTAL / GREENHECK	CATEGORY-2
109	RO SYSTEM / WATER SOFTENING PLANT	SURYA RO / DELTA / WAE / VENZA (MGROW)	CATEGORY-3
110	WATER COOLER	CLIMATROL / VOLTAS / ORIENT ELECTRIC / SIDWAL	CATEGORY-3
111	WATER DISPENSER	WAE / VENZA (MGROW) / VOLTAS	CATEGORY-3
112	DRINKING WATER FOUNTAIN	WAE / VENZA (MGROW) / OASIS	CATEGORY-3
I	PA SYSTEM & RELATED ITEMS		
113	AMPLIFIERS	ATEIS / SCHRACK / HEINRICH / BOSCH / HONEYWELL / OPTIMUS / BOSE	CATEGORY-2
114	ANNOUNCEMENT MICROPHONES / CAR CALL CONSOLES	ATEIS / SCHRACK / HEINRICH / BOSCH / HONEYWELL / OPTIMUS / BOSE	CATEGORY-2
115	CONTROLLERS	ATEIS / SCHRACK / BOSCH / HEINRICH / HONEYWELL / OPTIMUS	CATEGORY-3
116	SPEAKER	ATEIS / SCHRACK / HEINRICH / BOSCH / NOTIFIRE / OPTIMUS / BOSE	CATEGORY-3
117	DIGITAL CALL STATION / WORK STATION	AVTRON / ATEIS / HEINRICH / BOSCH / OPTIMUS	CATEGORY-3
118	EQUIPMENT RACK	HEINRICH / BOSCH / PRESIDENT / ORDEIN	CATEGORY-3
119	DVD/DVR /MP3 PLAYER	TYCO / HEINRICH / BOSCH / HONEYWELL / SIEMENS / OPTIMUS	CATEGORY-2
120	CABLE FOR MICROPHONE / SPEAKER	RR KABEL / JMW KABEL / POLYCAB / BONTON / BOSCH / HPL / KVV'S (INDUSTRIAL)	CATEGORY-2
121	DIGITAL LINE ARRAY SPEAKER	ATEIS / HEINRICH / BOSCH / BOSE / OPTIMUS	CATEGORY-2
122	CCTV CAMERA	AVTRON / TYCO / ILLUSTRATE / HEINRICH / SIEMENS / BOSCH / HONEYWELL / ULTRAK / PELCO	CATEGORY-2
123	MONITOR /DISPLAY-LCD / LED / PLASMA	LG / PANASONIC / SAMSUNG / SONY	CATEGORY-2
124	COMPUTER /LAPTOP (FOR IBMS/BMS/SCADA)	HP / DELL / LENOVO / IBM	CATEGORY-4
125	COMPUTER ACCESSORIES (KEY BOARD/MOUSE)	HP / DELL / LENOVO / IBM	CATEGORY-4

Amilgale
SMCEE

Wdo

Dev



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
J	SOLAR PLANT & ACCESSORIES		
126	SOLAR INVERTER/ POWER CONDITIONING UNIT	SELEC / HAVELLS/ POWER ONE	CATEGORY-2
127	SOLAR MODULES	SWELECT / HAVELLS/ JAKSON	CATEGORY-2
128	DC CABLES	GEMSCAB / APAR / RR KABEL / SPECIAL CABLES / JMW KABEL / POLYCAB / HAVELLS / RALLISON (LKB) / KEC / HPL / GLOSTER / KEI / BONTON	CATEGORY-2
K	MISCELLANEOUS & OTHER MECHANICAL ITEMS		
129	HAND DRIER	TECHNOCRATS / EURONICS / DOLPHY / ANAND AUTOMATIC SYSTEM	CATEGORY-3
130	DOUBLE WALL CORRUGATED HDPE PIPE/PLAIN HDPE PIPE	VPL / GANGOTRI / ASTRAL / CPE / BEC PLAST / KESHAV KRIPA / VALENS / TIRUPATI PLASTOMATIC / GEMINI / HIMALYAN / MANGALAM	CATEGORY-3
131	AUTOMATIC SLIDING DOOR	HOUSYS / GEZE / NEPTUNE / S. ADITYA / DORMAKABA / TECHNOCRATS / AUTOINGRESS	CATEGORY-3
132	ELEVATOR	ORBIS / SCHINDLER / FUJITEC / INFRA / TRIO ELEVATOR / OMEGA ELEVATOR / ESCON / JOHNSON LIFTS / ECE / KONE / TKE / OTIS	CATEGORY-1
133	ESCALATOR /TRAVELATOR	ORBIS / SCHINDLER / TRIO ELEVATOR / OMEGA ELEVATOR / JOHNSON LIFTS / KONE / TKE / OTIS	CATEGORY-1
134	BOLLARD	HOUSYS / AVIANS / SWARAJ / S. ADITYA / TECHNOCRATS / EURONICS / NEPTUNE / BROSIS / FAAC	CATEGORY-3
135	BOOM BARRIER	HOUSYS / AVIANS / SWARAJ / S. ADITYA / DORMAKABA / TECHNOCRATS / BROSIS / NEPTUNE / AUTOINGRESS / FAAC / SPEEDGATZ	CATEGORY-3
136	TROLLEY GATE	AVIANS / SWARAJ / S. ADITYA / TECHNOCRATS / DELITE / AUTOINGRESS / LOTUS	CATEGORY-3
137	TYRE KILLER/SPIKE BARRIER	HOUSYS / SWARAJ / S. ADITYA / TECHNOCRATS / NEPTUNE / BROSIS / FAAC / SPEEDGATZ	CATEGORY-3
138	UNDER VEHICLE SCANNING SYSTEM	HOUSYS	CATEGORY-3
139	EXTERNAL LIGHTING POLES/ DECORATIVE LIGHT POLE	SUBHAM / AMBIKA POLES / LYSAGHTPOLE™ / VAKRANGEE / VSTP / UTKARSH / RMSCO (RAJASTHAN METAL) / SKIPPER / BP PROJECTS / K-LITE / TRANSRAIL / PRAKASH SURYA (SURYA ROSHNI) / SUMIP / SIGNIFY / BAJAJ / WIPRO / CROMPTON / ORIENT ELECTRIC	CATEGORY-3
140	HIGH MAST	SUBHAM / AMBIKA POLES / VAKRANGEE / VSTP / LYSAGHTPOLE™ / UTKARSH / SKIPPER/ BP PROJECTS / K-LITE / PRAKASH SURYA (SURYA ROSHNI) / TRANSRAIL / SIGNIFY / BAJAJ / WIPRO / ORIENT ELECTRIC / CROMPTON	CATEGORY-3
141	ALUMINIUM LADDERS / HYDRAULIC LADDERS	DELITE	CATEGORY-2
142	BOOM /SCISSOR/SPIDER/VERTICAL LIFT	MLIFT	CATEGORY-2
143	DASH FASTENERS	HILTI / FISCHER	CATEGORY-4
144	GEAR BOX	MGM VARVEL / iMAK	CATEGORY-3
145	GEARED MOTOR	LHP / LENZE / ROTOMOTIVE / MGM VARVEL / iMAK	CATEGORY-3
146	WEATHERPROOF JUNCTIONBOX	TRINITY TOUCH / SPELSBERG (CAPE) / RITTAL	CATEGORY-3

Amirgale
C/EB
M. 9870

Info

R



ITEM CODE	ITEMS	PREFERRED MAKES (W.E.F. 10.07.2025)	CATEGORY FOR TEST CERTIFICATION/ INSPECTION
147	EV CHARGERS	P2 POWER / E-FUEL / AXONIFY TECH SYSTEMS PRIVATE LIMITED	CATEGORY-1
L	GROUND LIGHTING ITEMS		
148	PAPI (NON-LED)	AMA / VARDHMAN / NASU SYSTEM	CATEGORY-1
149	LAMP (HALOGEN)	YOUYANG	CATEGORY-3
150	AGL FITTING (LED)	VARDHMAN / AMA	CATEGORY-1
151	AGL FITTING (NON-LED)	VARDHMAN / AMA	CATEGORY-1
152	ALCMS / ILCMS	VARDHMAN	CATEGORY-1
153	ISOLATING TRANSFORMER	TRIO / CTC (CREATIVE TRADING) / VARDHMAN / AMA / BILDAL / ELECTROMACH / YOUYANG	CATEGORY-1
154	CONSTANT CURRENT REGULATOR (CCR)	VARDHMAN / AMA / HONEYWELL / YOUYANG / NASU SYSTEM	CATEGORY-1
155	6 KV GRADE AFL CABLE UNSHIELDED / SHIELDED	GEMSCAB / APAR / RR KABEL / ALOKE (ANKUR) / RALLISON (LKB) / JRD / KEI / GLOSTER	CATEGORY-1
156	1.1 KV GRADE SECONDARY LEAD FOR AFL CABLE	GEMSCAB / APAR / RR KABEL / AMA / ELECTROMACH / ALOKE (ANKUR) / RALLISON (LKB) / JRD	CATEGORY-2
157	PLUGS / RECEPTACLE / CONNECTOR	CTC (CREATIVE TRADING) / ELECTROMACH / ALOKE (ANKUR) / VARDHMAN / NEPTUNE / AMA / BILDAL / YOUYANG	CATEGORY-2

Note: This is mere enlistment as preferred make and is subject to the compliance of Technical Specification mentioned in tender.

CATEGORY REQUIREMENT OF TEST CERTIFICATE/ INSPECTION

CATEGORY-1:

- a) Type test certificate for similar item done. If not one of the items offered is to be type tested.
- b) OEMs routine test certificate.
- c) Acceptance test to be conducted in the presence of AAI representative at OEMs factory.

CATEGORY-2:

- a) Type test for similar done. If not, one of the items offered is to be type tested.
- b) OEMs routine test certificate.
- c) Visual and functional check by PMC / Engineering Consultant representative (AAI official incase of non avialibility of PMC/ Engineering Consultant) at AAI airport site.

CATEGORY-3:

- a) OEM/ Dealer/ Contractor routine test certificate.
- b) Visual and functional check by PMC / Engineering Consultant representative (AAI official incase of non avialibility of PMC/ Engineering Consultant) at AAI airport site.

CATEGORY-4:

- a) Visual and functional check by PMC / Engineering Consultant representative (AAI official incase of non avialibility of PMC/ Engineering Consultant) at AAI airport site.

[Signature]
SNCED
MIS 887D

[Signature]

[Signature]



Existing Provision				Amended Provision			
Sr No	Items	Preferred Makes (W.E.F. 10.07.2025)	Category For Test Certification / Inspection	Sr. No.	Items	Preferred Makes	Category For Test Certification / Inspection
40	DIESEL ENGINE ABOVE 250 KVA	GREAVES COTTON / BAUDOUIN (SHANDONG) / MAHINDRA POWEROL / PERKINS / CUMMINS / KOEL / CATERPILLAR	CATEGORY-1	40	DIESEL ENGINE ABOVE 250 KVA	GREAVES COTTON / BAUDOUIN (SHANDONG) / MAHINDRA POWEROL / CUMMINS / KOEL / CATERPILLAR	CATEGORY-1

148	PAPI (NON-LED)	AMA VARDHMAN / NASU SYSTEM	CATEGORY -1	148	PAPI (NON-LED)	AMA VARDHMAN / FAA CERTIFIED / COMPLIANCE (FOR INDEGENOUS MANUFACTURER) SUBJECT TO FULFILLING THE REQUIREMENT OF ICAO/DGCA-CAR AND APPROVAL AS PER SR NO.-3, PARA NO.-3 OF TC 03/2025	CATEGORY-1
149	LAMP (HALOGEN)	YOUYANG	CATEGORY -3	149	LAMP (HALOGEN)	YOUYANG / PHILIPS / OSRAM / NARVA / AS RECOMMENDED BY OEM	CATEGORY-3
150	AGL FITTING (LED)	VARDHMAN / AMA	CATEGORY -1	150(a)	AGL FITTING (LED)-ELEVATED	VARDHMAN / AMA FAA CERTIFIED / COMPLIANCE (FOR INDEGENOUS MANUFACTURER) SUBJECT TO FULFILLING THE REQUIREMENT	CATEGORY-1
151	AGL FITTING (NON-LED)	VARDHMAN / AMA	CATEGORY -1				
152	ALCMS / ILCMS	VARDHMAN	CATEGORY -1				



		OF ICAO/DGCA-CAR AND APPROVAL AS PER SR NO.-3, PARA NO.-3 OF TC 03/2025	
150(b)	AGL FITTING (LED)-INSET	FAA CERTIFIED / FAA COMPLIANCE (FOR INDEGENOUS MANUFACTURER) SUBJECT TO FULFILLING THE REQUIREMENT OF ICAO/DGCA-CAR AND APPROVAL AS PER SR NO.-3, PARA NO.-3 OF TC 03/2025	CATEGORY-1
151(a)	AGL FITTING (NON-LED)-ELEVATED	VARDHMAN / AMA FAA CERTIFIED / FAA COMPLIANCE (FOR INDEGENOUS MANUFACTURER) SUBJECT TO FULFILLING THE REQUIREMENT OF ICAO/DGCA-CAR AND APPROVAL AS PER SR NO.-3, PARA NO.-3 OF TC 03/2025	CATEGORY-1
151(b)	AGL FITTING (NON-LED)-INSET	FAA CERTIFIED / FAA COMPLIANCE (FOR INDEGENOUS MANUFACTURER) SUBJECT TO FULFILLING THE REQUIREMENT OF ICAO/DGCA-CAR AND APPROVAL AS PER SR NO.-3, PARA NO.-3 OF TC 03/2025	CATEGORY-1
152	ALCMS / ILCMS	VARDHMAN FAA CERTIFIED / FAA COMPLIANCE (FOR INDEGENOUS MANUFACTURER) SUBJECT TO FULFILLING THE REQUIREMENT OF ICAO/DGCA-CAR AND APPROVAL AS PER SR NO.-3, PARA NO.-3 OF TC 03/2025	CATEGORY-1

WAYFINDING MANUAL

MODULE ONE

Design for way finding in airports

Issue 4 | March 2021

Airports Authority of India
New Delhi, India.

Introduction	3
How to use this manual	4
Section A: AAI Brand Identity	5-8
Section B: Basic Signing Principles	9-16
Section C: Design elements	15-28
Section D: Sign Design Guidelines	29-156
Section E: Tender Support Documents	157-236
Section F: Installation & Monitoring	237-233
Section G: Annexures	243
Annexure 1: Standard Operating Procedure for planning and managing the Wayfinding & Signage Design and Implementation Project at subsequent airports	245
Annexure 2: Recommendations on Standard Operating Procedure for managing the Signage inventory and implementing and additions or modifications of Signages at respective airports at a later stage.	248
Annexure 3: Signages as per PRM Handbook of AAI	250

Wayfinding systems are integral to any transportation network considering movement and safety of passengers.

The increasing number of airport users in India combined with the evolution of terminal design as well as the wide range of airport sizes and configurations make the Wayfinding systems more complex than ever before.

The problem of non-standard signage at airports creates difficulty for the passengers and other stakeholders in their movement within and around airport leading to congestion and capacity constraints.

Efficient Wayfinding systems aid in reducing journey time for users and reducing queues and crowding at the various facilities. Uniformity in signage across airports enables self-navigation and rich travel experience.

This manual is divided into two modules which are designed not to be standalone references for individual aspects of the programme, but to be read in conjunction with each other and are therefore cross-referenced, wherever necessary.

This is to facilitate that sign design and application complement each other, to ensure consistency of messaging and continuity of sign planning, across the Airport Wayfinding Systems.

MODULE 1

Design for Wayfinding in Airports

This module is concerned with outlining the character of Wayfinding system which includes the brand identity of Airports Authority of India, basic signing principles and graphic elements forming the parameters of the design language for signs.

The correct use of this manual will ensure the integrity of the Wayfinding systems and will help to put the travel anxieties of passengers at ease.

Sections included in this module are:

Section A: AAI Brand Identity

Section B: Basic Signing Principles

Section C: Design Elements

Section D: Sign Design Guidelines

Section E: Tender Support Documents

Section F: Installation & Monitoring

Section G: Special Conditions

MODULE 2

Planning for Wayfinding in Airports

The purpose of this module is to ensure continuity of sign application at locations, along all charted journey paths for passengers.

The correct use of this manual will make transit experience for travelers, more intuitive and seamless, across all airports.

Sections included in this module are:

Section H: Principles of Sign Application

Section I: Sign Planning process – Illustrated journeys

Section J: Creation of Sign Planning Documents

AAI Brand Identity

Section



This Section deals with the use of AAI logo and the considerations for its appropriate usage throughout the proposed scheme. It is essential that these guidelines are strictly adhered to and not compromised while designing the sign layout.



Figure 2.1 Approved AAI identity



The AAI identity
This symbol, chosen to promote AAI, is featured on numerous applications associated with the network, including system maps, airport name signs, entrance totems and train liveries. This manual covers how the AAI symbol, should be implemented on passenger information and airport signage.

Exclusion Zone
The logo requires space around it in order to maximize its visual presence. An exclusion zone around the logo prevents any graphic element from interfering with its integrity. Please ensure no other graphic elements or text are placed within these zones.

The illustration opposite show the proper usage of the logo as well as the incorrect methods which need to be avoided.



Figure 2.1 Incorrect usage of AAI identity

Basic Signing Principles

Section

B

This section explains the basic considerations for sign design and its suitability to the environment, taking into account different categories of signs and passenger communications inside airports, in following categories:

- **Visibility and readability**
- **Viewing distances**
- **Information hierarchy**
- **Customer focus**

Together these principles contribute towards the creation of a unified design approach for passenger information system for AAI.



Difficulties found during our font study:



Thick and thin characters of the font creates inconsistency visually and is difficult to identify in poor reading conditions



Overlap in characters reducing legibility



Extra bold letters reduce legibility in difficult reading conditions and are likely to get lost when illuminated



Extremely styled characters are difficult to differentiate



Intricate conjunctions and half letters are likely to get lost when illuminated leading to less legibility



Similar looking Alphabets create poor distinctions in difficult reading conditions 'R' as shown above is likely to be recognized as 'B' in poor reading conditions

Due to close proximity of
'e' it is likely to appear like
'o' in difficult reading
conditions

This likely to appear like 3 vertical bars



Character Spacing is Critical in the Sign is Back lit

The graphic standards developed for AAI need to be highly visible and instantly recognisable, particularly for application to signs in busy passenger environments. Since the purpose of all signs is to convey information, this shall be done clearly, concisely and consistently, to assist commuters.

Signs tell passengers the layout of a airport, where they are and in which direction they should go, assisting circulation, improving safety and providing reassurance.

Furthermore, the clarity of information graphics on signs, combined with wayfinding strategy, can enhance the passenger journey, contributing to a feeling of confidence. This ultimately leads to a positive perception of AAI as a public transport operator.

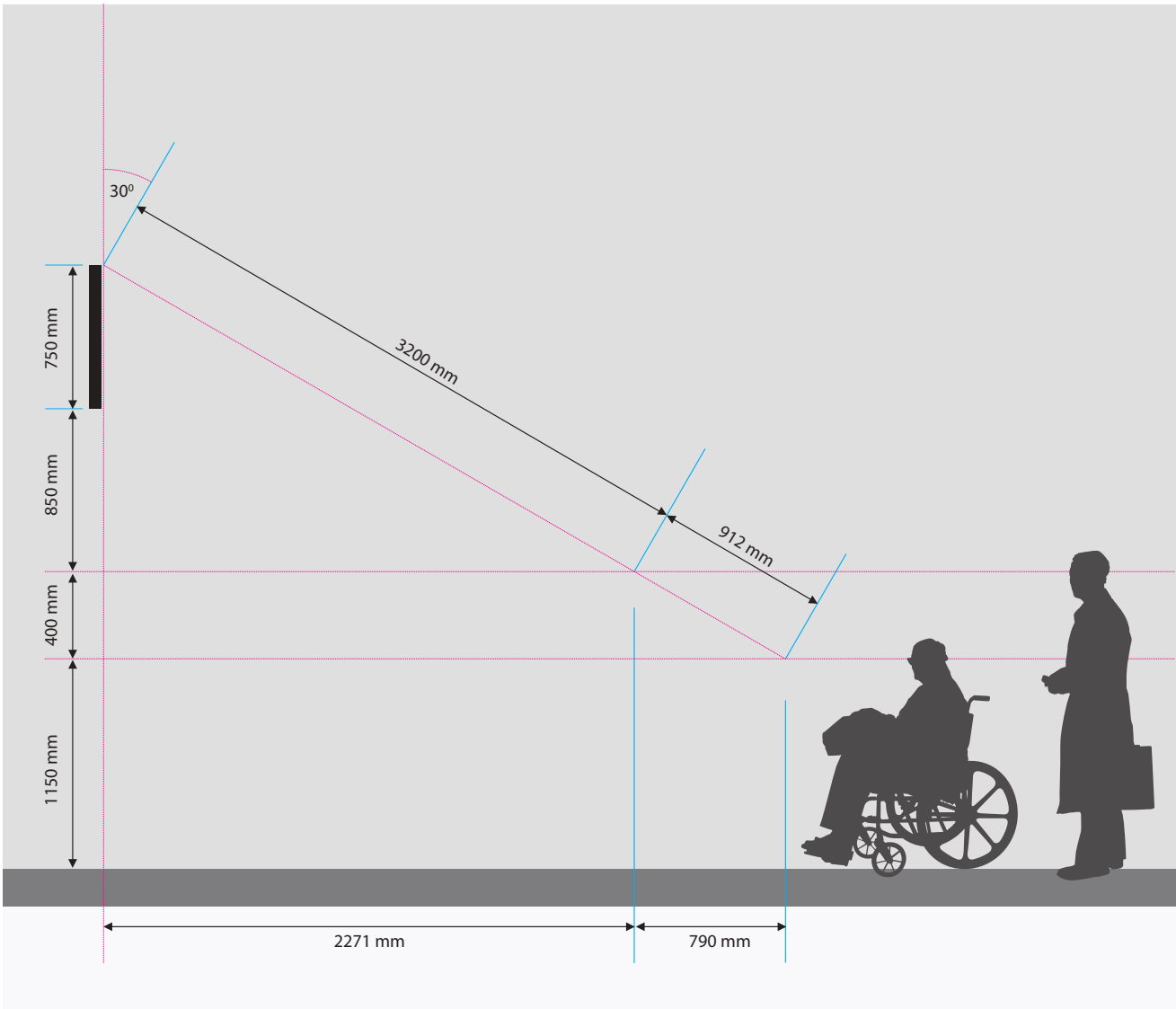
Adherence to the standards of colours, typeface and their use in text and sign backgrounds is important to retain a desired level of visibility and readability.

Viewing Distances

Viewing distance in meters	Minimum height of Text in millimeters
2 m	5.5 mm
3 m	7 mm
5 m	12 mm
10 m	21 mm
15 m	34 mm
20 m	45 mm

Viewing distances chart

This chart, shows the distance at which certain sizes of lettering can be read by a person with average eyesight. Other considerations such as architectural features or visual continuity, may influence the choice of letter size but the optimum size should be used wherever possible.



विमानबन्धन नक्शा | हवाई अड्डा मानचित्र

Airport Map

विमानबन्धन नक्शा | हवाई अड्डा मानचित्र

Departure Area

Map Legend

D1, D2 Entry

A1 Exit

T Entry Tickets

ATM ATM

A Arrival

B Baggage

I Information

C Check-in

Cu Customs

S Security Check

L Lift

E Escalator

St Stairs

Lo Lounges

G Gates

M Airport Manager

BS Baggage Screening

To Toilet

GT Gents Toilet

LT Ladies Toilet

EE Emergency Exit

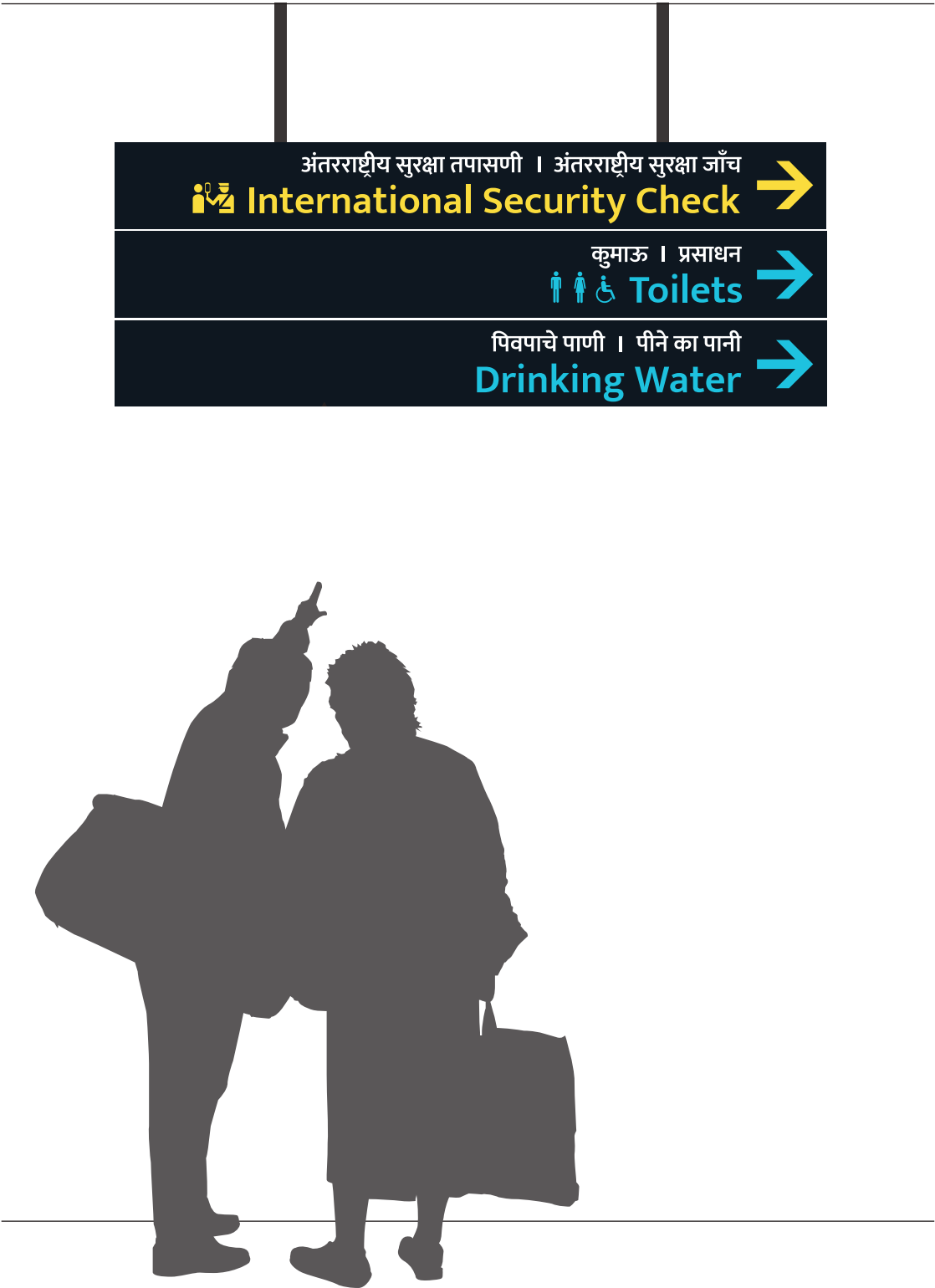
Airport Authority of India

5

প্রবেশ দ্বাৰ। দ্বাৰ Gate



The location signs shall not be mixed with direction signs. located at crucial decision points for passengers, for example, when deciding which gate to board or whether to turn left or right. Where facilities such as toilets are nearby, location signs with pictograms should be sufficient to identify the facility.



The requirement of any transport operator is to make the system easy to use, particularly for first-time passengers. This is achieved by giving the passenger confidence.

The design of the airports must provide this confidence, making it as intuitive as possible to find the departure and arrival journeys, as well as the way out or the route to connecting services.

Information graphics and signing should enhance this process, confirming locations and making clear the layout of airports. Lack of clear directions can cause anxiety and it is important that passengers are reassured, AAI has their safety and interest at heart. Signing as part of a comprehensive passenger information package is one of the most vital aspects of any Airport system.

The strategic placement of a unified family of signs is indispensable for guiding people safely and efficiently to their destinations, especially within busy airport environments and transport interchanges.

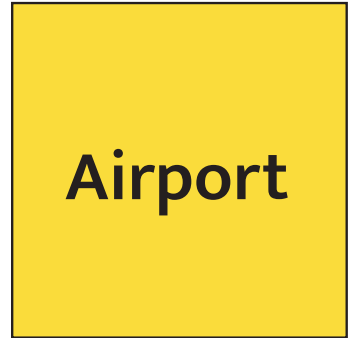
A customer focused approach to the design of information graphics and signs is important for passenger safety and wellbeing, the smooth running of airports, and the projection of a strong AAI visual identity.

Design Elements

Section



This section illustrates the elements of design which will constitute the unified design language. This will ensure that all sets of information dispensed within the airport environment follow the same character and singular structure which is easy to diagnose, relate with and follow.



Airport

Airport

Airport

Airport

Actual colour swatches matching to PAN-TONE and RAL system should be produced for their respective medium and materials and duly approved before placing orders for paints, coatings, vinyl films or printing for the signs.

କ ଟ ର ଷ୍ ଥି ନୁ ବ କ୍ଷ ଘ

Font : Hind Siliguri - Semi Bold

ଅ ଆ ଇ ଦ୍ଵ ଝ ଞ ଚୂ ଗୁ ବୌ

Font : Ek Mukta - Semi Bold

A B c d E f g h j k

Font : Ek Mukta - Semi Bold

These fonts have been used for all direction signs, location signs, airport name, title of information signs etc.

Lettering must be shown in the specified colours, sizes and proportions unless stated otherwise. The font should be in **Semi Bold** Style. It is to be used in mixed upper and lower case (not all capitals). Capitals are used only for the beginning of a message or the beginning of a proper noun.

All Information, direction and location signs shall have the message in 3 languages, Regional, Hindi and English.

The mentioned fonts are chosen for their unicode, for their free and open nature. Other languages would be added as per requirement for future applications.

Hind Guntur

అఆయుబ

Hind Madurai

சஜஞ்ஞ

Shree Mal-02

ഇടപ്പള്ളി

Multilingual Nature of the signs

Only the initial letter of a sentence, facility name or information on a sign panel is an upper case letter (capitals). All other text is to be displayed in lower case. Studies and experience of design team have hinted that All CAPS text takes more time to read and appears as visual clutter in a multilingual signing specifically in combination with Indian languages and also leads to making the signs longer.

Use of abbreviation shall be kept to the minimum and only in places where due to space constraints the text has to be reduced. The abbreviations shall be avoided as it's translation in Regional language will be difficult in reading.

The translation shall be done keeping in mind the general vocabulary of people and relevance to the contextual language. Wherever possible the emphasis shall be on translation based on meaning than phonetic.

The text will be translated based on phonetics as the words would become a part of a spoken language of the city than that of written language. Regional Languages of signage messages shall be vetted from concerned department of local bodies and operations department of respective Airport before finalization of tender document.

Use of ampersand should be avoided in favour of use of 'and', as some regional languages does not use symbols.

Punctuation like full stops and commas shall not be used in short text messages. A hyphen shall not be used to indicate a time or day period. The term 'to' shall be used instead.

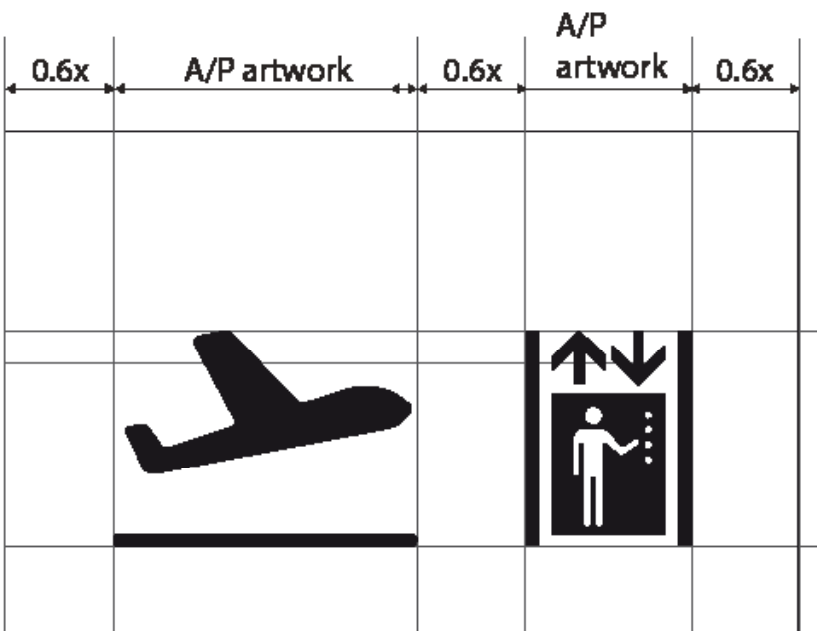
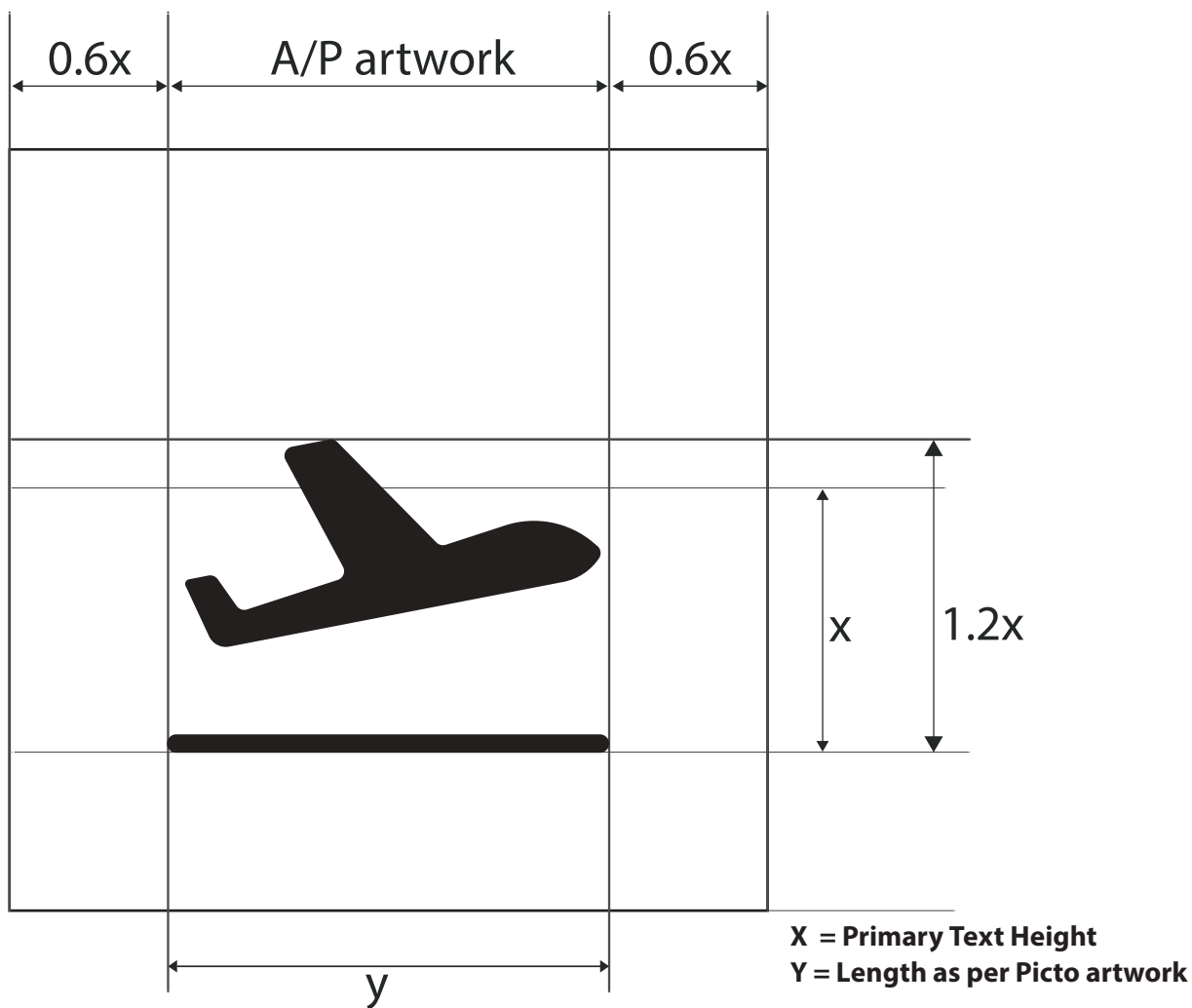
Time should be represented as a clock based on 24 hrs. Colon shall be used to differentiate hours and minutes instead of hyphen or semicolon.

Dates shall be displayed in order of day, month, year in both languages. 'Dot' of Fullstop shall be used as separator for the date, month and year.

All numericals represented shall be in English and to be in Ek Mukta font.

The fares in the information sign shall be represented as ₹1.00 in English as well as in all languages . The decimal point shall be represented with a full point.

Pictograms



Pictograms have been recreated specially for AAI system wide application. These designs have been inspired and referred with the ISO standards and global best practices in pictogram representations. Pictograms are useful because they are a form of shorthand for explaining directional or location messages, designed to be suitable for a local as well as an international audience.

Stand-alone pictograms are used to identify passenger facilities such as information points and toilets. There are different categories of pictograms covering: airport facilities provided for passenger comfort; operational services to support the running of airports and the AAI system; and different modes of travel, such as rail, taxi, bus and air transport available at transport interchanges.

Pictograms are always shown open without any boundry box and in Cyan or yellow against black in interior and black on yellow in exterior curbside.. Every pictograms require space around it in order to maximize its visual presence. An exclusion zone around the pictogram graphic prevents any graphic element from interfering with it. Please ensure no graphic elements or text are placed within these zones.

Two or more pictograms can be combined as illustrated.

Pictograms where ever used shall be reproduced every single time from the original artworks and should never be redrawn.

New pictograms can be created using the grid shown here and matching the style, representation, visual look of these proposed pictograms.

The newly designed and proposed pictograms shall be approved by employer prior to its implementation.

Pictograms

Arrivals		Crew / Staff		Phone		Elevator		Recycle	
Departures		Escalator		Info		Moving Walkway		Two Wheeler	
Check In		Family Room		Fire call point		Stairs		Do not carry - Flammable Gas	
Lounges		First Aid		Fire hose		Help Phone		Do not carry - Flammable Liquid	
Baby Care		Animal Quarantine		Fire extinguisher		Restaurant		Do not carry - Compressed Gas	
Accessible		Duty Free		Fire alarm		Mail Box / Post Office		Do not carry - Oxidizers	
Drinking Water		Cloak Room		Oversized Baggage		Wi Fi		Do not carry - Flammable Solids	
Baggage		Bar / Cocktail		Parking		Trash		Do not carry - Explosives	
Toilet (Men)		Passnger Pick up / Drop off		No Smoking		Baggage Cart		Do not carry - Radioactive Materials	
Toilet (Women)		Bus		Smoking Room		Coffee Bar		Do not carry - Poison	
Day hotel		Taxi		Please Wait		ATM		Do not carry - Spontaneous Combustible Materials	

No elements within the frame of the pictogram shall be moved or scaled. Pictograms shall be used from the original artworks provided.

* The First Class pictogram may change if the nomenclature changes. The content and design of this pictogram shall be approved by employer and employer's representative before printing and production.

Requests for new or modified pictograms should be made to employer's representative. Digital artwork files for all current pictograms accompany this manual and are available from the issuer on request.

Figure 3.2.3 Pictograms

Pictograms

Customs		Rental Car		No Entry		Money Exchange		Do not carry - Corrosives	
Terminal		Rail Transport		Immigration		No cell phones		Do not carry - Toxics	
		Subway		Security Check		No photographs		Do not carry - Magnets	
Transfers				Nothing to Declare		Lost and Found		Wheelchair Assistance	
Airport Manager		Self Check in							
Retiring Room		Baby Stroller Assistance							
Lounges		Baby Feeding Room							
Indian Emblem		CIFS							
Auto Stand		Conference Room							
Ramp Up		Misshandelled							

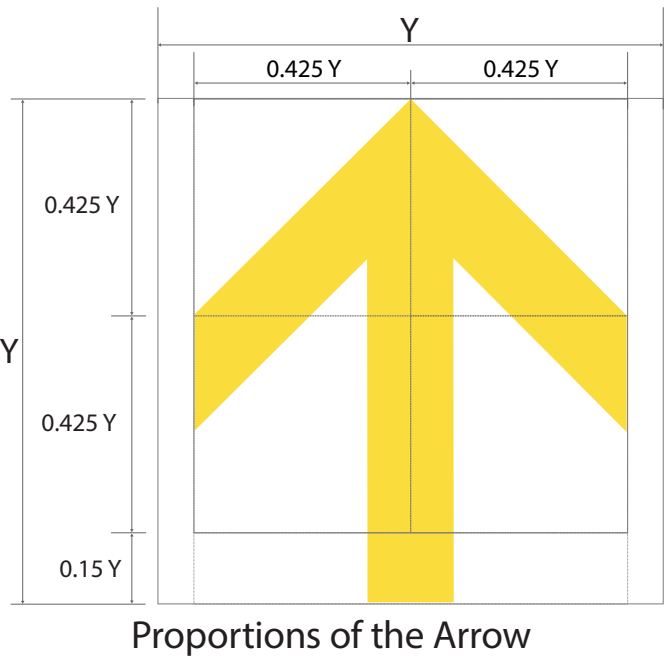


Figure 3.2.11 Arrows grid

Directional arrows have been designed to be highly visible and recognisable from a distance. Their correct application should aid the clear identification of directional signs within a busy airport environment ensuring messages on signs are quickly assimilated and understood. The arrows are designed for passenger use at relatively close distances and therefore do not necessitate the same scale as those on traffic or road signs.

The use of Yellow / Blue arrows against the Black background achieves good contrast to aid visibility and help reduce glare.

Arrows are rotated at 45° increments to indicate each direction. Arrows centred in a square box on signs. Directional arrows should be used as illustrated in this manual and not redrawn or modified in any way.

Basic rules for the use of arrows:

Arrows indicating directions to the left, straight ahead or down should be placed on the left hand side of the message. Arrows indicating directions to the right should be placed on the right hand side of the message. Arrows indicating oblique down and straight down must only be used for a change in level - i.e. stairs, ramp or escalator. Arrows indicating oblique up and straight up can indicate direction across open areas as well as a change in level.

45 degree / oblique arrows shall be used very carefully only at following instances

- Showing a change in level, i.e. movement above or below at the staircase.
- Showing a prominent location/third direction in the same sign panel which is distinctly accessed between the straight ahead and right/left directions.
- In open areas where a person can actually walk in an oblique direction between the straight and left/right.
- These should not be used in narrow corridors.

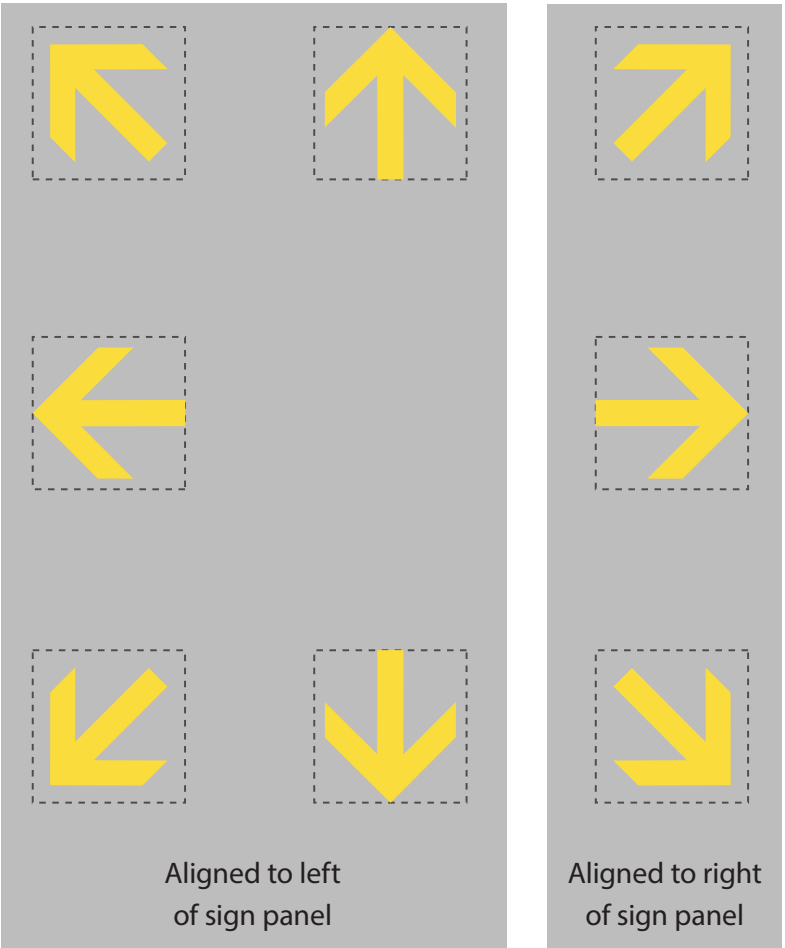


Figure 3.2.12 Arrows conventions

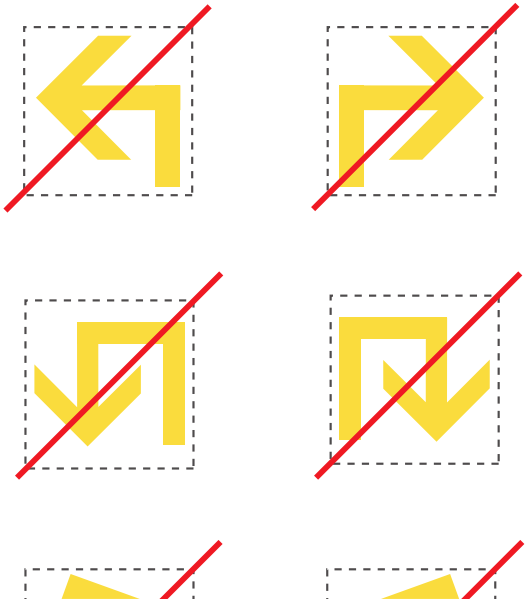


Figure 3.2.12 Incorrect usage of Arrows

x (Ht of Primary Text, mm)	0.6 x (Ht of Second Text,mm)	1.2x (Ht of Picto,mm)	2.2x (Ht of Arrow,mm)	Readable distance, Mts
75	45	90	165	10
125	75	150	275	16.6
150	90	180	330	20
210	126	252	462	28
250	150	300	550	33.3
300	180	360	660	40

This document specifies sign sizes for cap ht X=75.
Spaces with double heights, extensive lenth should prefer the range of cap height given in the table for ease of readability.
Refer the Sign Schedule for cap height specifications for particular signs.

All sign sizes and proportions have been based on primary text height to retain a consistent visual look and limit the number of different sizes.

The ratio of the size of text and line spacing or leading shall follow the measurements as illustrated.

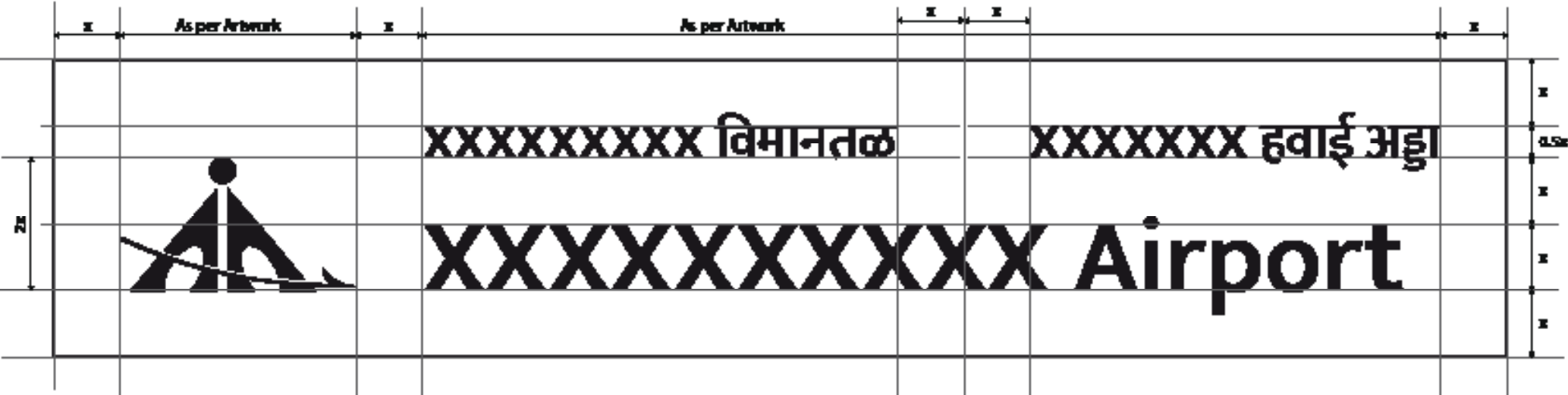
All signs shall follow the same sequence of languages (Regional on top left, followed by Hindi top right and then English at bottom) and the same proportions as shown here.

Digital templates for multilingual sign layouts accompany this manual in separate folders on the disk version.

In case of lengthier content, If the text is not fitting in specified length font heights can be reduced up to 75 percent (multiples of 5 percent) and not less than that.



GRID 01 : Used in Interior Directional Signs



GRID 02 : Used in exterior Signs - 1.1, 1.2

Sign layout



Improper Sign Layouts

All sign sizes and proportions have been based on a 75 X 75 grid to retain a consistent visual look and limit the number of different sizes.

The ratio of the size of text and line spacing or leading shall follow the proportions as illustrated.

All signs shall follow the same sequence of languages (Regional on top left, followed by Hindi top right and then English at bottom) and the same proportions as shown here.

Digital templates for multilingual sign layouts accompany this manual in separate folders on the disk version.

Please contact employer's representative for guidance on any sign which might be an exception to the above rule, for example, because of limited space.

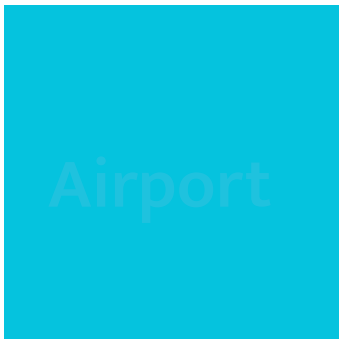
Color Swatches



Pantone Yellow C



Pantone Black 6C



Pantone Cyan 311C



Pantone 541C



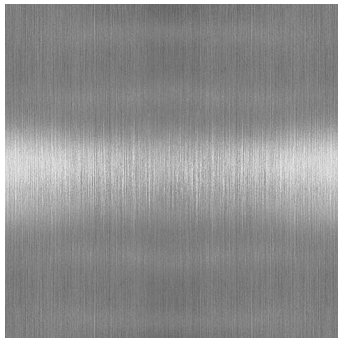
RAL 9011



RAL 9006



RAL 5013



Stainless Steel - Brush finish



Pantone 3405C



Pantone 032C

All the material swatch samples will be presented by the vendor for approval before starting any procurement and production. Approved controlled samples of the swatches shall be submitted in triplicate.

Material Specifications

Material	Colour	Approved Manufacturer-Specification
Plotter cut Cast Opaque vinyls-Black	Pantone Black 6C	3M - Blockout Film Black Matte 3635-22B Avery Dennison - 5303 Blackout Film Black
Retroreflective vinyl - White	-	3M - DG 4090 /Avery Dennison - Omni Cube T-11500
Plotter cut Transluscent Vinyls-Yellow	Pantone Yellow C	3M- Light Lemon Yellow - 3630 - 115 Avery Dennison-4502TF
Plotter cut Transluscent Vinyls-Cyan	Pantone 311C	3M-Olympic Blue - 3730 - 57L Avery Dennison- 4523 TF Light Blue
Plotter cut Transluscent Vinyls-Red	Pantone 032C	3M-Red -3730 -33L Avery Dennison - 4506TF Red
Plotter cut Transluscent Vinyls-Green	Pantone 3405C	3M-Forest 3630-196 Avery Dennison- 5558 QM Forest Green
Plotter cut opaque Vinyls- Blue	Pantone 541C	3M-European Blue - 3630 - 137 Avery Dennison- 5545QM Steel blue
Lasercut / fabricated Acrylic - 5 mm thick	Sample to be approved	Milky White/040
Lasercut / fabricated Acrylic - 8 mm thick	Sample to be approved	Milky White/040
Lasercut / fabricated Acrylic - 5 mm thick	Sample to be approved	Black Glossy
Lasercut / fabricated Acrylic - 10 mm thick	Sample to be approved	Black Glossy
Aluminium fabricated sheet 3mm thick	RAL 5013 / RAL 9006 / RAL 9011as specified	Hindalco - PU Painted/powdercoated
Aluminium box section 25x25	RAL 9006	Hindalco - PU Painted/powdercoated
Aluminium extrusion 50mm wide	Black Matte	Cosign - ID-DS 3000-Anodised
Aluminium extrusion 25mm wide	Black Matte	Cosign - ID-DS 3024-Anodised
SS sheet 5mm thick		Grade 304L - Brush Finish
SS fabricated Box Section 100x100		Grade 304L - Brush Finish
SS fabricated Box Section 70x70		Grade 304L - Brush Finish
SS fabricated Box Section 50x50		Grade 304L - Brush Finish
SS fabricated Box Section 35x35		Grade 304L - Brush Finish
SS fabricated Box Section 25x25		Grade 304L - Brush Finish
SS fabricated cylindrical pipe OD 100		Grade 304L - Brush Finish

Material	Colour	Approved Manufacturer-Specification
MS fabricated box section300x300	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated box section200x200	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated box section125x125	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated box section75x75	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated box section50x50	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated box section 35x35	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated box section 25x25	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
MS fabricated 8 mm thick Plate	RAL 9006	Hotdipped Galvanized and PU painted/powdercoated
Printed Flex	Pantone Yellow C & Black 6C	Star Flex- 350 micron, double printing
Power LEDs modules	Color Temperature: 6500K, 8000K as specified	Nichia/Cree/Osram/Phillips (Lumiled)/Sharp/Seoul - 12V or 24V
Power LEDs Strips	Color Temperature: 6500K, 8000K as specified	Nichia/Cree/Osram/Phillips (Lumiled)/Sharp/Seoul - 12V or 24V
ACP-3mm thk	Yellow, White	Aludecor-AD-12(Yellow),AD-21(White)

Sign Design Guidelines

Section



This section details the classification and genesis of typologies of signs based upon the unified graphic approach established. Sign families are then developed, keeping in mind the basic signing principles, to ensure the adaptability of sizing, proportion and mounting in case specific scenarios, keeping the design language intact. This section, thus, becomes the basis for Sign planning process as illustrated in Module 2.

Sign Hierarchy

Sign Type Code	Sign Type	Illumination	Drawing Nos
1. Exterior Signs			
1.1	Airport Entry Portal	Non-Illuminated	1.1-S, 1.1-G
1.2	Periphery Airport Name Sign	Illuminated	1.2-S, 1.2-G
1.3a-1	Vehicular Directional Sign - Pole Mounted	Non-Illuminated	1.3a-1-S, 1.3a-1-G
1.3a-2	Vehicular Directional Sign Portal	Non-Illuminated	1.3a-2-S, 1.3a-2-G
1.3b	Pedestrian Directional Sign	Non-Illuminated	1.3b-S, 1.3b-G
1.4a	Traffic Statutory Sign	Non-Illuminated	1.4a-S, 1.4a-G
1.4b	Traffic Information Sign	Non-Illuminated	1.4b-S, 1.4b-G
1.5a	Airline Listing - Directional	Non-Illuminated	1.5a-S, 1.5a-G
1.5b	Airline Listing - Announcer	Illuminated	1.5b-S, 1.5b-G
1.6a	Arrival/Departure Zone Marker	Illuminated	1.6a-S, 1.6a-G
1.6b	Entry/Exit Announcer	Non-Illuminated	1.6b-S, 1.6b-G
1.7a	Facility Announcers - Floor Mounted	Illuminated	1.7a-S, 1.7a-G
1.7b	Facility Announcers - Wall Mounted	Illuminated	1.7b-S, 1.7b-G
1.7c	Facility Announcers - Bldg Mounted	Illuminated	1.7c-S, 1.7c-G
1.7d	Facility Announcer - Passenger Amenities	Illuminated	1.7d-S, 1.7d-G
1.8	Terminal Building Announcer	Illuminated	1.8-S, 1.8-G
1.9	Airport Map	Illuminated	1.9-S, 1.9-G
2. Interior Signs			
2.1	Directional Signs		
	Artwork Guideline for Directional Signs		2.1-G
2.1a	Ceiling Hung Directional Sign	Illuminated	2.1a-S, 2.1a-G
2.1b-1	Floor Mounted Directional Sign with FIDS	Illuminated	2.1-b1-S, 2.1b1-G
2.1b-2	Floor Mounted Directional Sign with Map	Illuminated	2.1-b2-S, 2.1b2-G
2.1b-3	Floor Mounted Directional Sign - Single	Illuminated	2.1-b3-S, 2.1b3-G
2.1b-4	Floor Mounted Directional Sign - Double	Illuminated	2.1-b4-S, 2.1b4-G
2.1c	Wall Mounted Directional Sign	Illuminated	2.1c-S, 2.1c-G
2.1d	Wall Projected Directional Sign	Illuminated	2.1d-S, 2.1d-G
2.2	Facility Announcer Signs		
2.2a	Wall Mounted Facility Announcer Sign	Illuminated	2.2a-S, 2.2a-G
2.2b	Wall Projected Facility Announcer Sign	Illuminated	2.2b-S, 2.2b-G
2.2c	Door Mounted Facility Announcer Sign	Illuminated	2.2c-S, 2.2c-G
2.2d-1	Counter Mount Facility Announcer Sign	Illuminated	2.2d1-S, 2.2d1-G
2.2d-2	Counter Mount Facility Announcer Sign - with Screen	Illuminated	2.2d2-S, 2.2d2-G

2.2e-1	Ceiling Hung Facility Announcer Sign	Illuminated	2.2e1-S, 2.2e1-G
2.2e-2	Ceiling Hung Facility Announcer Sign - with Screen	Illuminated	2.2e2-S, 2.2e-2-G
2.2f	Floor Mounted Facility Announcer Sign	Illuminated	2.2f-S, 2.2f-G
2.2g-1	Boarding Gates - Totem	Illuminated	2.2g1-S, 2.2g1-G
2.2g-2	Boarding Gates - Wall Projected	Illuminated	2.2g2-S, 2.2g2-G
2.2g-3	Boarding Gates - Wall Mounted	Illuminated	2.2g3-S, 2.2g3-G
2.2h	Belt No. Sign	Illuminated	2.2h-S, 2.2h-G
2.2i	Bay Announcer	Illuminated	2.2i-S, 2.2i-G
2.2j-1	Baggage Screening - Pole	Illuminated	2.2j1-S, 2.2j1-G
2.2j-2	Baggage Screening - Box	Illuminated	2.2j-2-S, 2.2j2-G
2.3	Information Signs		
2.3a	(Airport) Zonal Route Map	Illuminated	2.3a-S, 2.3a-G
2.3b	Lift Directory	Illuminated	2.3b-S, 2.3b-G
2.4	Utility Signs		
2.4a	Washroom / Drinking Water/ Baby Care	Illuminated	2.4a-S, 2.4a-G
2.4b	Service Area	Non-Illuminated	2.4b-G
2.4c	Lift Number sign	Illuminated	2.4c-S, 2.4c-G
2.5	Statutory Signs		
2.5a	Poster Size A0	Non-Illuminated	2.5G-01
2.5b	Poster Size A1	Non-Illuminated	2.5G-01
2.5c	Poster Size A2	Non-Illuminated	2.5G-02
2.5d	Poster Size A3	Non-Illuminated	2.5G-02
2.5e	Poster Size A4	Non-Illuminated	2.5G-02
2.6	Emergency Signs		
2.6a	Emergency Direction Signs - Illuminated	Illuminated	2.6a-G
2.6b	Emergency Signs - Photoluminiscent	Non-Illuminated	2.6b-G
2.6c	Emergency Signs - Assembly Point	Non-Illuminated	2.6c-S, 2.6c-G
2.6d	Emergency Signs - Fire Life Safety Layout	Non-Illuminated	2.6d-G
2.7	Temporary Signs		
2.7a	Queue manager Sign	Non-Illuminated	2.7a-S, 2.7a-G
2.7b	Information Sign	Non-Illuminated	2.7b-S
2.9	Parking Signs		
2.9a	Parking Directional Sign	Illuminated	2.9a-S, 2.9a-G
2.9b	Parking Announcer Sign - Portal	Non-Illuminated	2.9b-S, 2.9b-G
2.9c	Parking Statutory Sign	Non-Illuminated	2.9c-S, 2.9c-G
2.9d	Parking Information Sign	Non-Illuminated	2.9d-S, 2.9d-G



1.Exterior Signs

1.1	Airport Entry Portal
1.2	Periphery Airport Name Sign
1.3a-1	Vehicular Directional Sign - Pole Mounted
1.3a-2	Vehicular Directional Sign Portal
1.3b	Pedestrian Directional Sign
1.4a	Traffic Statutory Sign
1.4b	Traffic Information Sign
1.5a	Airline Listing - Directional
1.5b	Airline Listing - Announcer
1.6a	Arrival/Departure Zone Marker
1.6b	Entry/Exit Announcer
1.7a	Facility Announcers - Floor Mounted
1.7b	Facility Announcers - Wall Mounted
1.7c	Facility Announcers - Bldg Mounted
1.7d	Facility Announcers - Passenger Amenities
1.8	Terminal Building Announcer
1.9	Airport Map

Airport Entry Portal

Principle

Principle: Sign placed on the approach road marking entry into the Airport site. The sign is located on a gantry. The length of the signage should be decided as per Approach road of the Airport and the structural stability shall also be finalized accordingly. The sign bottom is 6000 mm from the road top finish level.

Material Specification

1. Sign face - 3mm thick Aluminium sheet fabricated and fixed to both sides of horizontal structural as well PU painted to match with RAL 5013. Graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retro reflective vinyl.
2. Sign structure -MS square post 300x300 or as per the structural design and mounting square sections, hotdipped galvanised and PU Painted to match RAL 9006 grouted in ground.
3. Sign Frame -Spanning truss shall be designed for the entire span considering the wind loads.

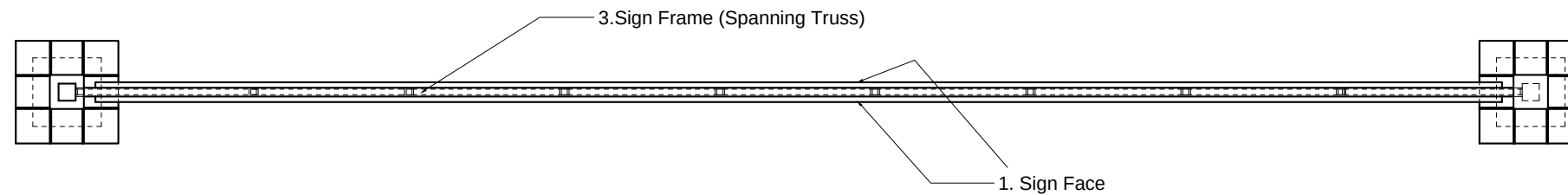
Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:
- Minimum ground clearance should be 6000 mm, should not exceed 7500 mm.

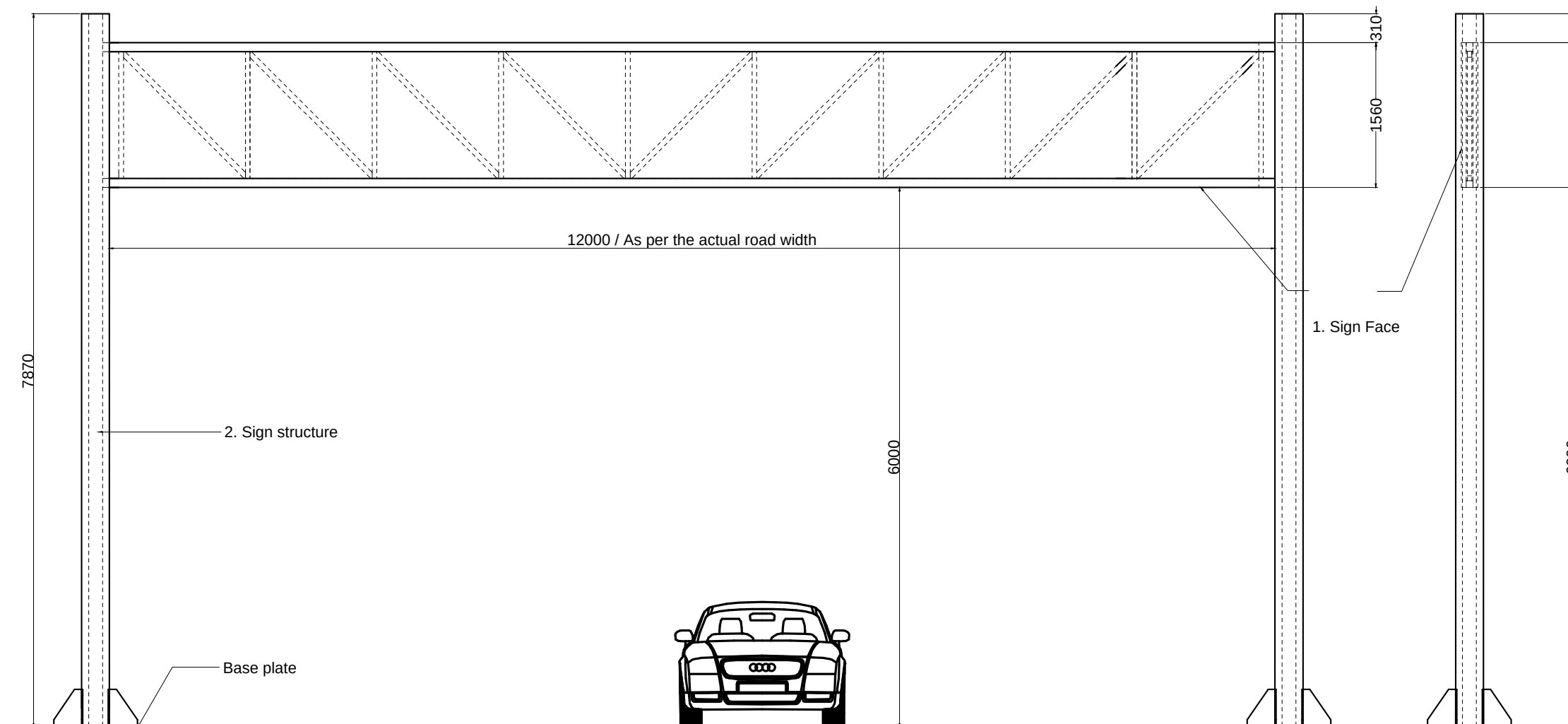
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

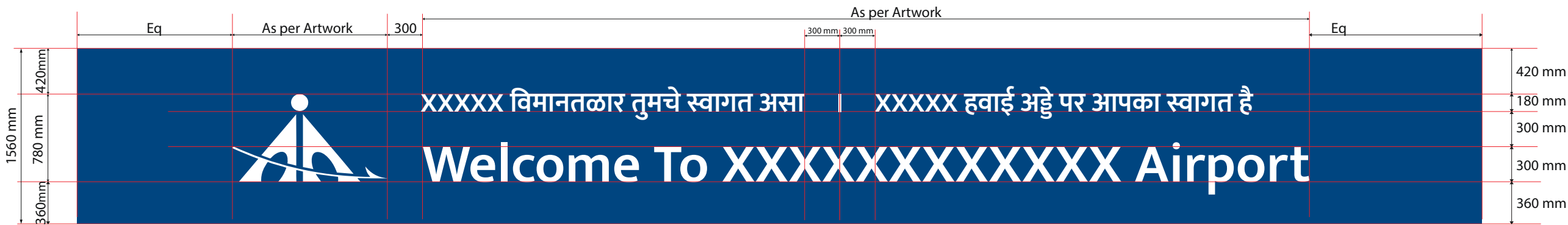
Plan



Perspective

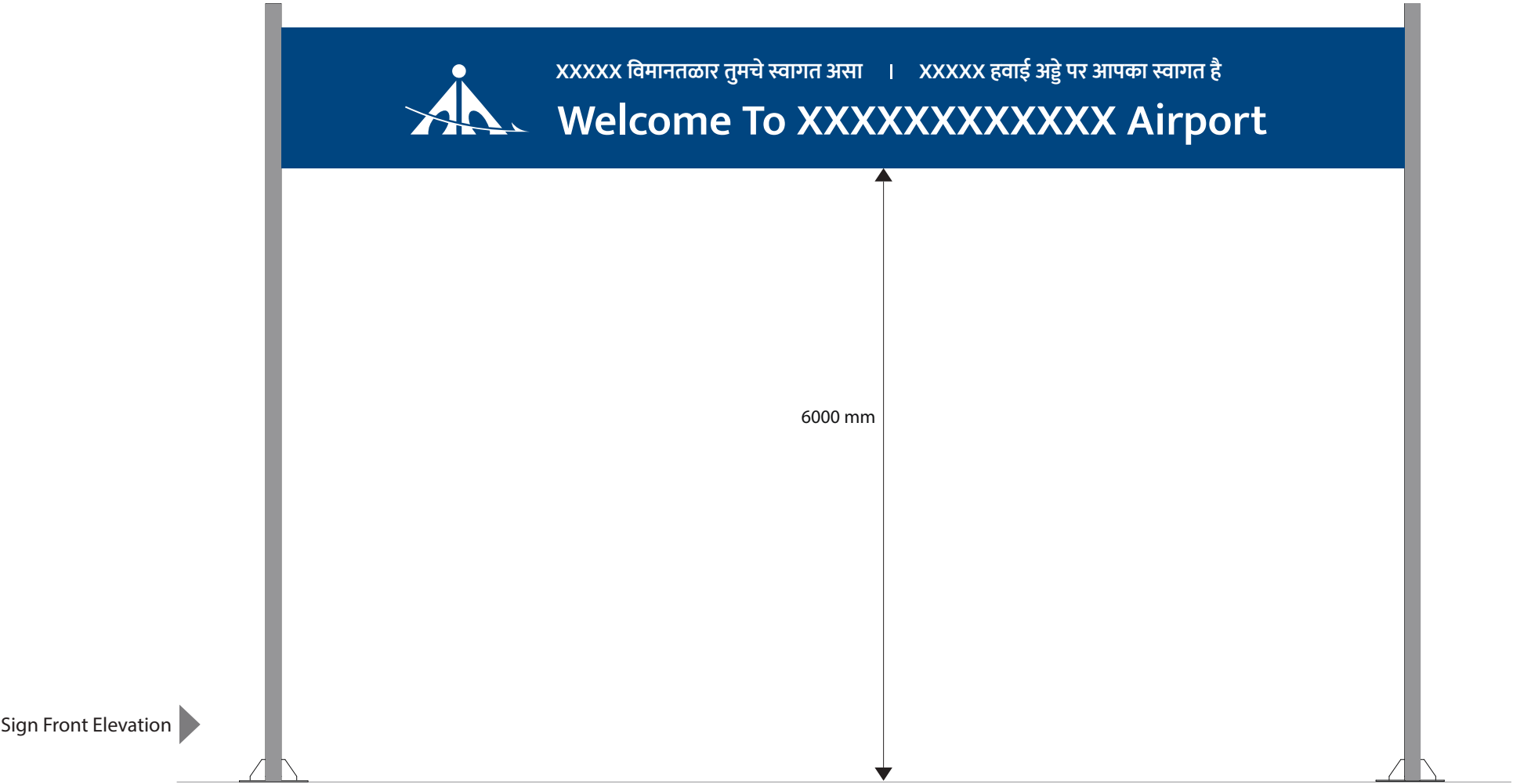


Airport Entry Portal



Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Face Artwork ▲



Sign Adaptability as per Site Conditions:
-In case of reuse of existing gantry structure the new artwork/content should follow the graphic guideline as shown

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Periphery Airport Name Sign

Principle

Sign placed on the site periphery announcing name of the Airport. These signs are airport specific and placed/mounted as per site requirement. Reccomended mounting height should be 2400 mm from the ground level.

Material Specification

- 1. Sign box - the sign box shall be made in 3mm thick aluminium sheet tray in specified blue colour RAL 5013. Router cut, grooved and folded to achieve the desired shape as per drawing fixed with the sign frame.
- 2. Sign Face - 3mm thk powder coated aluminium in specified blue colour RAL 5013, shall be provided with backlit LED lighting and shall have laser cut profiles to recieve milky white 5 mm thk acrylic sheet from back. All panels fixed using counter sunk screws.
- 3. Sign Frame - M .S. square sections 25x25mm hotdipped galvanised.

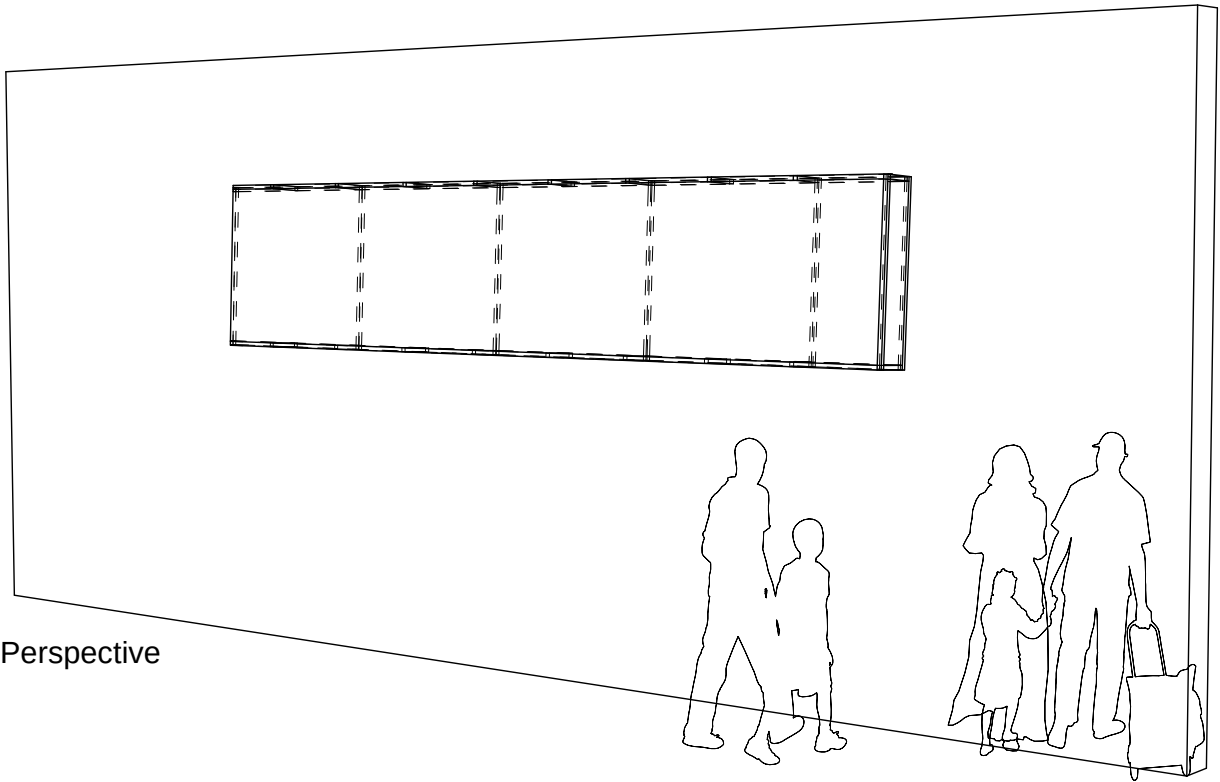
Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

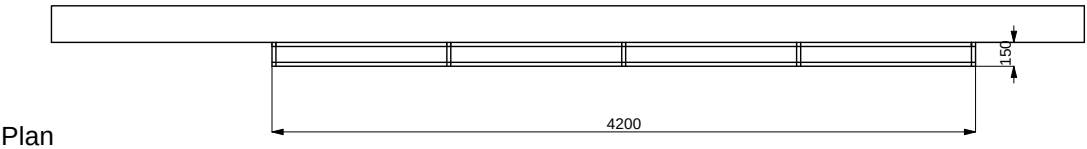
Sign Adaptability as per Site Conditions:
Alternative fixing shall be a stand alone sign supported by metal framework.

Keynotes:

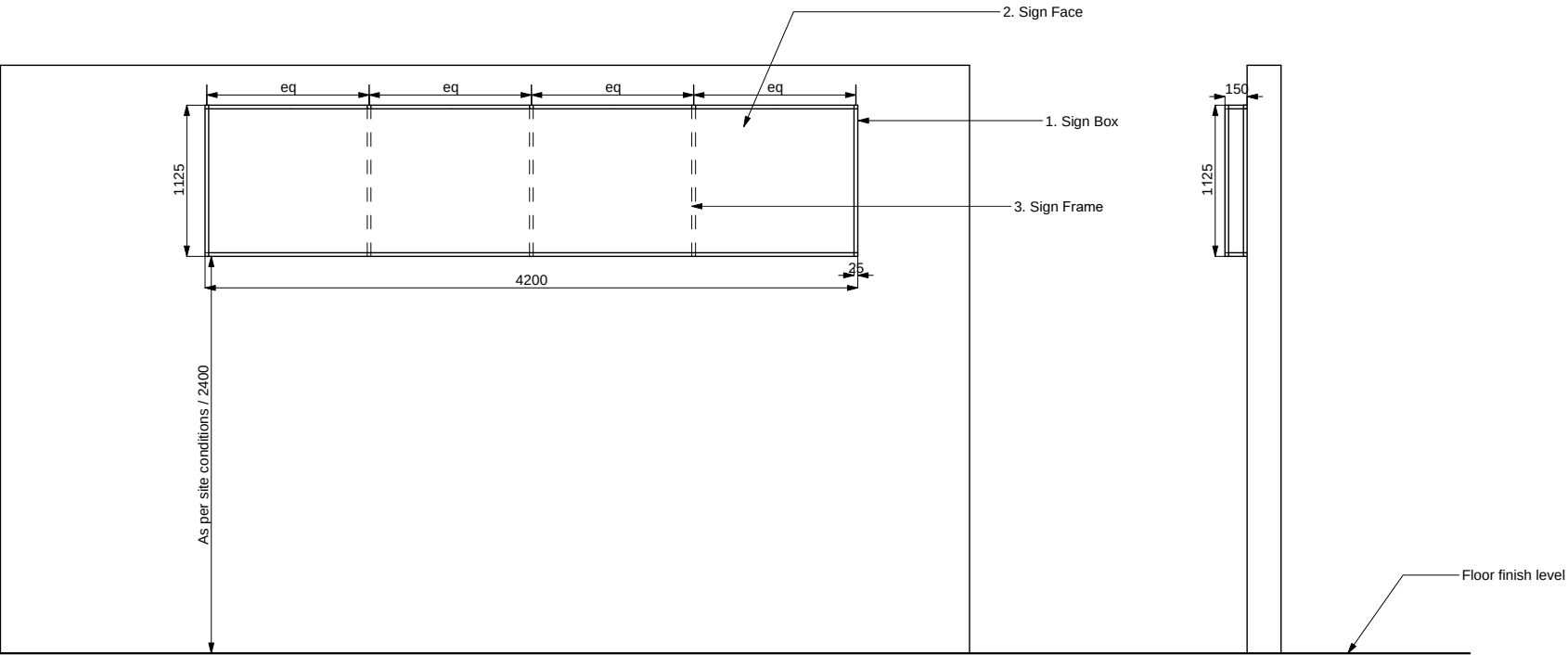
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Perspective



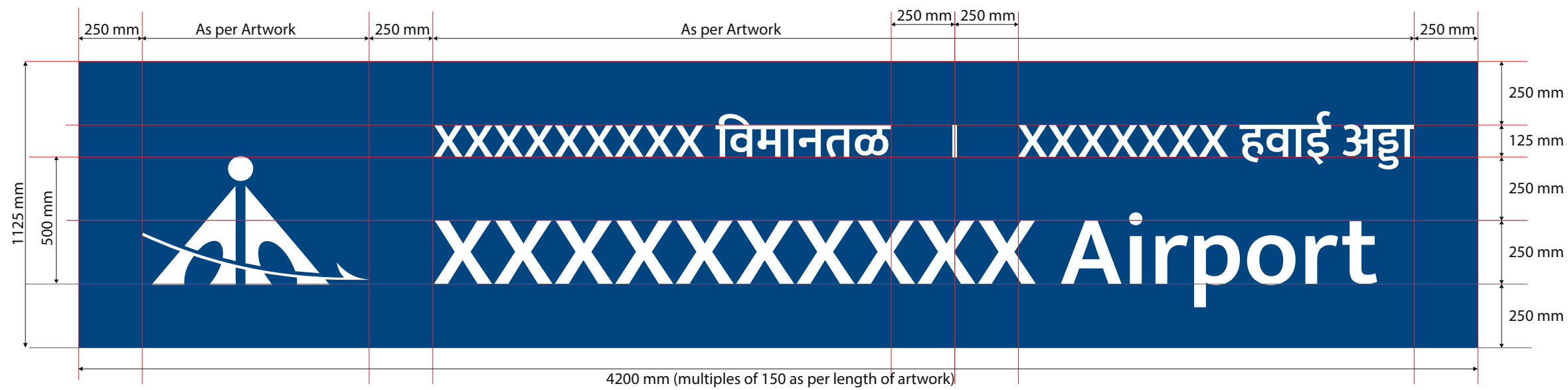
Plan



Front Elevation

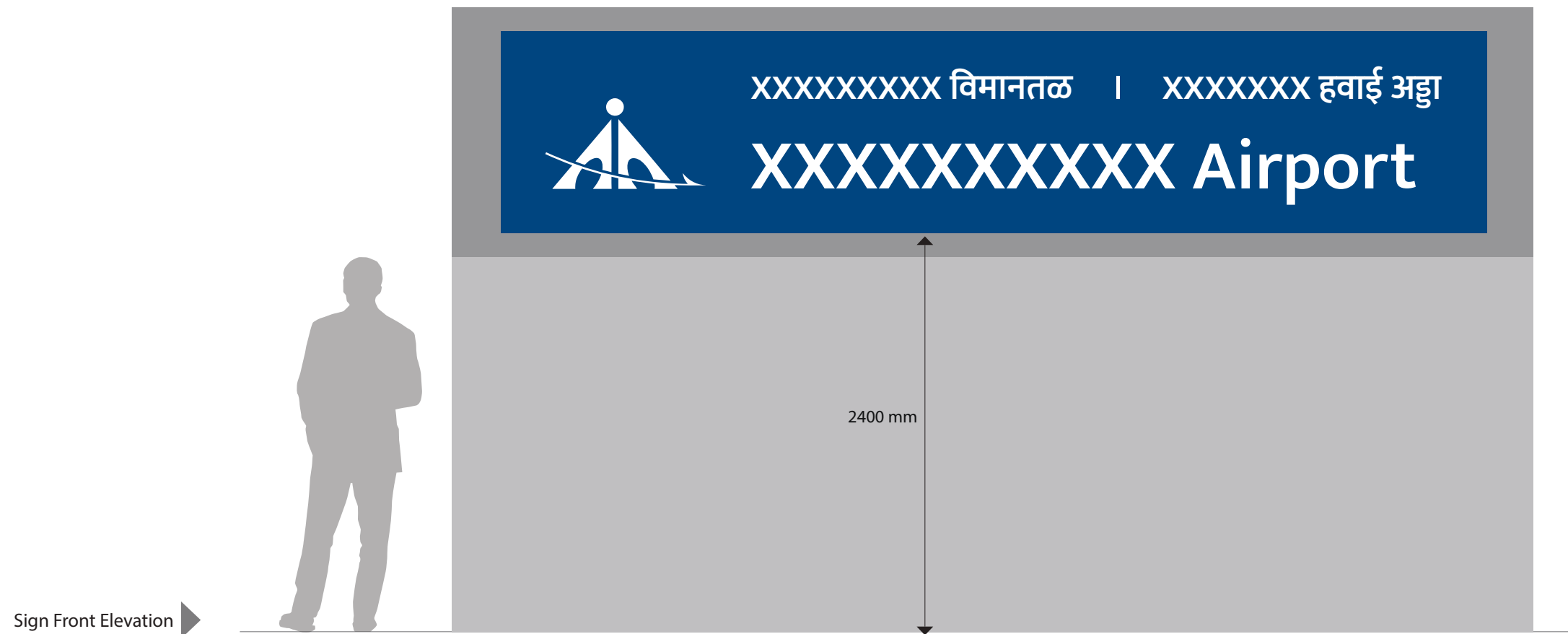
Side elevation

Periphery Airport Name Sign



Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Face Artwork ▲



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Vehicular Directional Sign - Pole Mounted

Principle

Signs placed on internal roads of Airport to help align and manage vehicular traffic. The sign is flag-mounted on a pole.

Material Specification

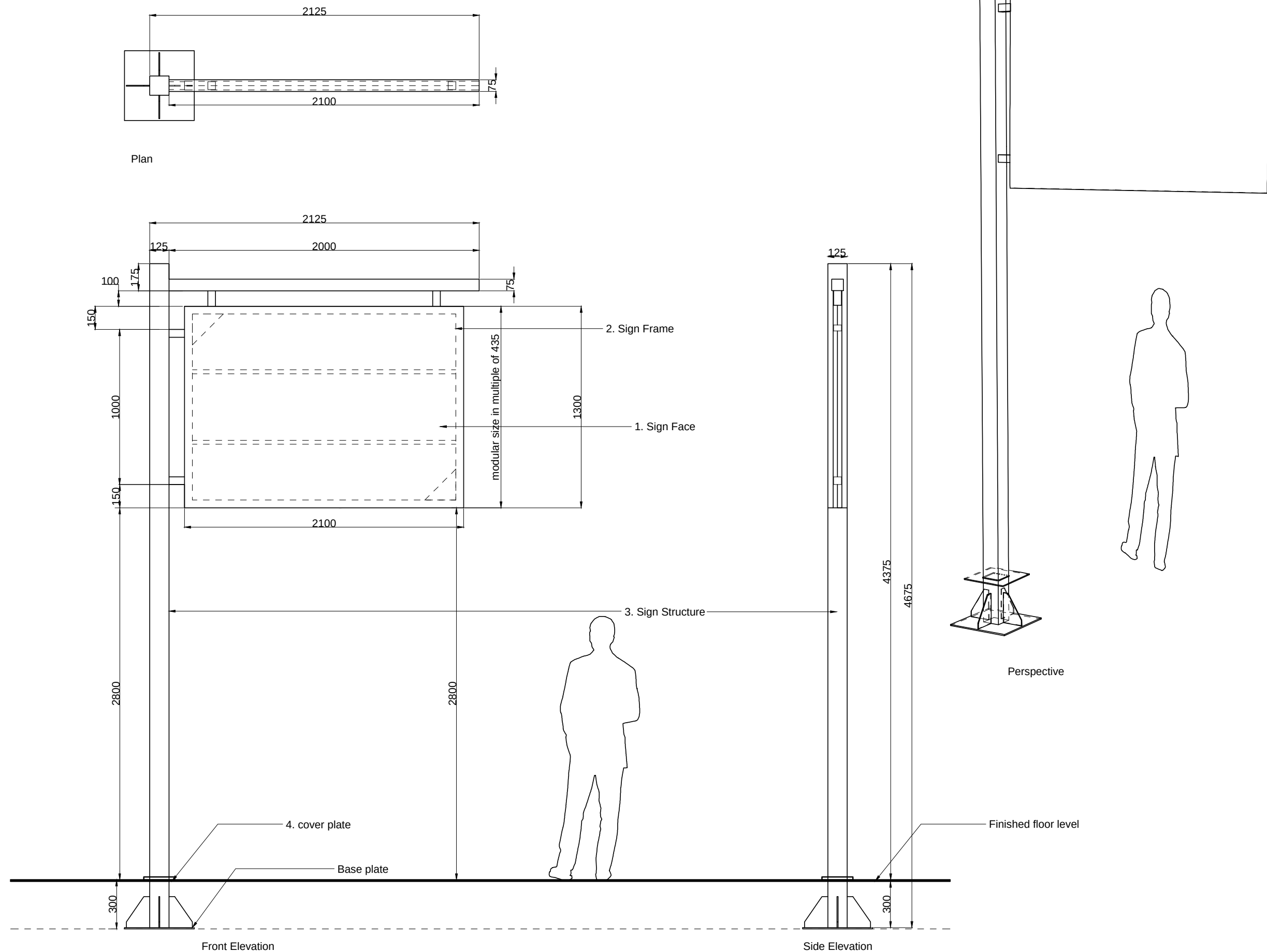
1. Sign face - Both sides 3mm thick aluminium with a white retro-reflective film, fixed on sign frame.
Graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retroreflective vinyl from both sides.
2. Sign frame - M.S.frame 50x50mm hotdipped galvanised to receive the sign face as shown in drawing
3. Sign structure - MS square post 125x125 is grouted in ground receiving horizontal single square section of size 75x75mm at the top. Square sections 50 x 50mm used to fix the sign frame with post & horizontal section. MS square post and all sections to be hotdipped galvanised and PU Painted to match RAL 9006. Secret fixing methods should be used to fix parts together.
4. Cover plate - 225x225mm, 5 mm thick cover plate mounted on the flooring.
Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

Ground Clearance Note : For all panel sizes ground clearance should be 2800mm. Sign panel is in multiple of 435mm .Maximum 3 number of messages per sign face should be used in this sign type.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Note:
Artworks to be taken from the open file provided by the signage consultant.



Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Vehicular Directional Sign Portal

Principle

Signs placed on internal roads of Airport to help align and manage vehicular traffic. The sign is portal mounted on two poles, with the sign bottom being 6000 mm above the floor level.

Material Specification

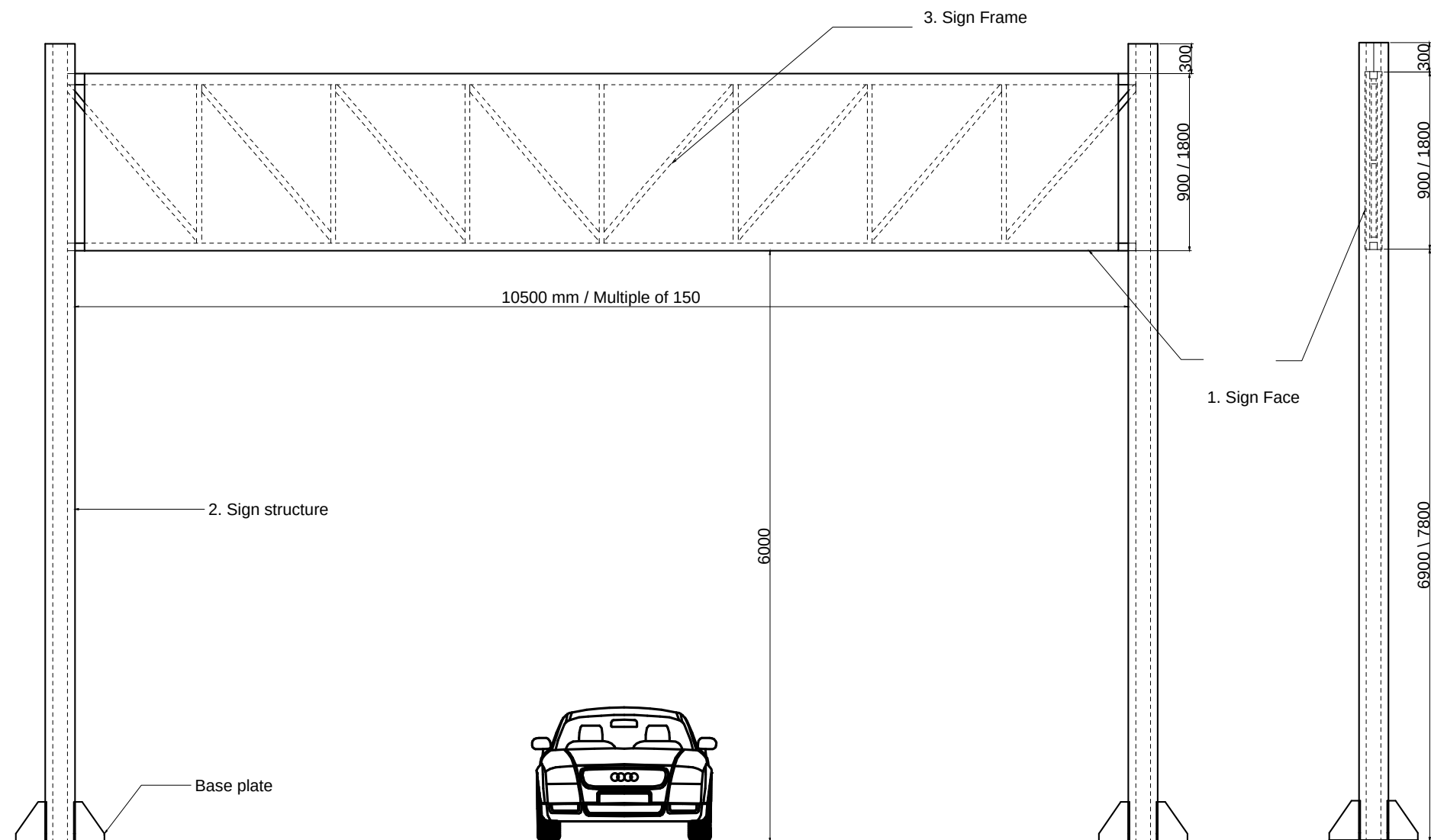
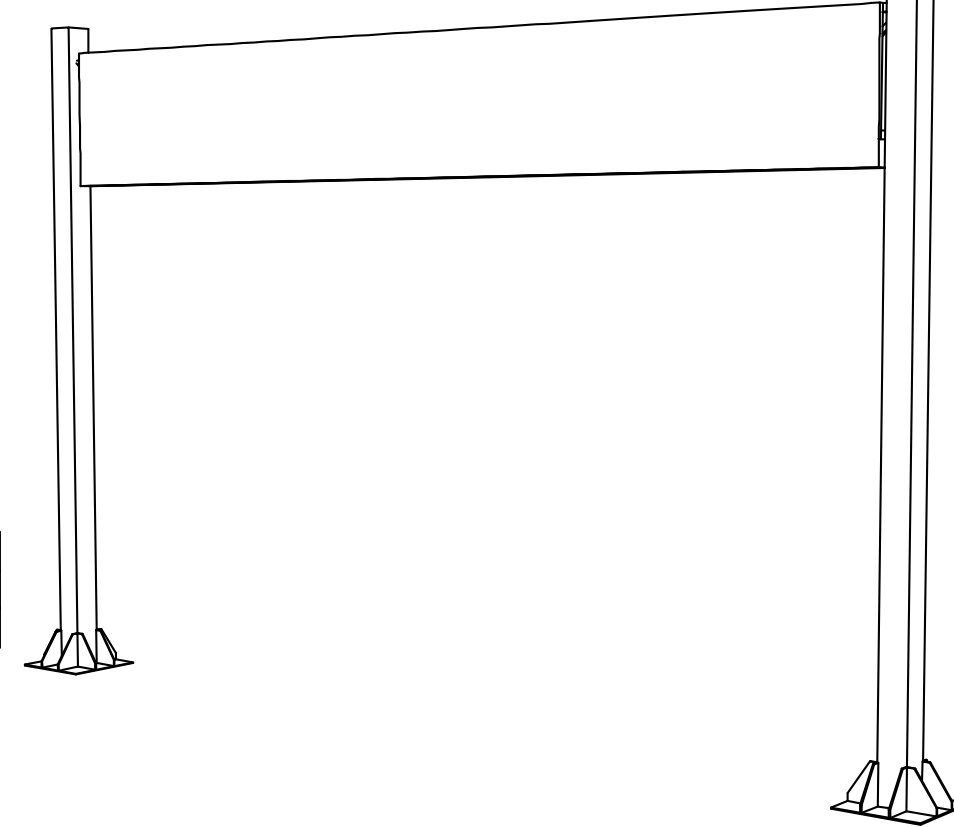
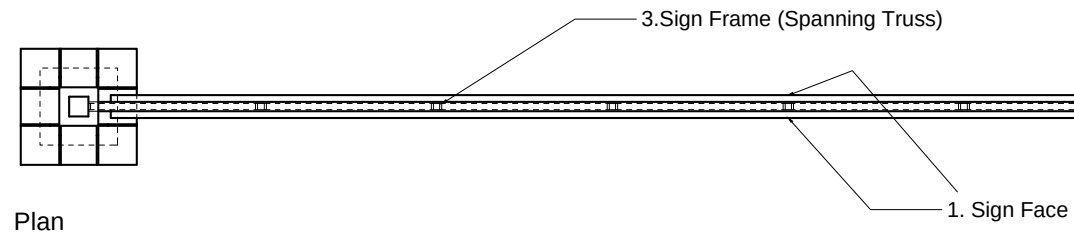
1. Sign face - Both sides 3mm thick Aluminium sheet fabrication with a white retroreflective film, fixed to horizontal structural truss from both sides.
Graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retroreflective vinyl.
2. Sign structure - MS square post 300x300 and mounting square sections, hotdipped galvanised and PU Painted to match RAL 9006 grouted in ground.
3. Sign Frame - Spanning truss shall be designed for the entire span considering the wind loads.
Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

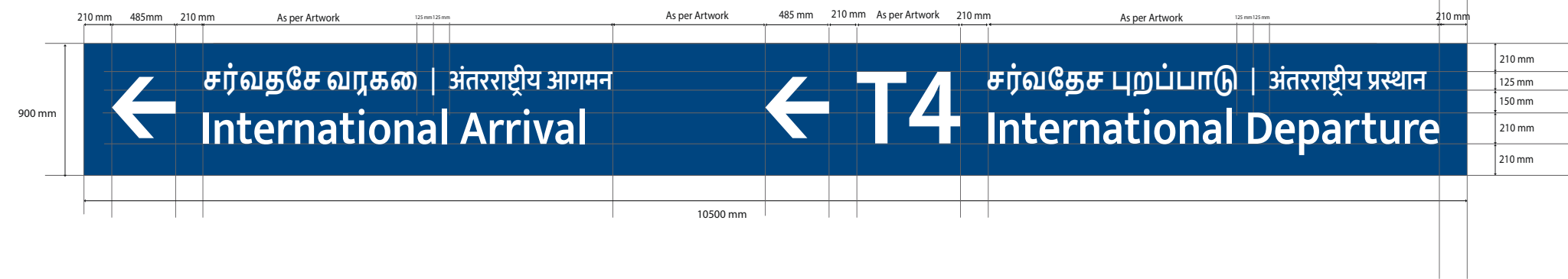
- Minimum ground clearance should be 6000 mm, should not exceed 7500 mm.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

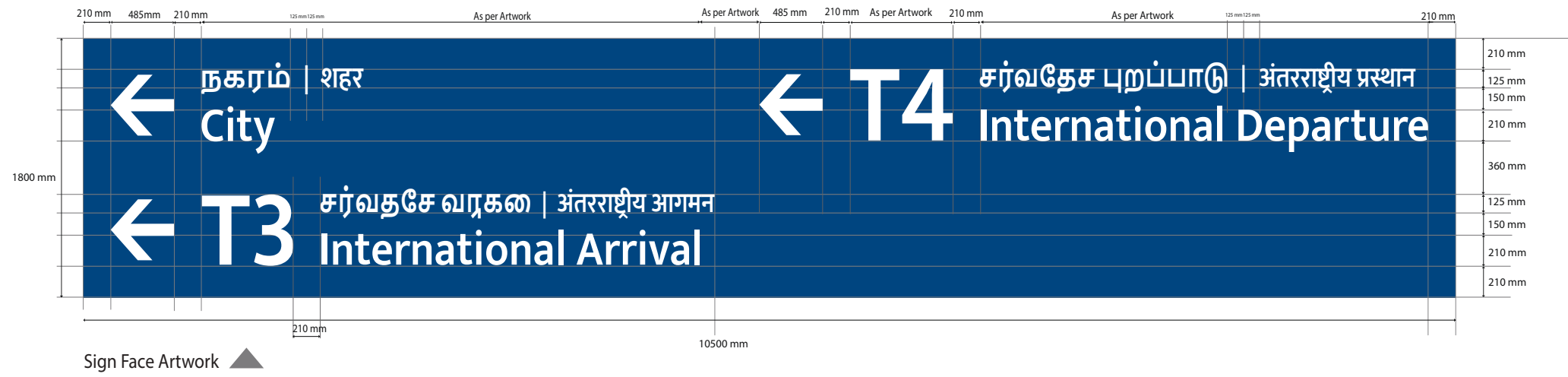


Vehicular Directional Sign Portal

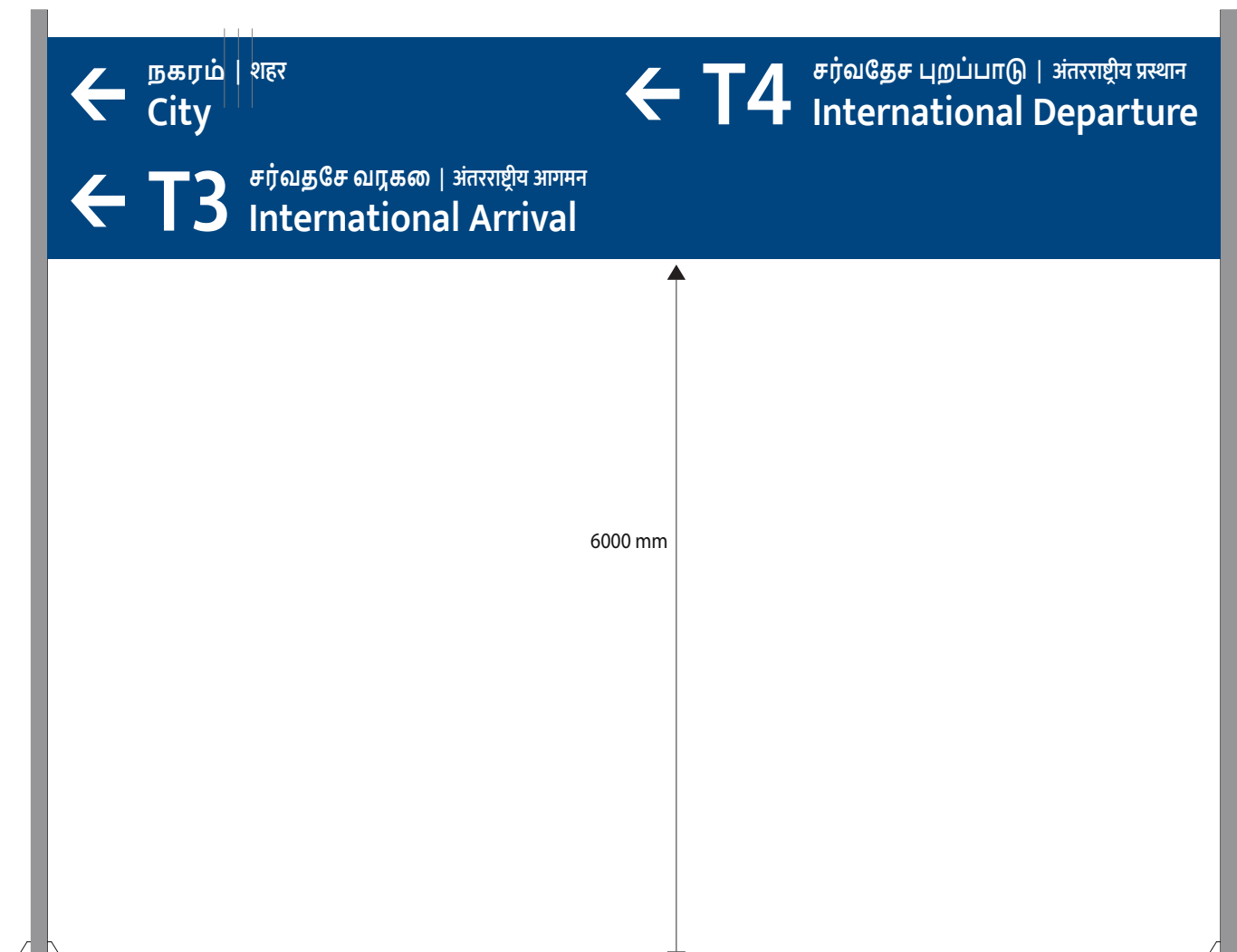


Type - 1

Note:
Artworks to be taken from the open file provided by the signage consultant.



Type - 2



Sign Adaptability as per Site Conditions:
-In case of reuse of existing gantry structure the new artwork/content should follow the graphic guideline as shown

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Sign Front Elevation

Directional Sign - Pedestrian

Principle

Signs placed along the internal roads and landscape of Airport to align and manage pedestrian movement. The sign face mounted between two poles. The sign bottom is 2400 mm from the road top finish level.

Material Specification

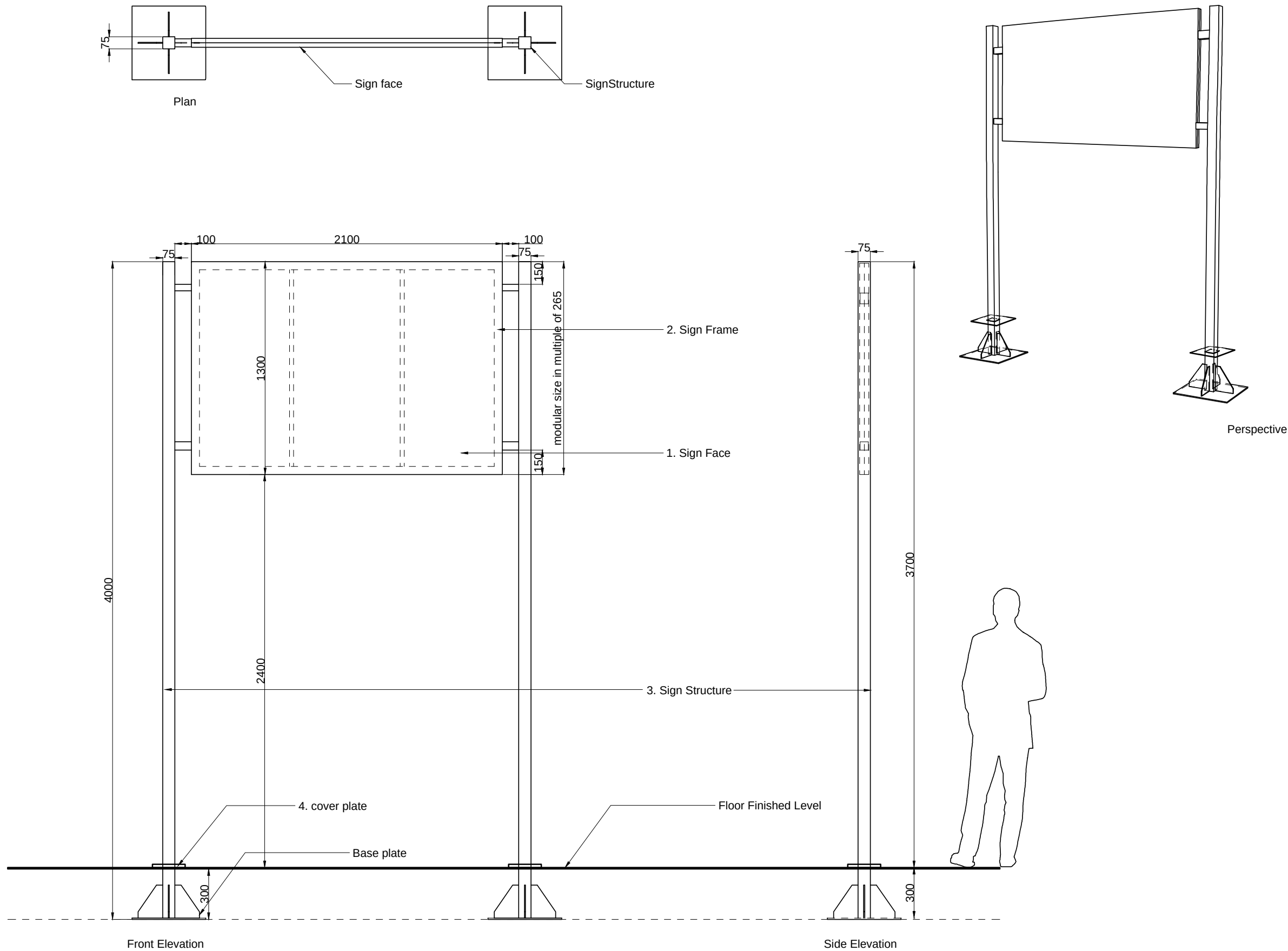
1. Sign face - Both Sides 3mm thick aluminium with a white retro-reflective film.
Graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retroreflective vinyl.
 2. Sign frame - M.S. frame 50x50mm wide, hotdipped galvanized
 3. Sign structure - Two M.S. hollow box sections 75x75 grouted in floor to receive 50x50mm mounting square sections to fix the sign frame, hotdipped galvanised and PU Painted to match RAL 9006 grouted in ground. All hardware used for fixing of sign shall be Stainless steel.
Secret fixing methods should be used to fix parts together.
 4. Cover plate - 225 x 225mm, 5 mm thick cover plate mounted on the flooring.
- Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

- Alternative fixing shall be a ceiling hung sign hanging from existing structure at the airport.
- Maximum 5 number of panels should be used in this sign type
- Minimum ground clearance should be 2100 mm, should not exceed 2400 mm.

Keynotes:

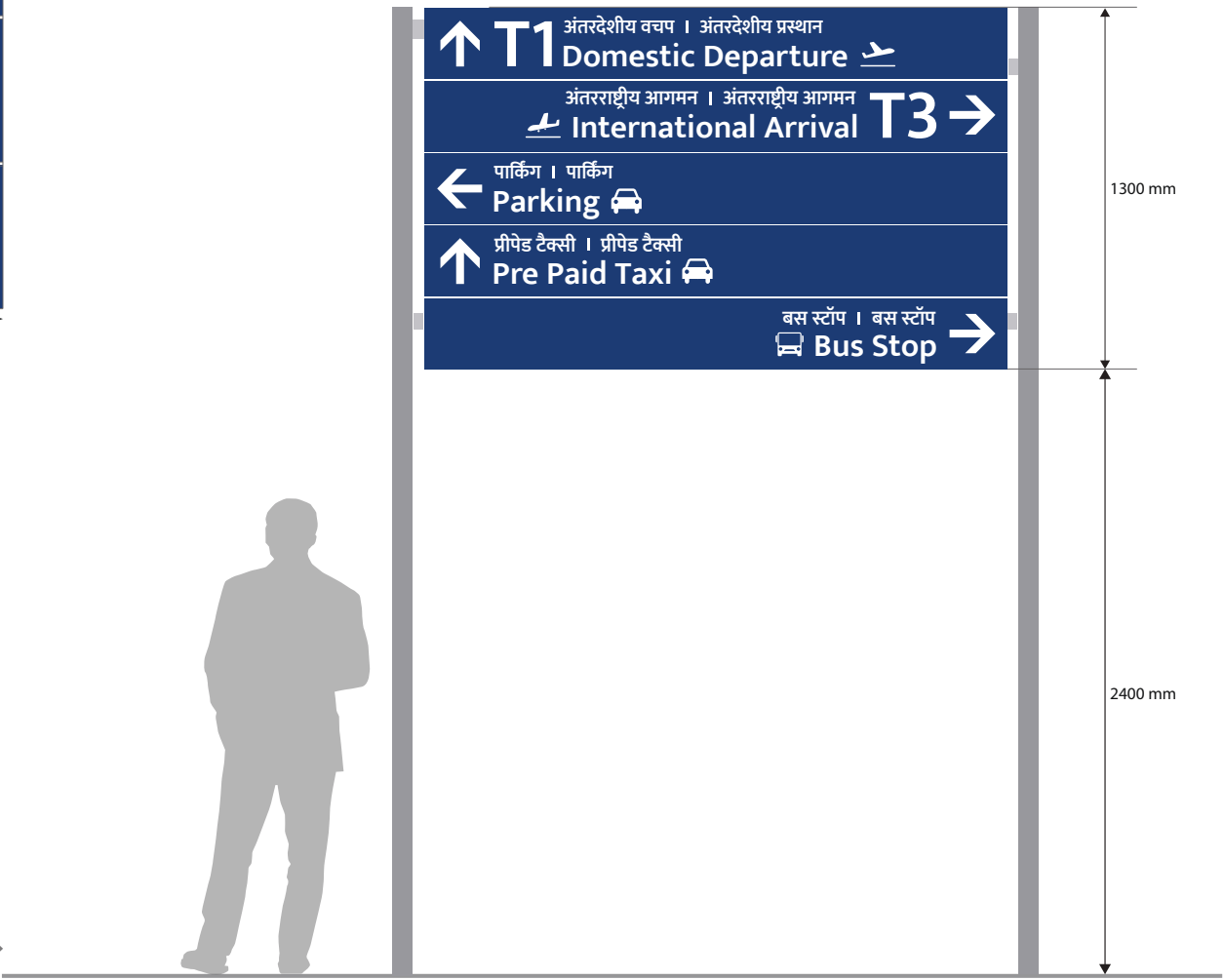
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





Sign Face Artwork ▲

Sign Front Elevation ►



Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Traffic Statutory Sign

Principle

Signs placed on internal roads of Airport to enforce discipline for vehicular traffic and deliver relevant information. The sign height is 2700mm, with the sign panel/face mounted at 2100mm from finished floor level.

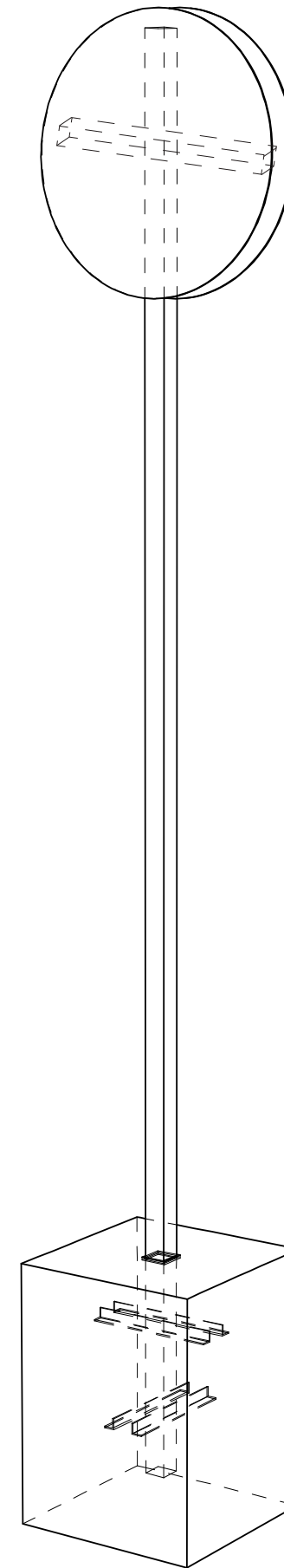
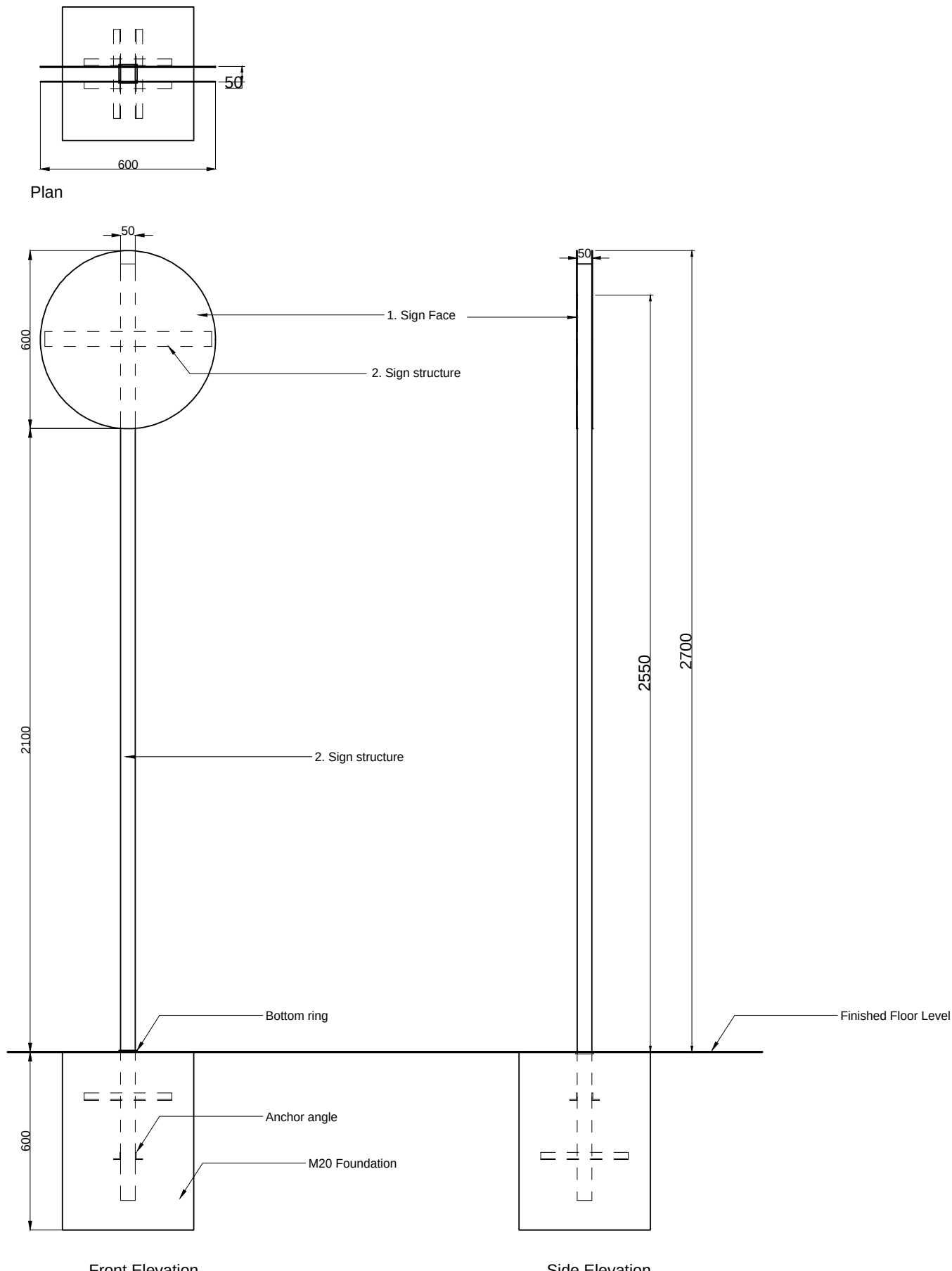
Material Specification

1. Sign face - 3mm thick aluminium on two sides of the sign structure with a white retro-reflective film and vinyl matching red Pantone 032C and black Pantone 6C.
 2. Sign structure - MS square post 50x50, grouted in ground to receive 50x50x570mm horizontal MS square section at the top to fix the sign face.
- All hardware used for fixing of sign shall be Stainless steel.
Secret fixing methods should be used to fix parts together.
Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

Keynotes:

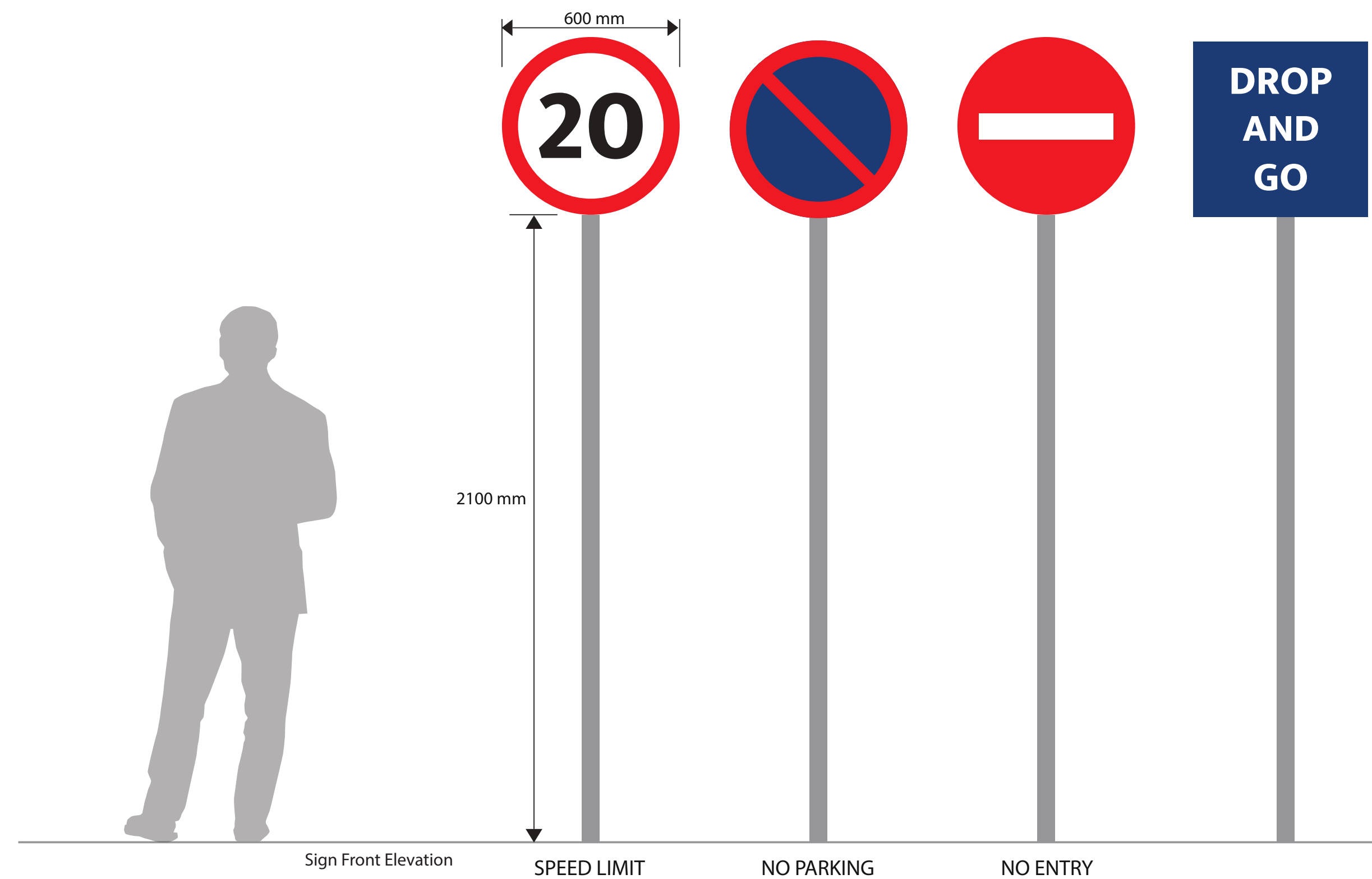
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Perspective



Note:
Artworks to be taken from the open file provided by the signage consultant.



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Traffic Information Sign

Principle

Tarffic Information Sign:These are the two types of signs used in parking areas .Type 1 is placed on toll booth / wall,Type -2 is Floor mounted used to declare the information like parking charges as per the type of vehicle and other statutory information.

Material Specification

1. Sign Frame : 25 x25 M.S. Frame hotdipped galvanized

2. Sign Face: 3mm thick aluminium on two sides of the sign frame with graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retroreflective vinyl. The size of the sign is A0 (841 x 1189 mm).

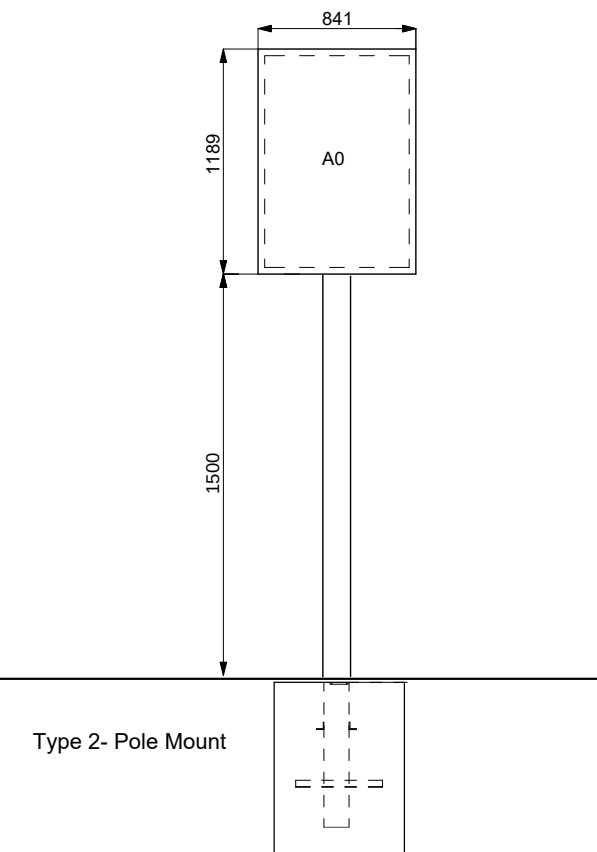
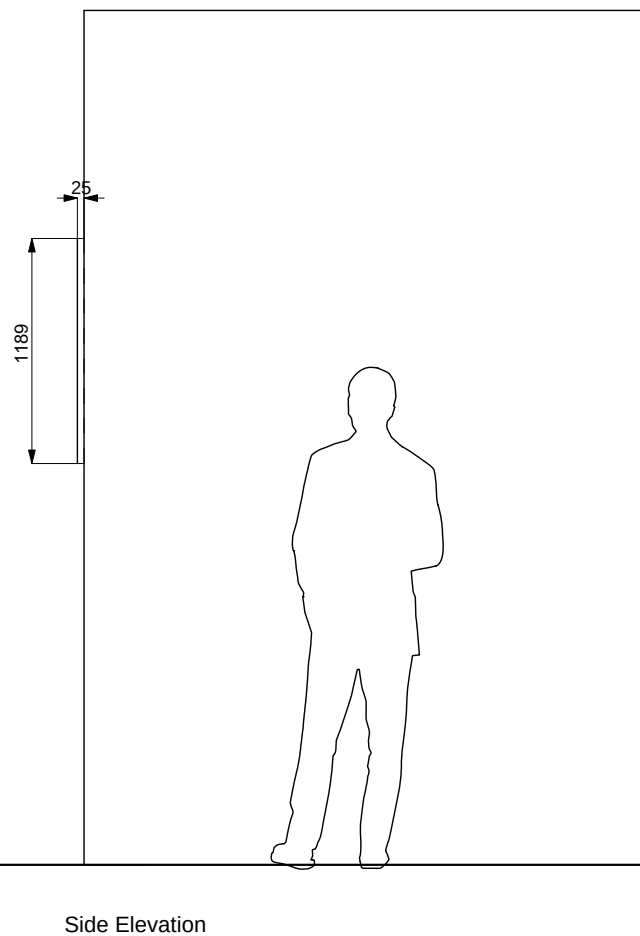
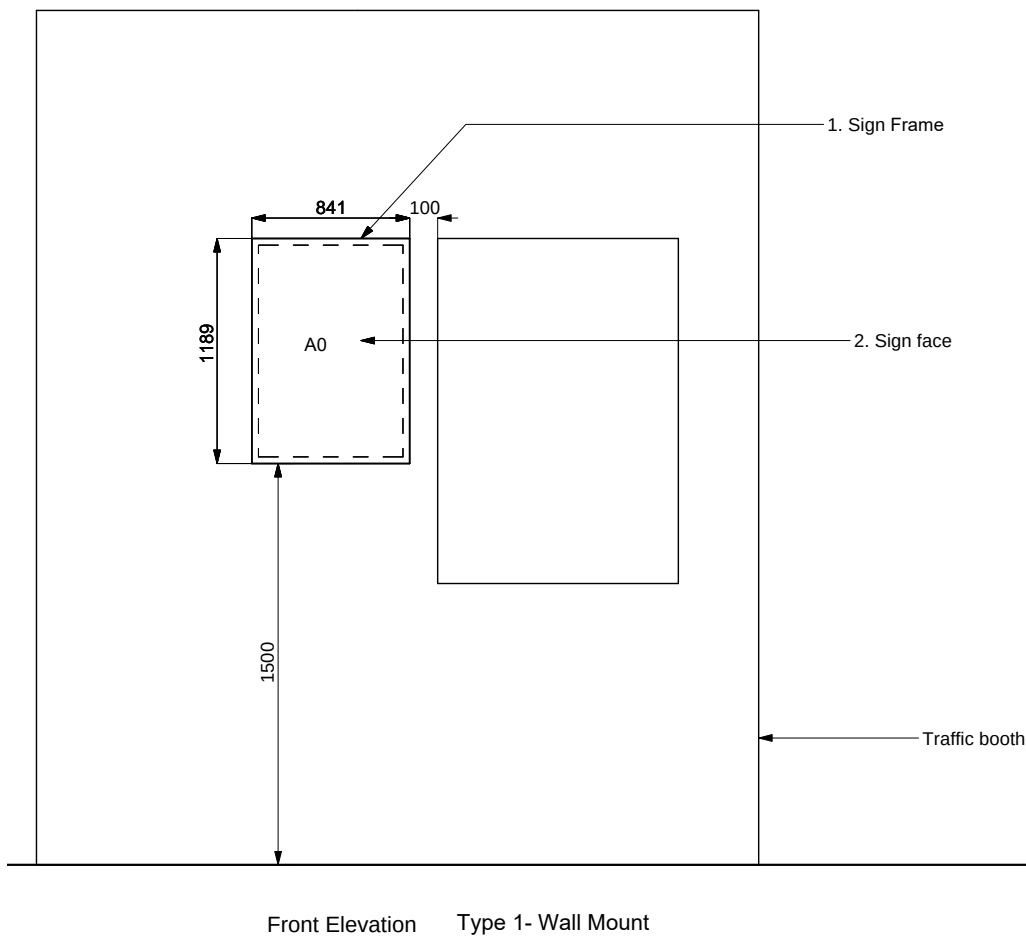
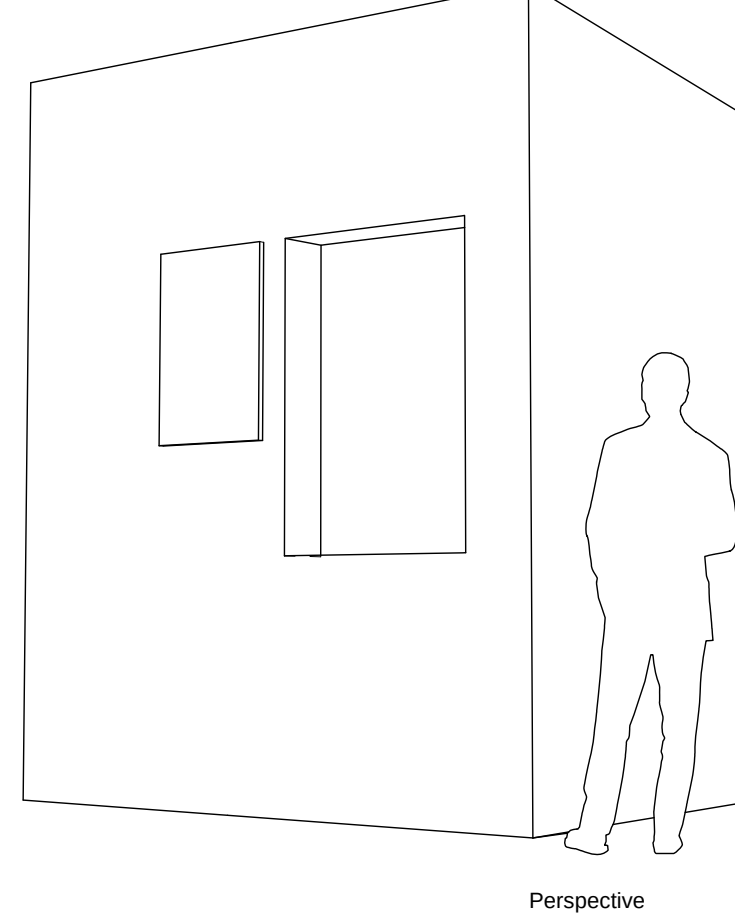
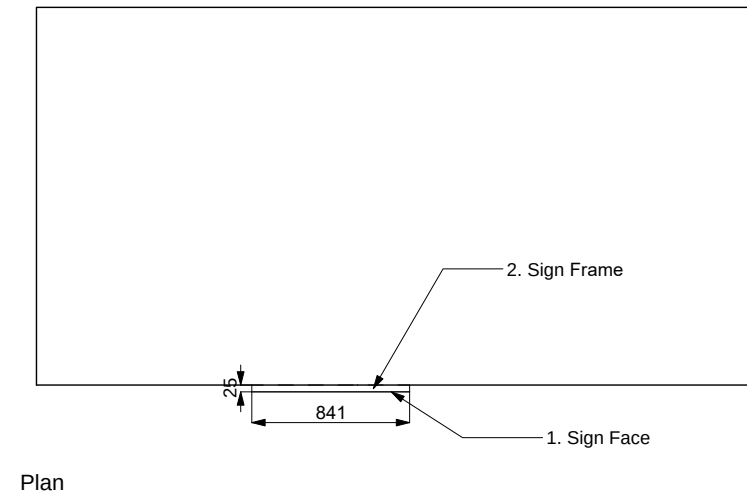
Incase of type 2 pole should be of 75mm x75 mm

Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

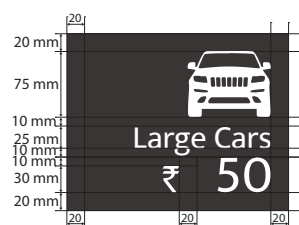
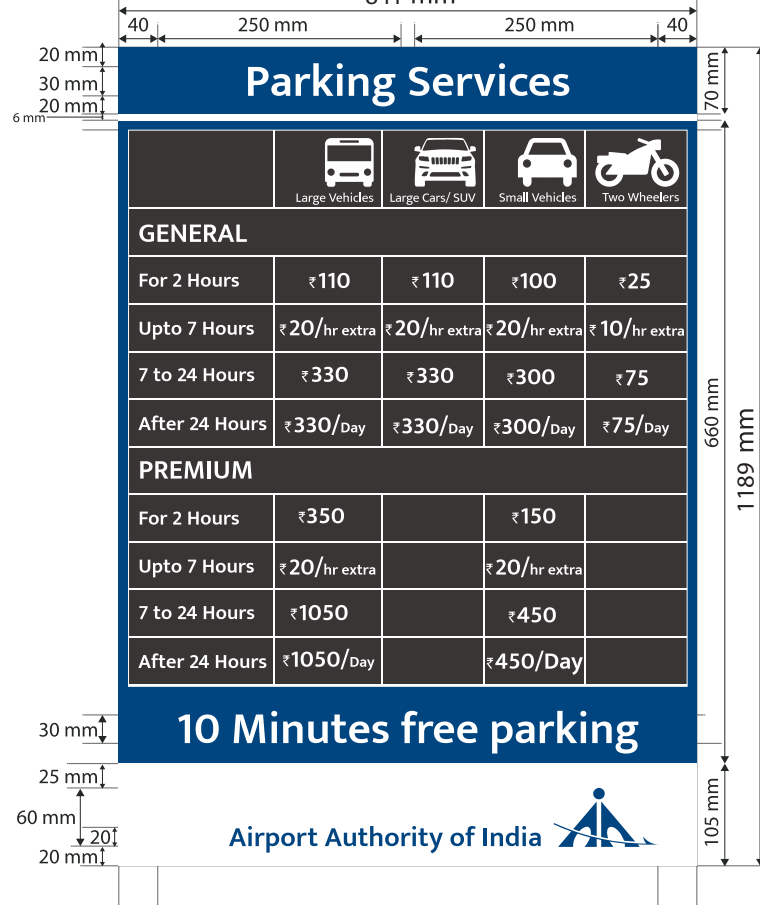
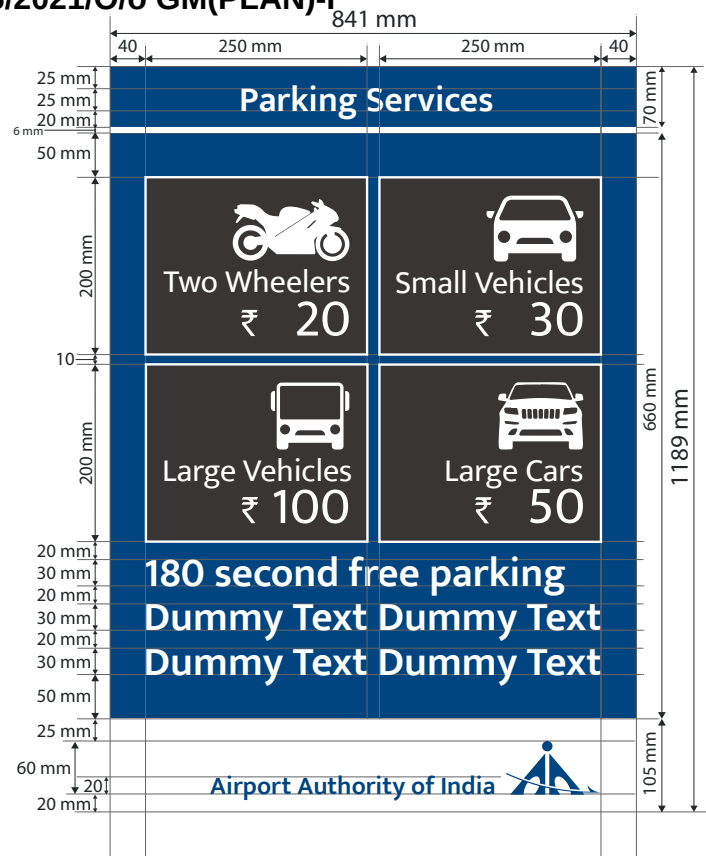
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Traffic Information Sign

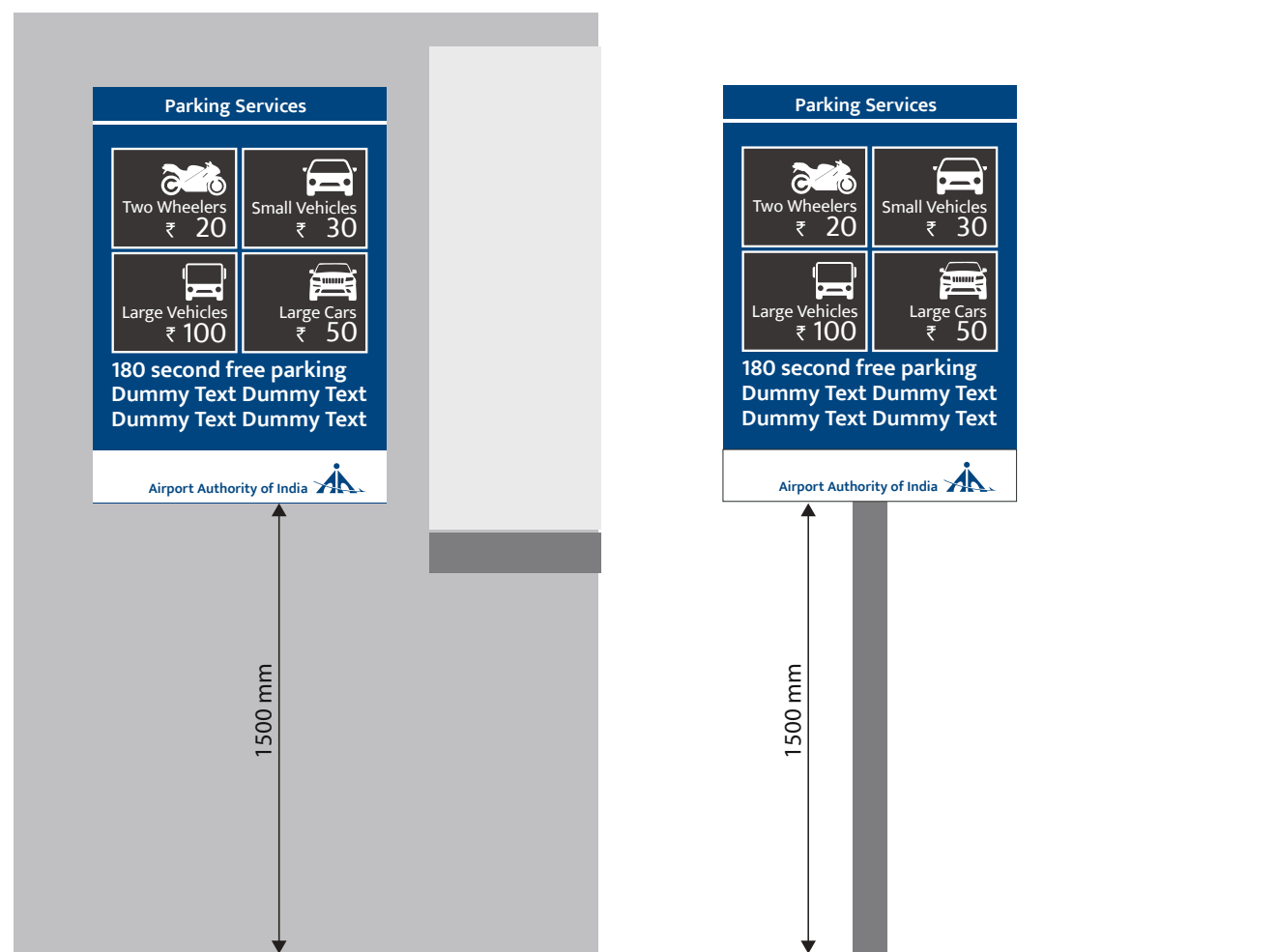
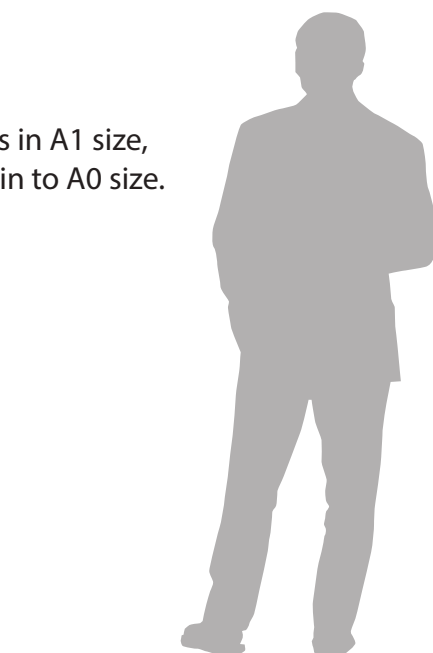
Note:
Artworks to be taken from the open file provided by the signage consultant.



Sign Face Artwork

Note: The above artwork is in A1 size,
This should be converted in to A0 size.

Sign Front Elevation



Type 1 : Mounted on wall of Guard Room

Type 2 : Mounted on Pole

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Airline Listing - Directional

Principle

Signs for directing the departure passenger crowd flow towards entry points. The sign is flag-mounted on a pole, with the sign bottom being 2800 mm above the floor level.

Material Specification

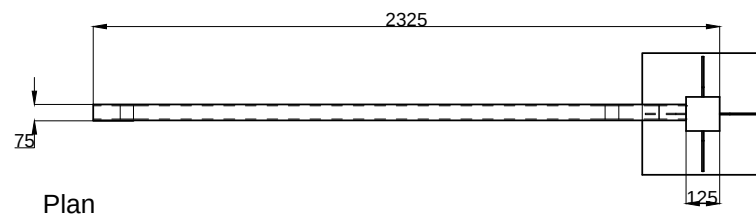
1. Sign face - Both sides 3mm thick aluminium with a white retro-reflective film, fixed on sign frame. Graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retroreflective vinyl from both sides.
2. Sign frame - M.S. frame 50x50mm hotdipped galvanised to receive the sign face as shown in drawing
3. Sign structure - MS square post 125x125 is grouted in ground receiving horizontal single square section of size 75x75mm at the top. Square sections 50 x 50mm used to fix the sign frame with post & horizontal section. MS square post and all sections to be hotdipped galvanised and PU Painted to match RAL 9006. Secret fixing methods should be used to fix parts together.
4. Cover plate - 225x225mm, 5 mm thick cover plate mounted on the flooring. Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

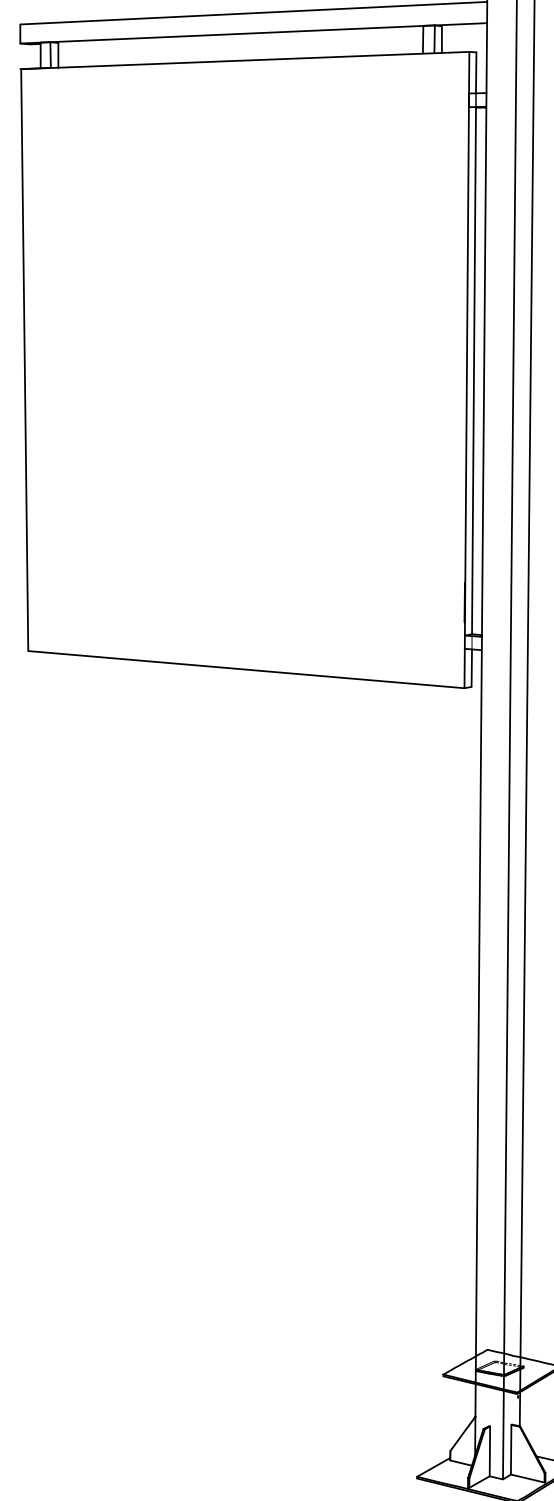
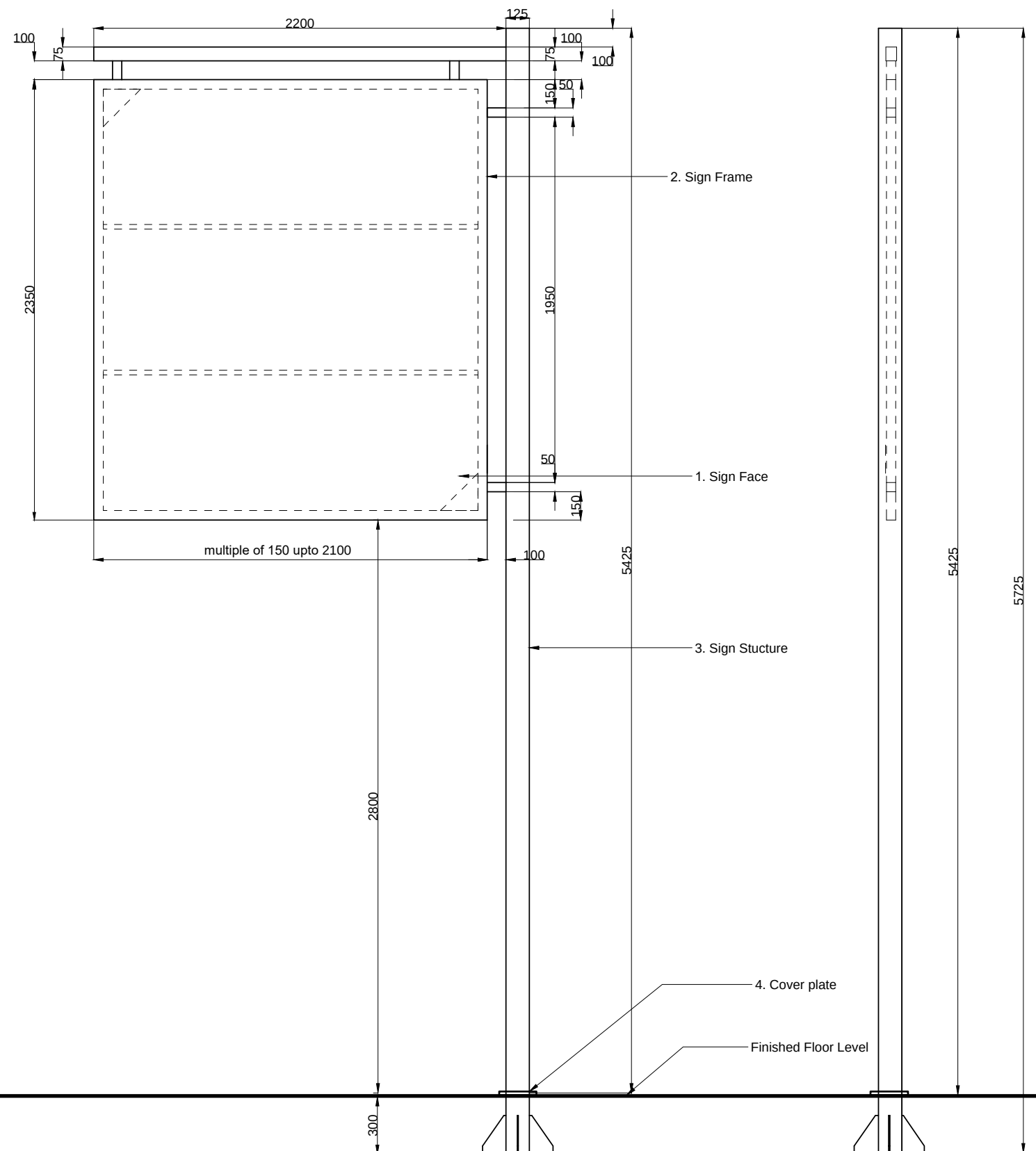
In case of more number of airlines than 6 need to be put, Only logos without airline names can be used.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Plan



Perspective



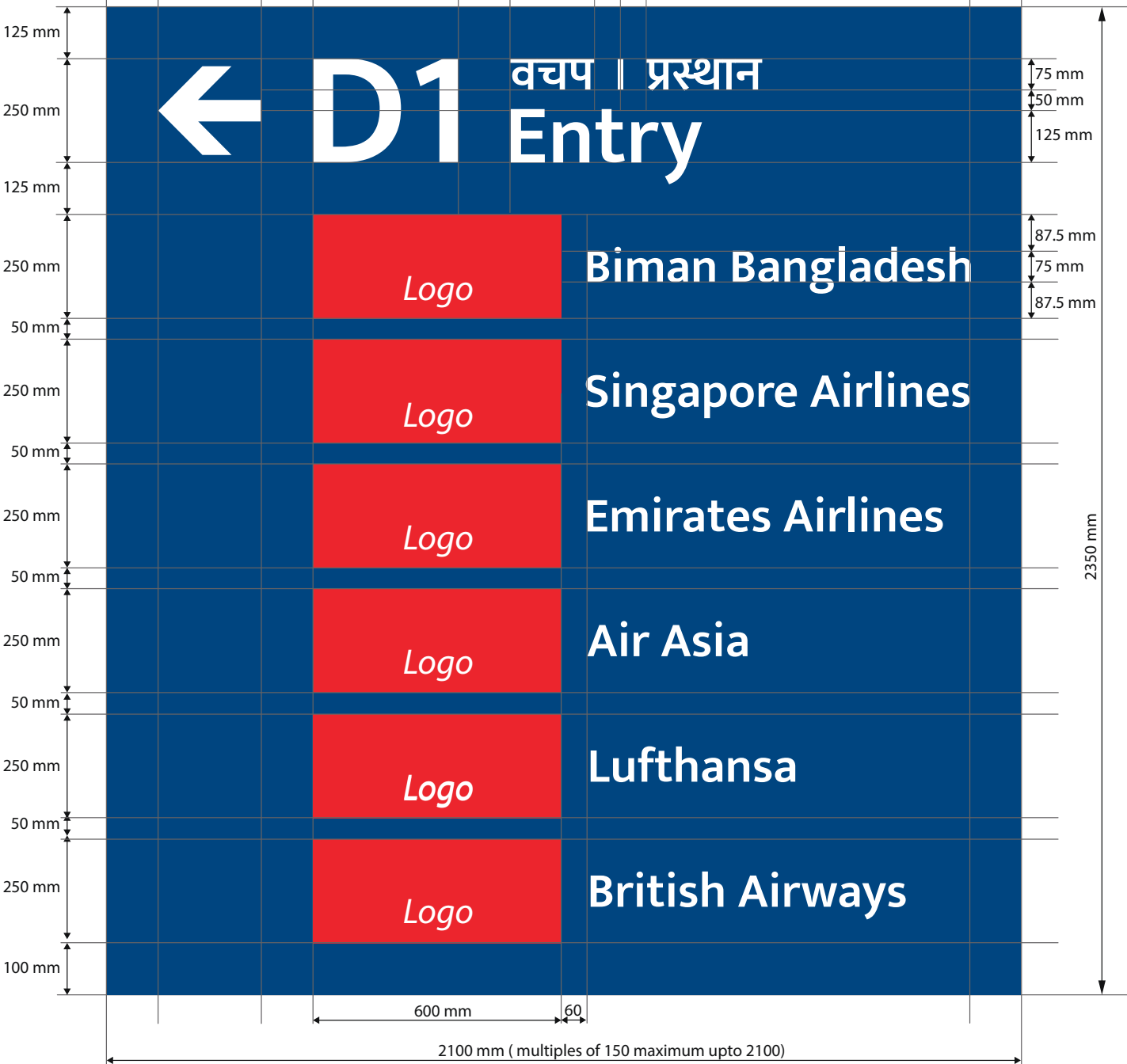
Note:
Artworks to be taken from the open file provided by the signage consultant.

D1 denotes the departure gate number.

The final artwork as per the content approved by AAI Shall be created by signage contractor and submitted for approval before production.

Sign Adaptability as per Site Conditions:
In case of more number of airlines than 6 need to be put, Only logos without airline names can be used.

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



Do's

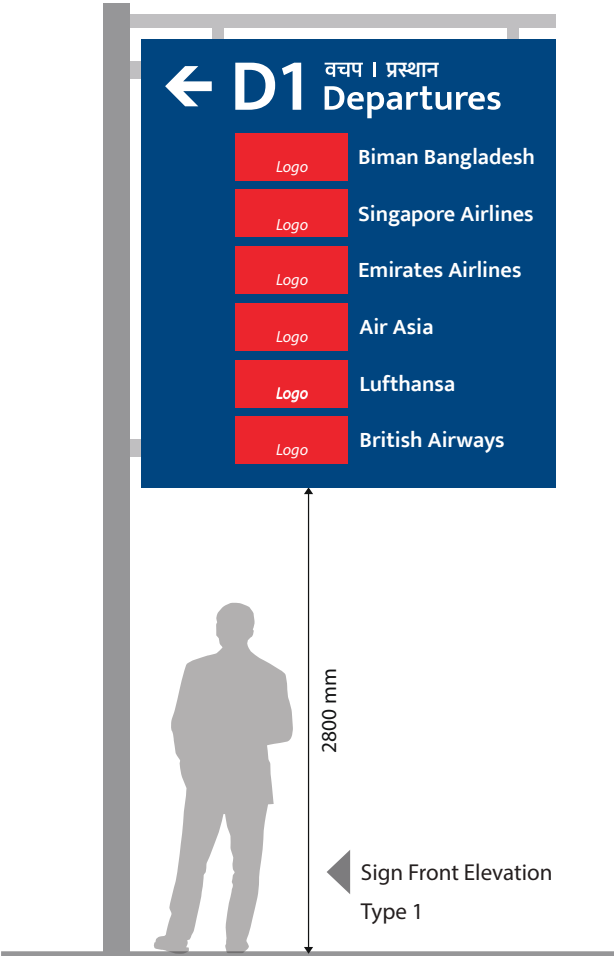


Dont's

Dont's



Type 2



1.5b Airline Listing - Announcer

Principle

This sign communicates designated airline carriers near every entry point. The sign is in form of a triangular totem with height 3600 mm and 865mm as a side.

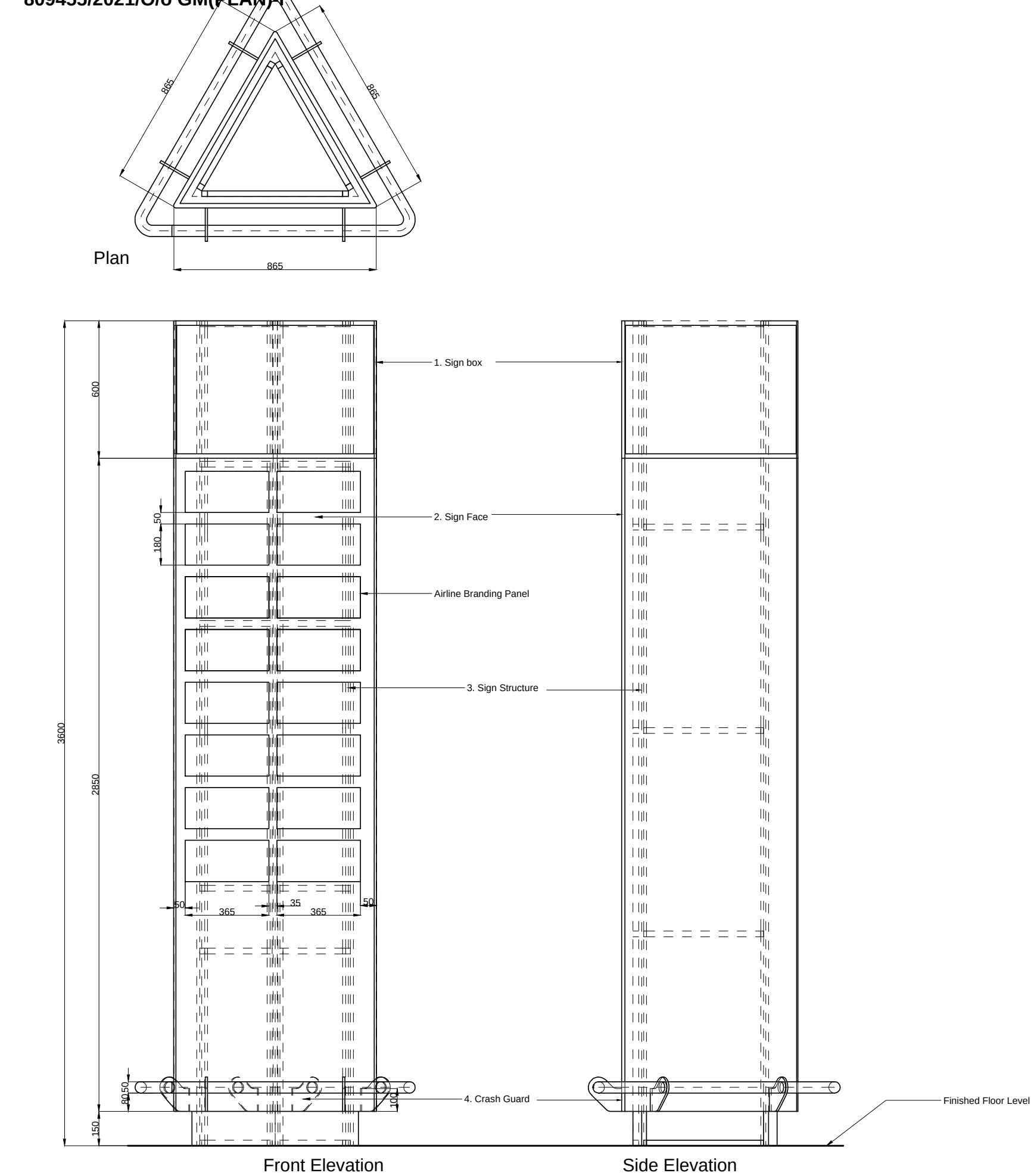
Material Specification

- Sign Box: Laser cut Bent Fabricated in 040 white translucent acrylic 8mm thick with pantone yellow C .Vinyl pasted on it with backlighting.
 - Sign face - 3 mm thick aluminium fabrication mounted on the sign structure with black RAL 9011 powder coating with a provision of through and through laser cutting for airline branding panel. Airline branding panel : printed media vinyl pasted on 8mm thick 040 White translucent acrylic with a backlit provision. Airline branding panel is provided on two sides of sign box. Third side shall have a provision for maintenance door.
 - Sign structure - MS square post 50x50mm, hot dipped galvanised and PU Painted to match RAL 9006 grouted in ground to receive the triangular aluminium fabrication sign box.
 - Crash Guard - Protection for sign from trollies ,wheeled baggage in 50 mm dia stainless steel brush finished pipe fixed with 8 mm SS plate brackets
- All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.
- Lighting: All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.
- Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

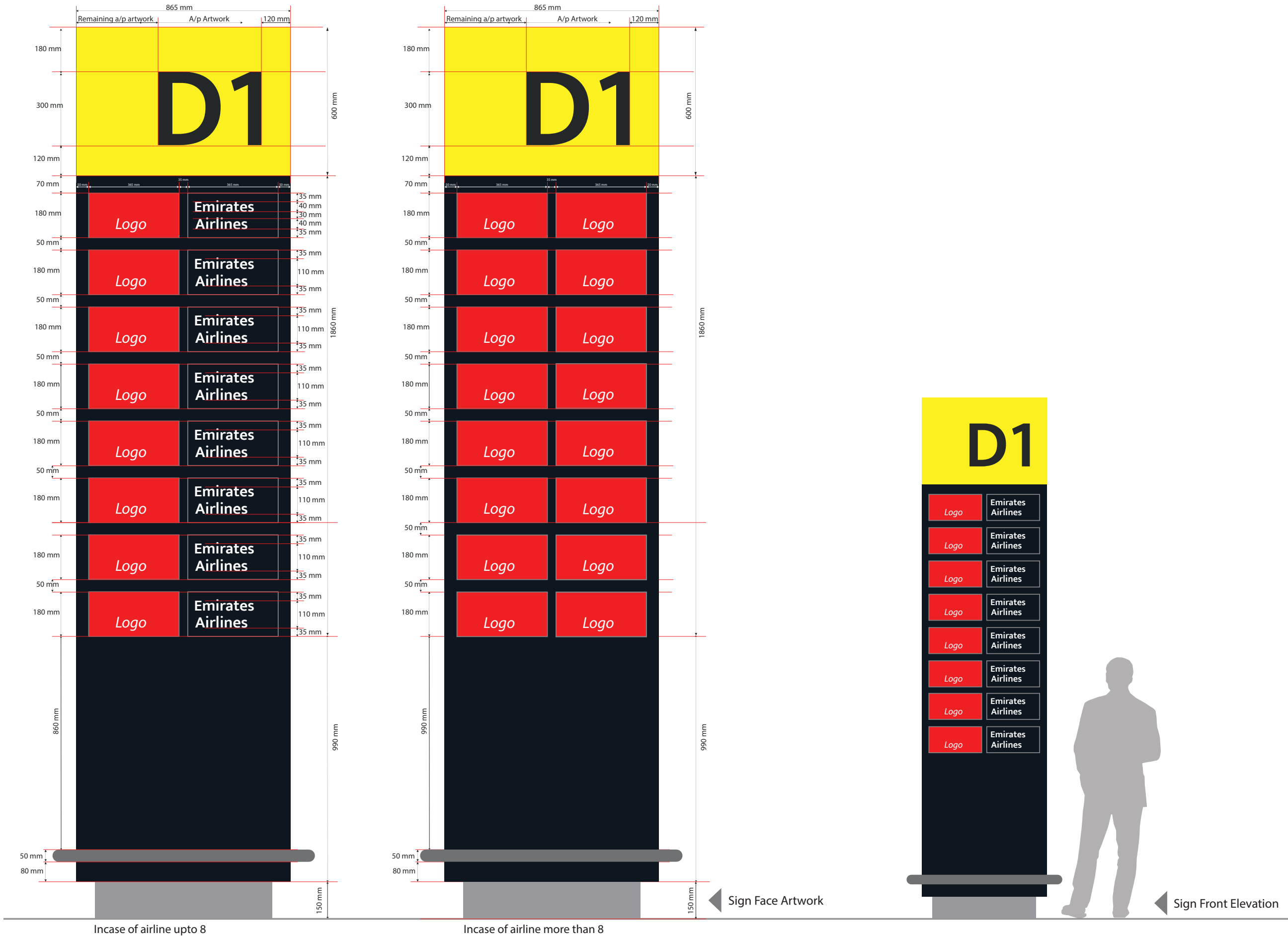
Sign Adaptability as per Site Conditions:
 Minimum number of rows for airline if 6 If airline numbers are less than 6 remaining rows will be blackout.
 - Maximum number of rows for airlines to be put is 8 .
 Only logos without airline names can be added if airline is more than 8.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



1.5b Airline Listing - Announcer



Note:
Artworks to be taken from the open file provided by the signage consultant.

D1 denotes the departure Entry number.

The final artwork as per the content approved by AAI Shall be created by signage contractor and submitted for approval before production.

Sign Adaptability as per Site Conditions:

"Number of rows for airlines provisioned is 8. If number of airlines assigned is lesser, than logo with airline names will be used. In case the number of airlines is more than 8, only logos without airline names can be added, as shown. The remaining/blank slots to be blocked out with opaque black vinyl.

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Arrival/Departure Zone Marker

Principle

Signs for marking the Arrival/Departure zones.
Placement: Type-1 The sign is mounted from the ceiling using a suspension rod, Type-2 mounted over a pole if suspending is not feasible. The bottom of the cube is at 6000 for type 1 (ceiling hung) and 2800mm higher from the floor finish level for type -2 (pole mounted).

Material Specification

1. Sign Face – Entire Sign face all 4 sides, to be made of high quality flex printed with Pantone Yellow C , with the letters/pictogram printed in Pantone Black 6C .To be mounted onto sign frame using appropriate clips and edge ties to be perfectly taut with no sagging.

2. Suspender/Pole - Stainless steel circular hollow section 100mm OD 304L brush finish mounted on slabs/beams/walls. (incase of type -2 pole is a circular hollow section 100mm OD 304L brush finish mounted on floor.)

3. Sign Frame-25mm x 25mm m.s. square sections welded together to form a framework.
4. Stretching member-8mm thick acrylic strip fixed to the sign frame to help stretching the sign face.

Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

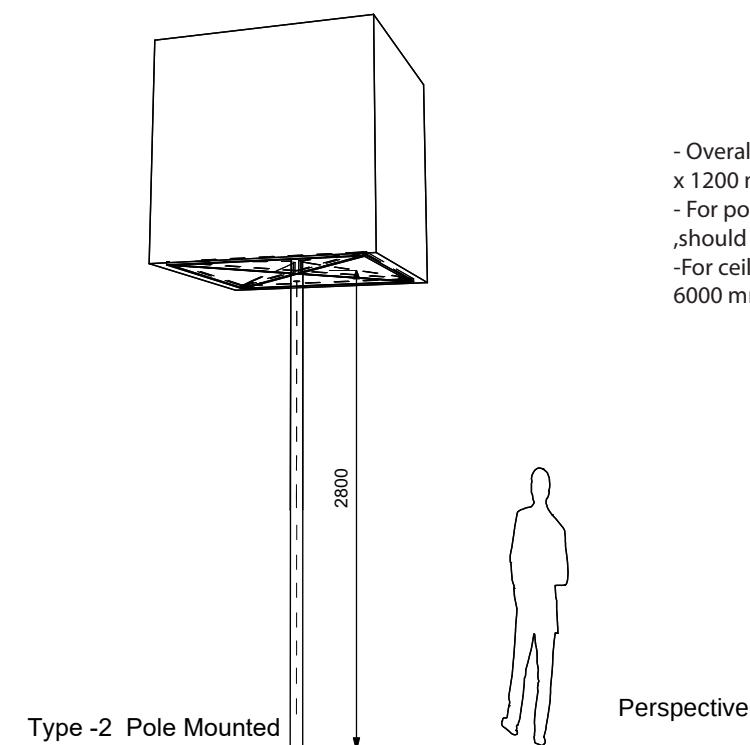
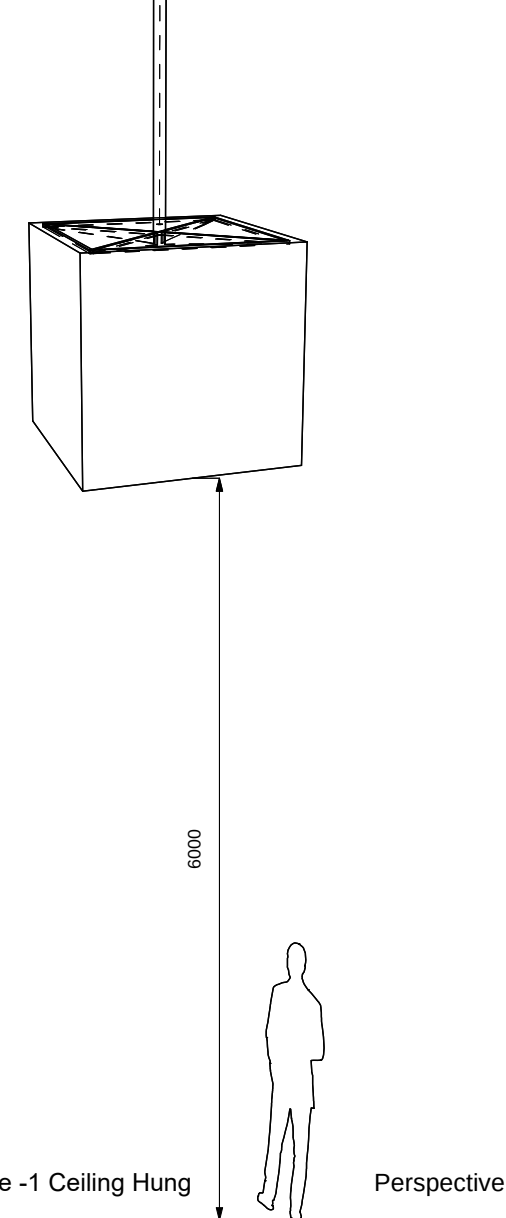
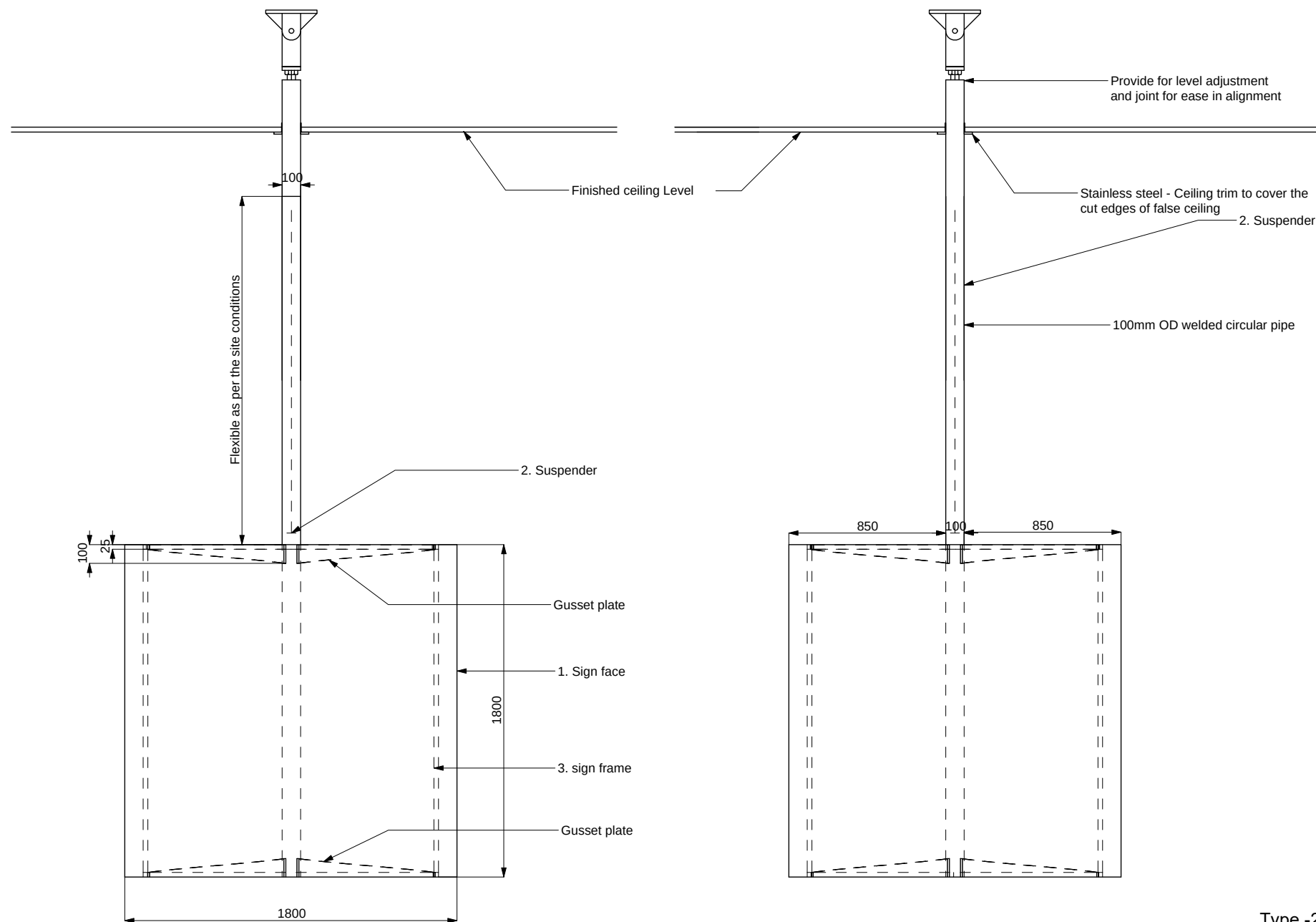
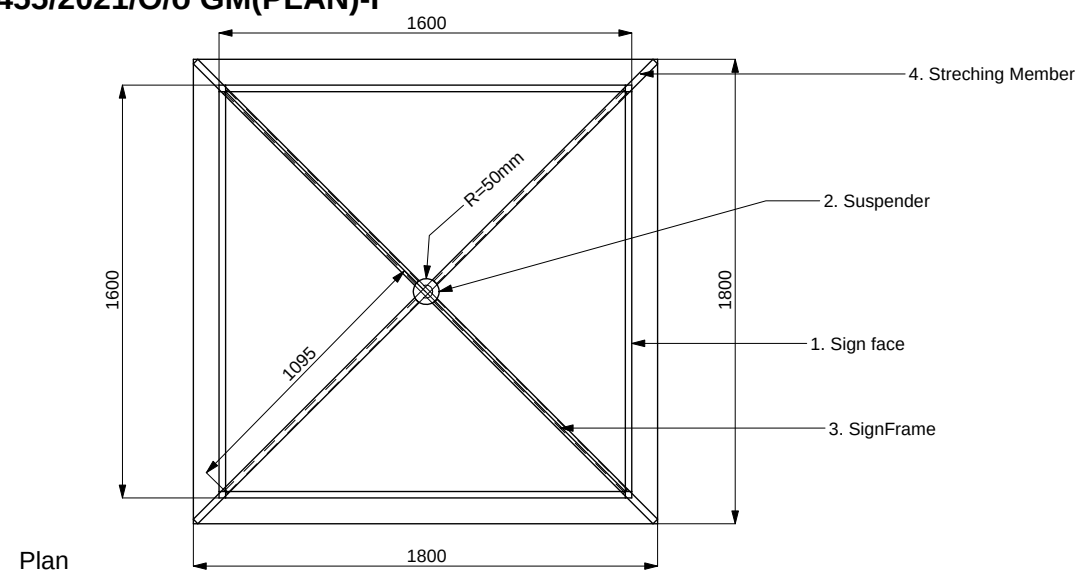
Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

- Overall dimensions of sign face varies between 1200 x 1200 x 1200 mm to 1800 x1800 x 1800 mm.
- For pole mount sign ground clearance should be 2800 ,should not come below 2400mm.
- For ceiling hung sign Minimum ground clearance should be 6000 mm.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





Note:

Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

- Double line text shall be used, in case of the unavailability of the required width.

Keynotes:

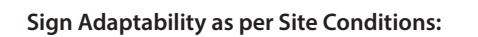
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Principle

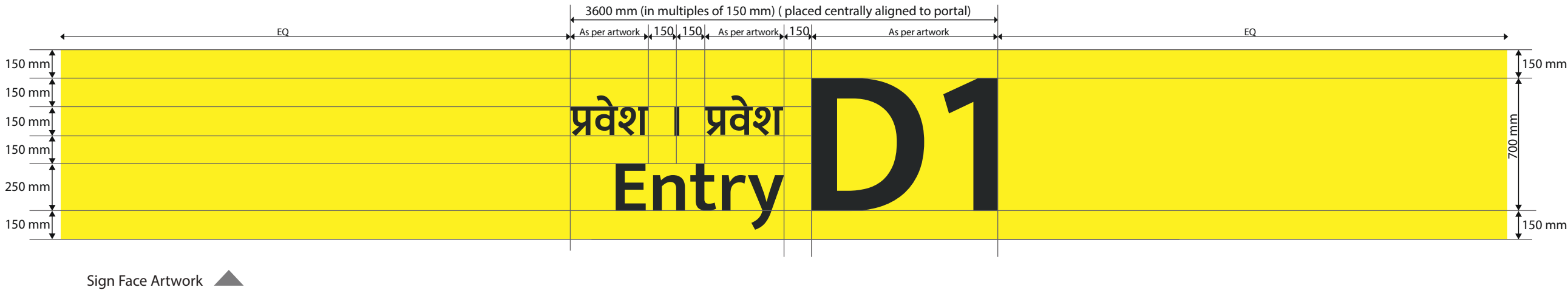
Type 2: in case of no portal at the entry/exit point of the terminal building.

Type - 2 : In case of no portal, 55 mm wide portal has to be fabricated with the internal structural frame to be made from 50 x 50 x 2 mm MS box section hot-dipped galvanized PU Painted in colour RAL 9006 and 3mm thick ACP, matching with Yellow Pantone C

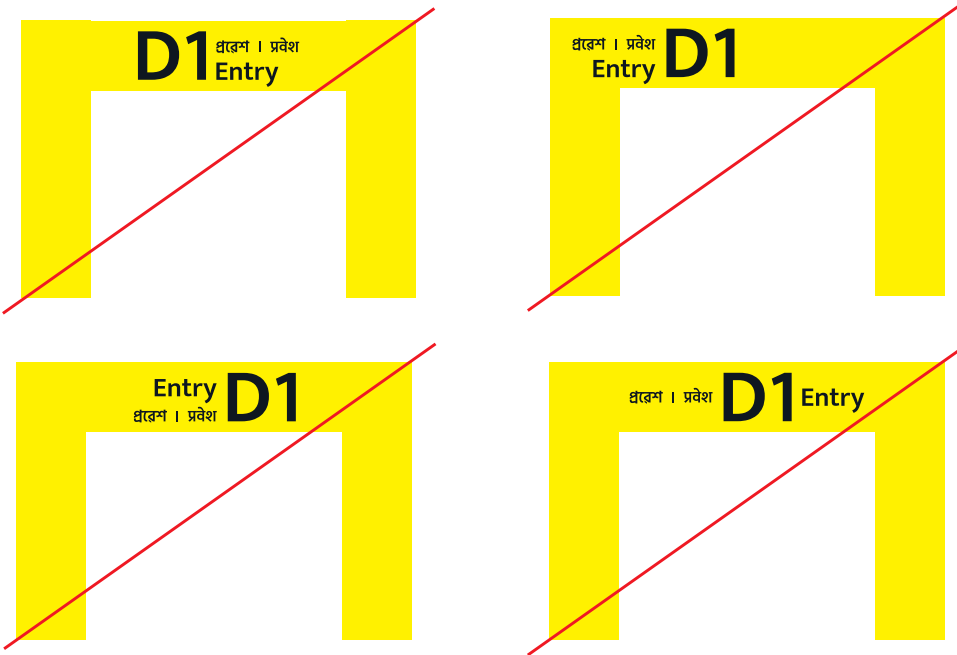
Secondary Letters: 10mm thk 2D solid letters in black glossy acrylic .



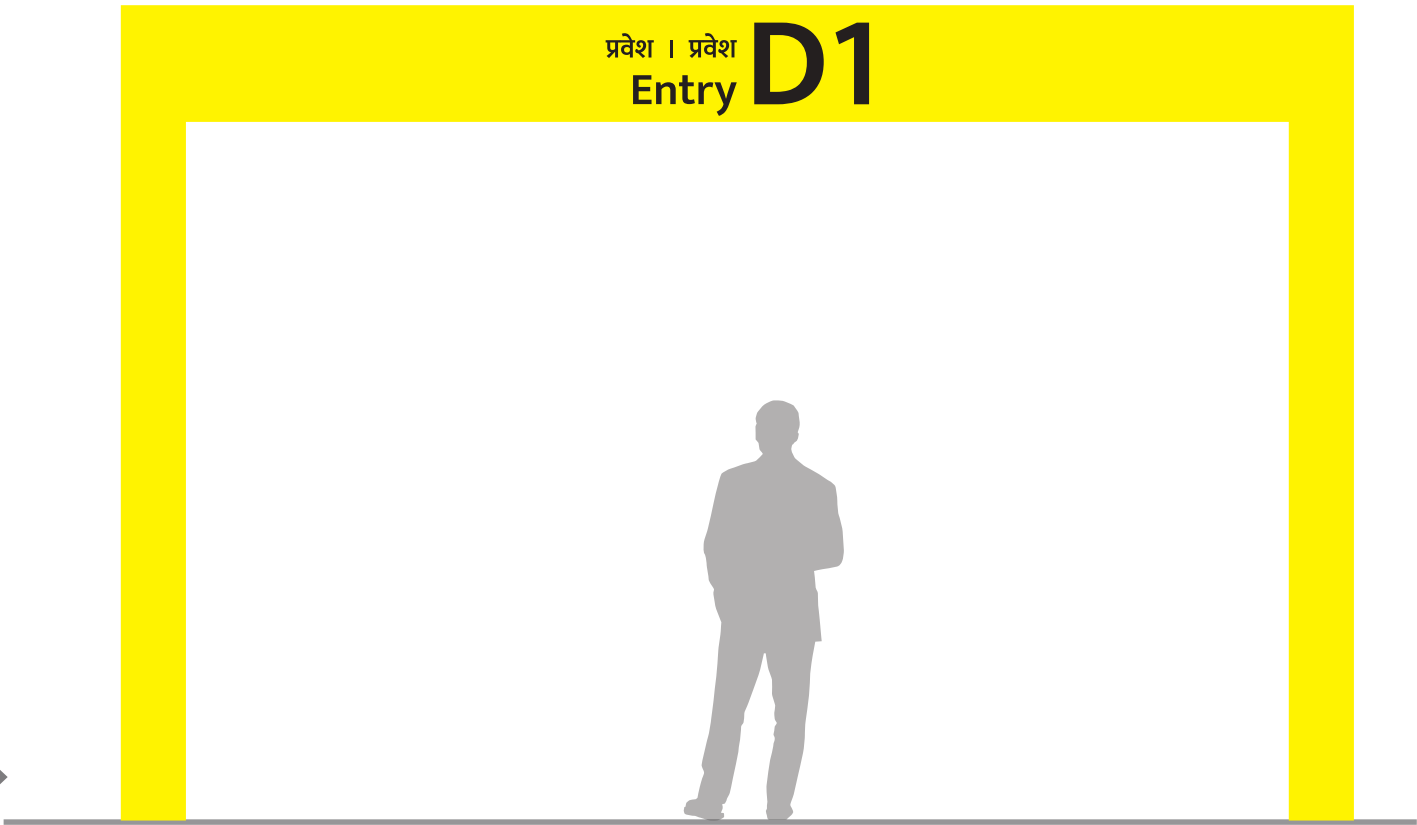
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Note:
Artworks to be taken from the open file provided by the signage consultant.



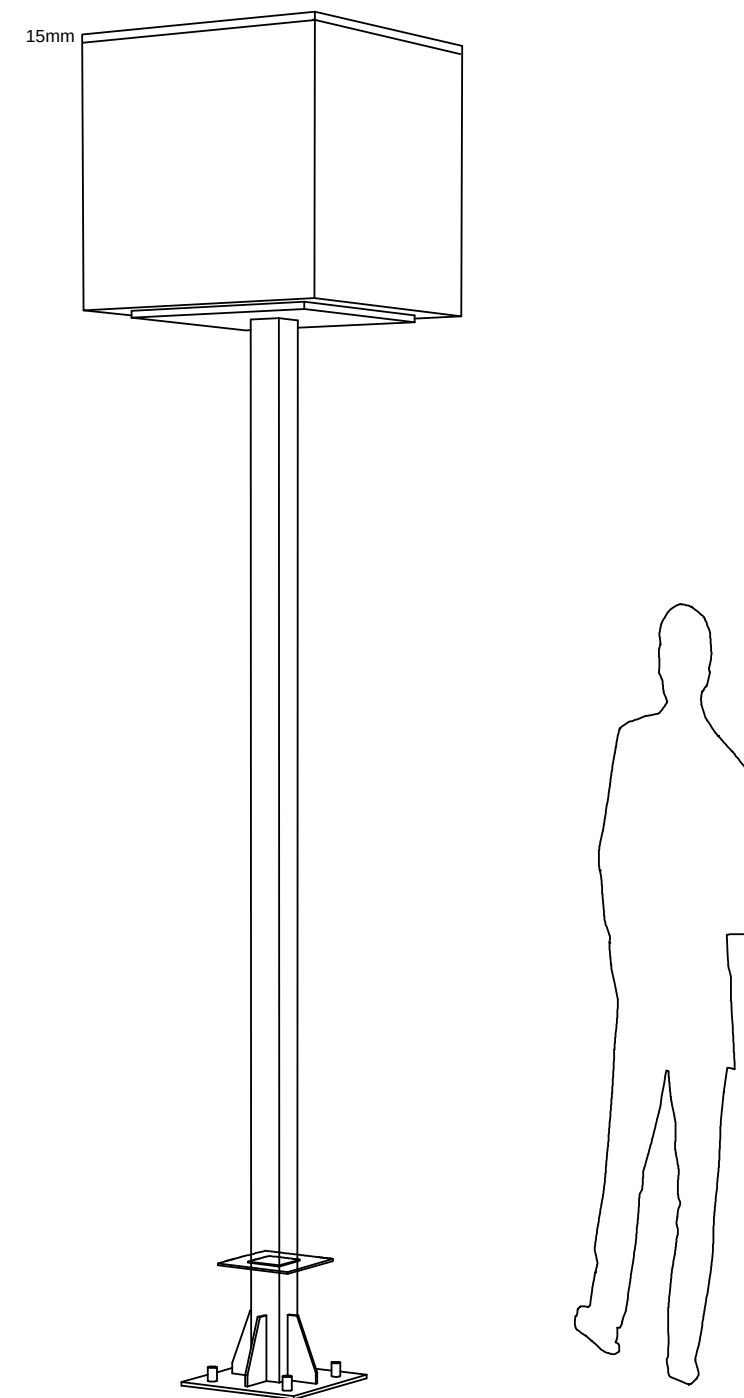
Sign Front Elevation



Sign Adaptability as per Site Conditions:

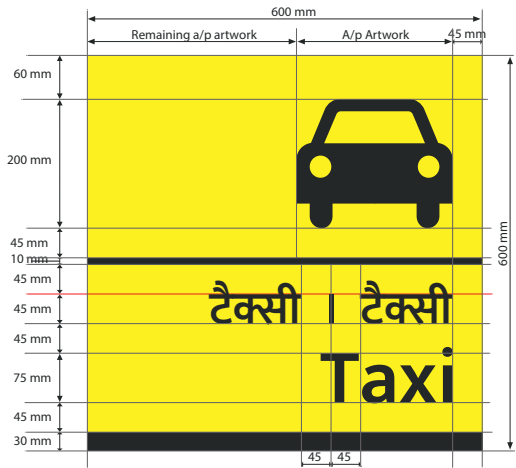
Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

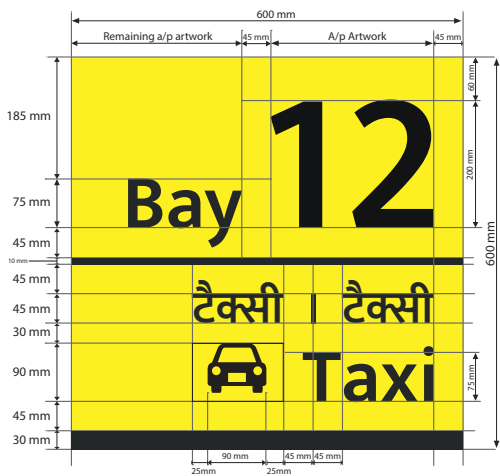


Annex-1 Pg 56

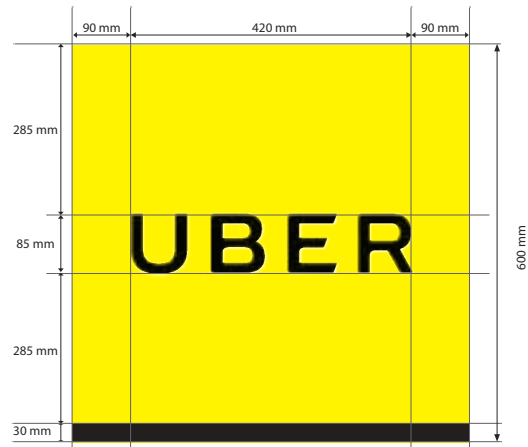
Note:
Artworks to be taken from the open file provided by the signage consultant.



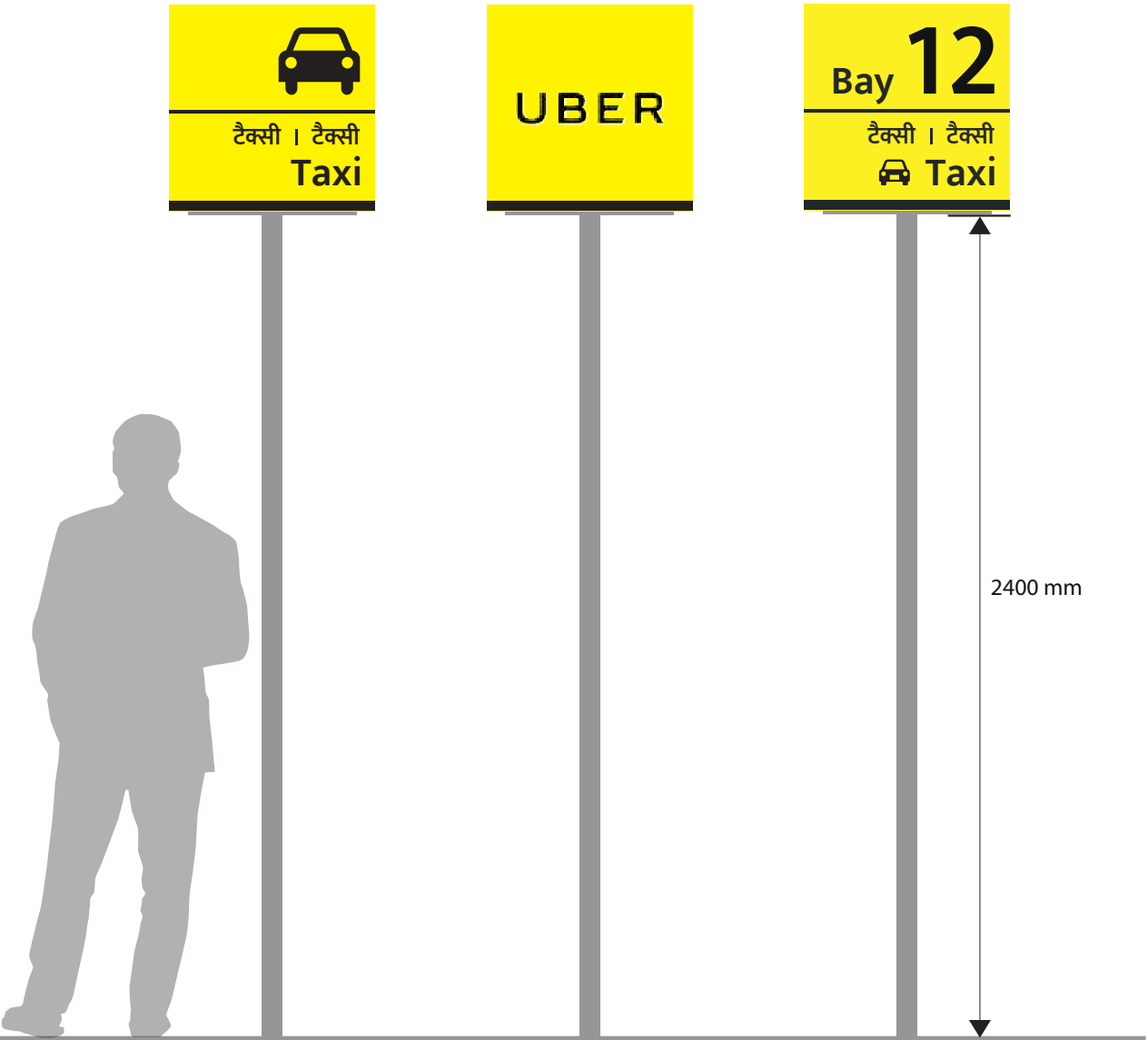
Sign Face Artwork ▲



Sign Face Artwork ▲



Sign Front Elevation ▶



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Facility Announcer- Wall Mounted

Principle

Facility announcer used above the facility window inside the airport terminal counters like tourist information and placed 100mm above the window.

Material Specification : Lit Sign

1. Sign Face - Graphics in Plotter cut Blockout vinyl matching Pantone Yellow C, vinyl for text and border / edges matching with Pantone Black 6C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

2. Sign Frame - 50 mm aluminium extrusion inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.

3. Sign Structure: M.S. square sections 25x25 mm hotdipped galvanised.

Suspender - Telescopic suspender with height adjustment made of Stainless steel 35x35mm Hollow sections mounted on slabs/beams/ walls. All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.

Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

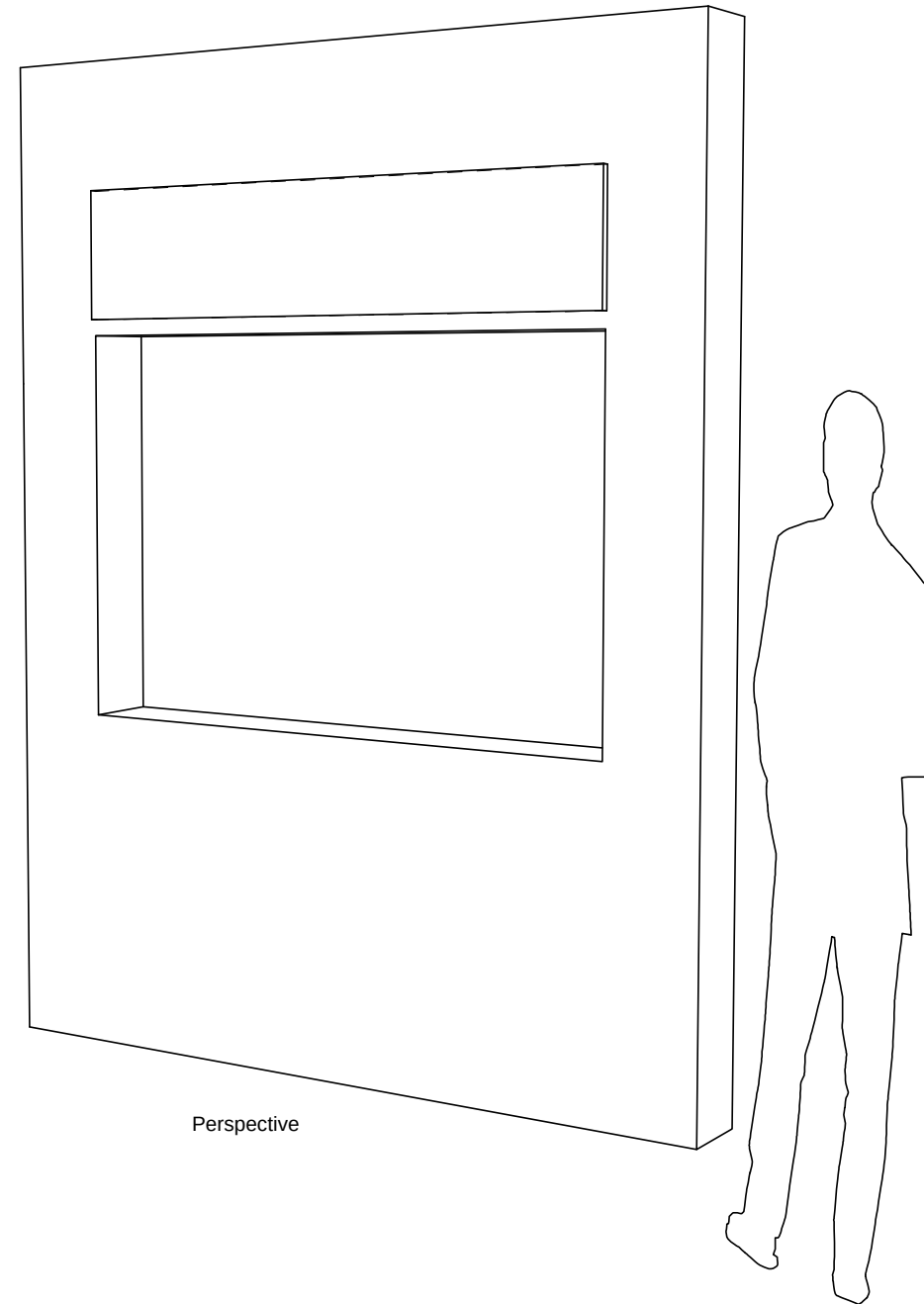
Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

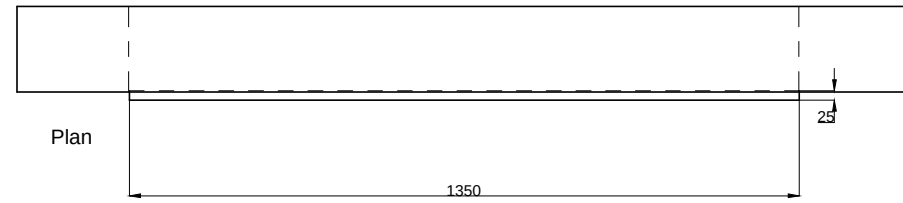
- Alternative fixing shall be a ceiling hung sign hanging from existing structure at the airport. It can also come on the facility providing counters.

Keynotes:

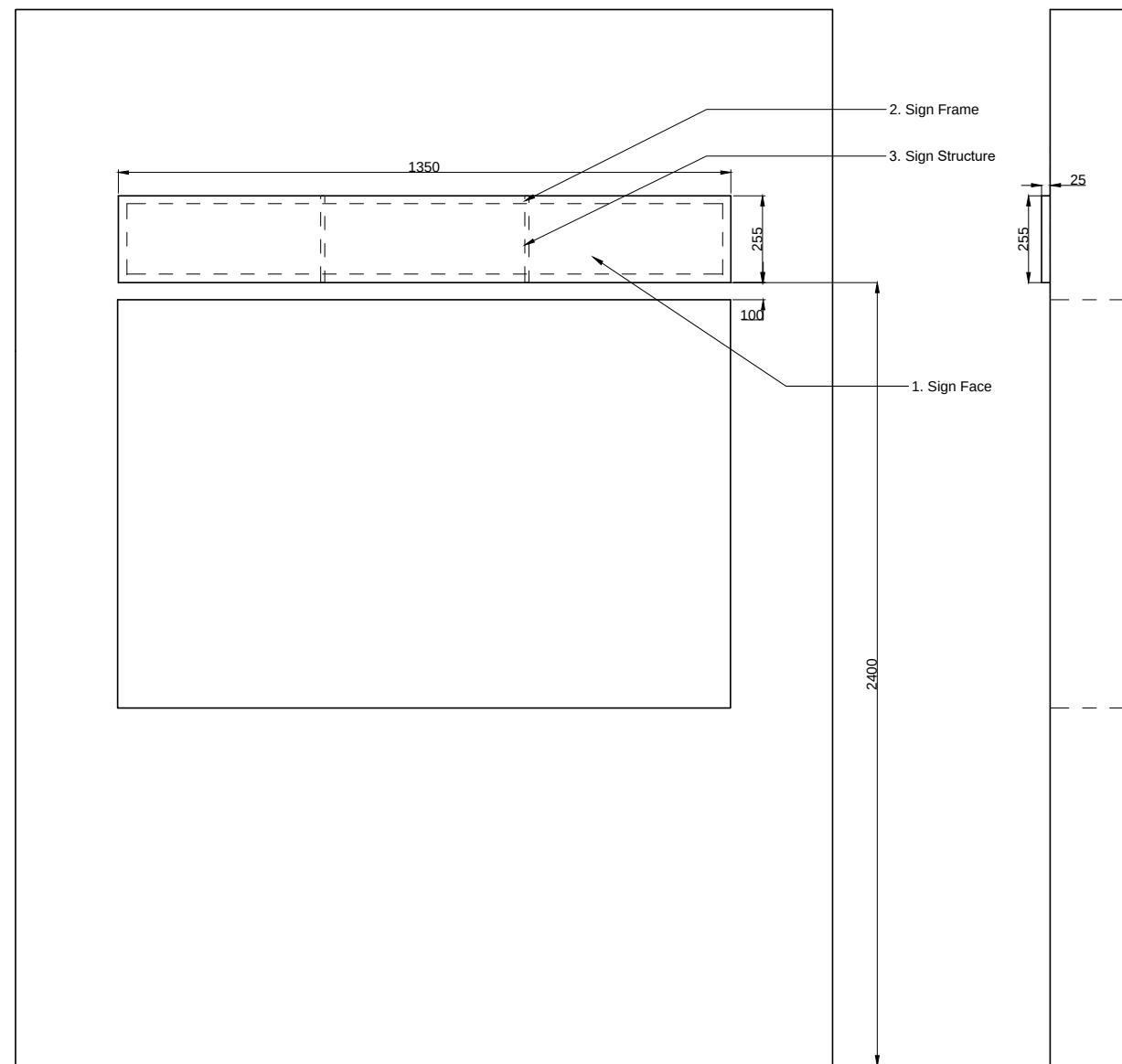
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Perspective



Plan



Front Elevation

Side Elevation



Sign Face Artwork 

Note:

Artworks to be taken from the open file provided by the signage consultant.

Sign Front Elevation 

Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Facility Announcer- Building Mounted

Principle

This sign is placed on the exterior facade of the ancillary building like cargo, etc.

Material Specification

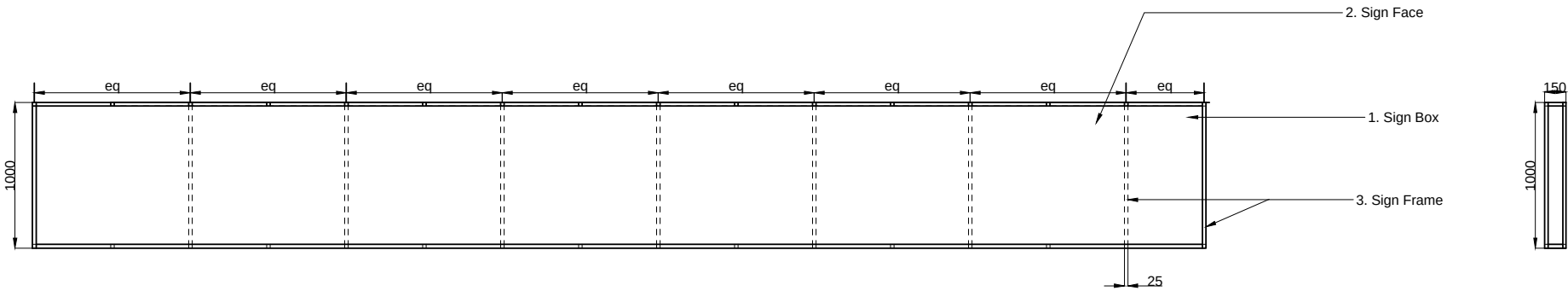
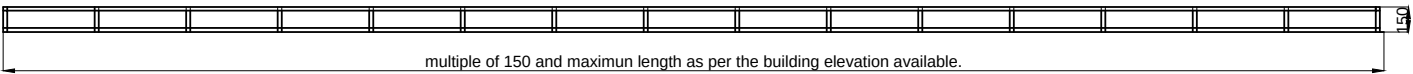
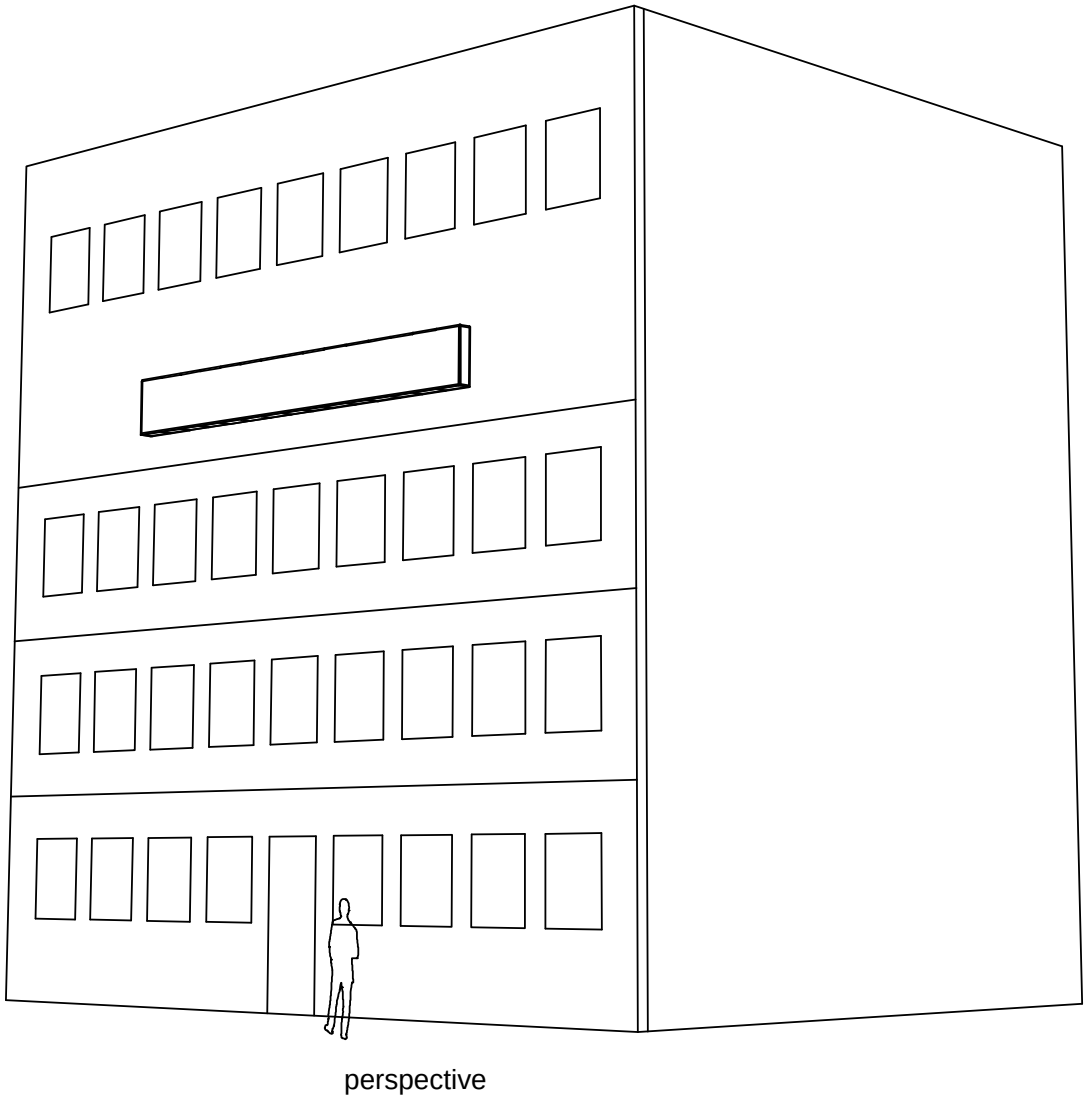
- 1. Sign Box - The sign face shall be made in 3mm thick aluminium (PU Painted in specified blue colour RAL 5013) , router cut, grooved and folded to be fixed with the sign frame. All panels to be fixed from sides using counter sunk screws.
 - 2. Sign face - shall have laser cut profiles (for content) to recieve milky white 5mm thk acrylic sheet from back and shall be provided with backlit LED lighting.
 - 3. Sign Frame - M .S. square sections 25x25mm hotdipped galvanised and powdercoated in RAL 9006.
- Alternative Fixing
- 1. Celing Hung
 - 2. Above the building.
- Suspender - Telescopic suspender with height adjustment made of Stainless steel 35x35mm Hollow sections mounted on slabs/beams/ walls. All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.
- Bird Spikes - UV stabililized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.
- Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

Alternative fixing shall be a ceiling hung sign hanging from existing structure at the airport or on the top of the building.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Side elevation

ation



Note

Arwork Text should be left aligned.
Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Sign Front Elevation ►



Placed on top of building

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Facility Announcers - Passenger Amenities

Principle

Facility announcer is provided to access the passenger amenities like wheel-chair, babystroller etc. It is located near the entry /exit points of terminal building.

Material Specification

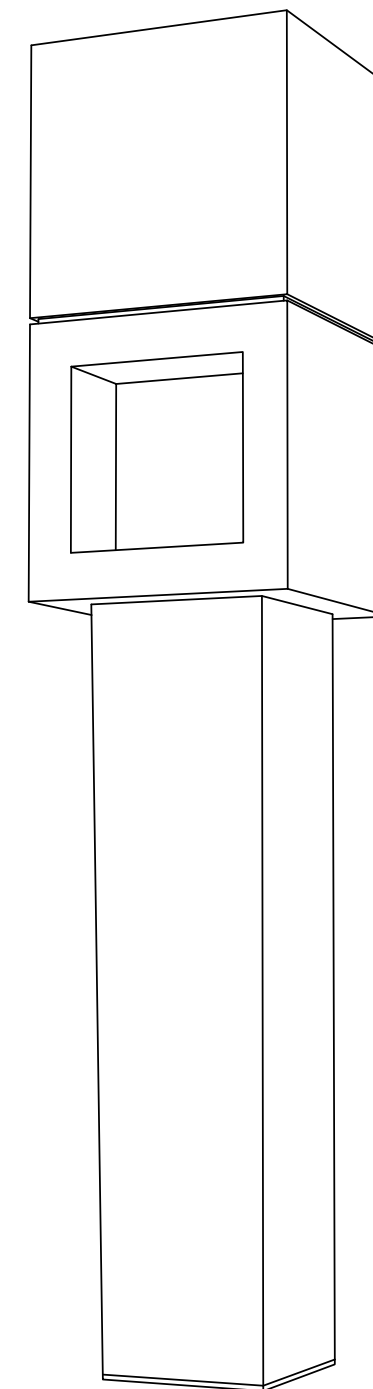
1. Sign Box – Entire Sign face all 4 sides, White translucent 040 acrylic, 8mm thick with backlighting. Graphics in Plotter cut vinyl matching Pantone Yellow C, Blockout vinyl for text matching Pantone Black 6C, pasted over acrylic with white diffuser film on inside face.
2. Sign Face : 3mm thick aluminium fabrication PU Painted mounted on the sign structure with black colour RAL 9011 and provision for concealed wiring/cableing for the required telephone connection in the provided niche.
3. Bottom panel – Bottom MS Panel PU Painted in colour to match Vinyl Black of Pantone Black 6C.
4. Sign Structure - 3 mm thick aluminium sheet fabrication P.U. Painted in Grey colour RAL 9006 and wrapped around the internal frame of 50 x 50 M.S. hollow box section.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

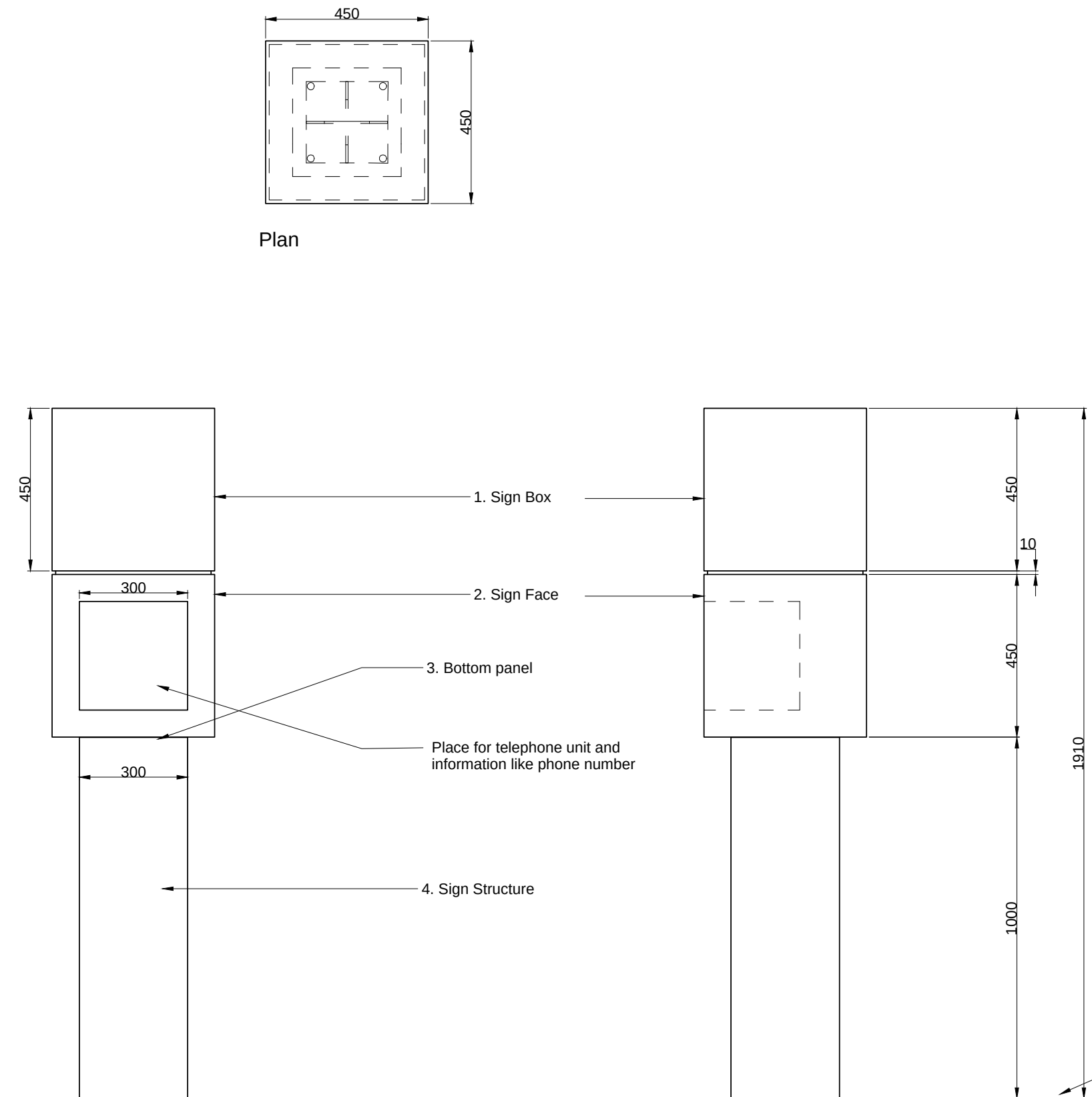
Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



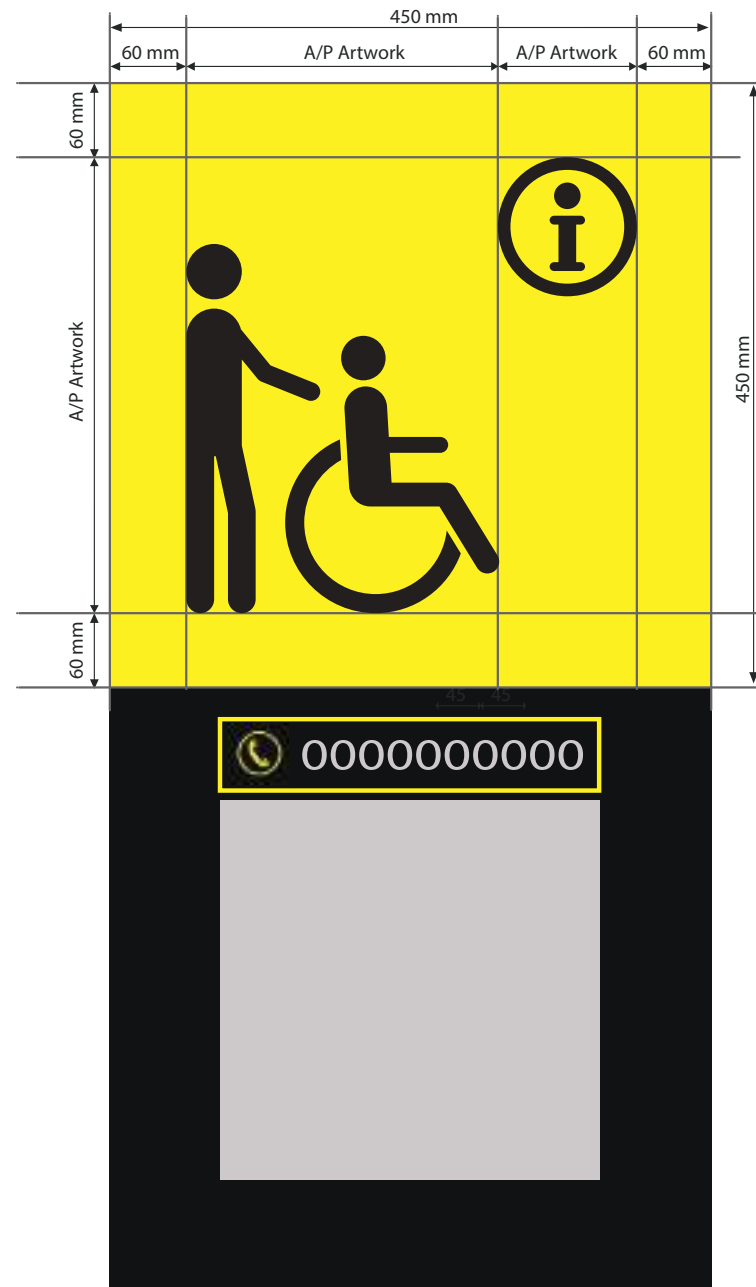
Perspective



Front Elevation

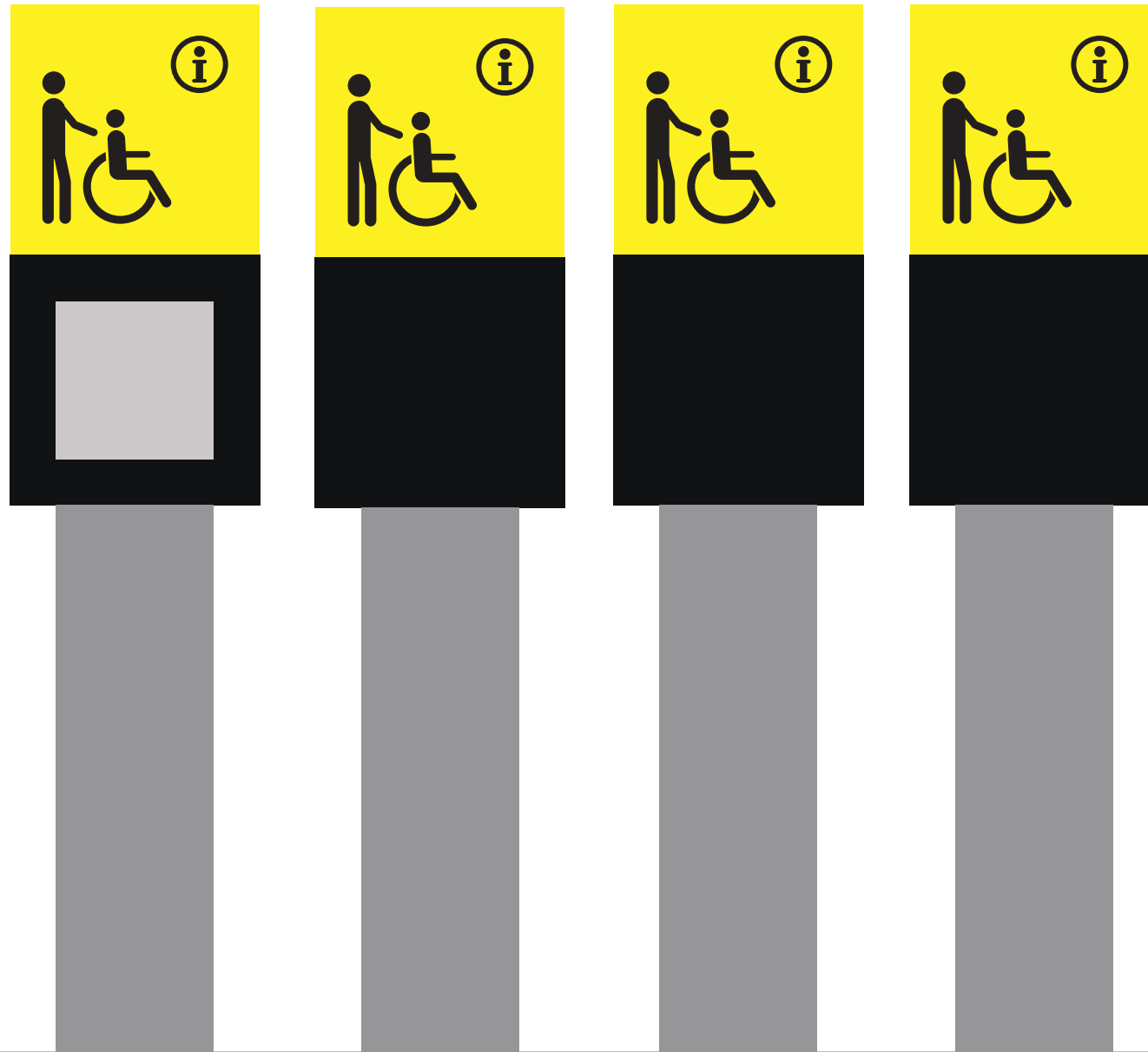
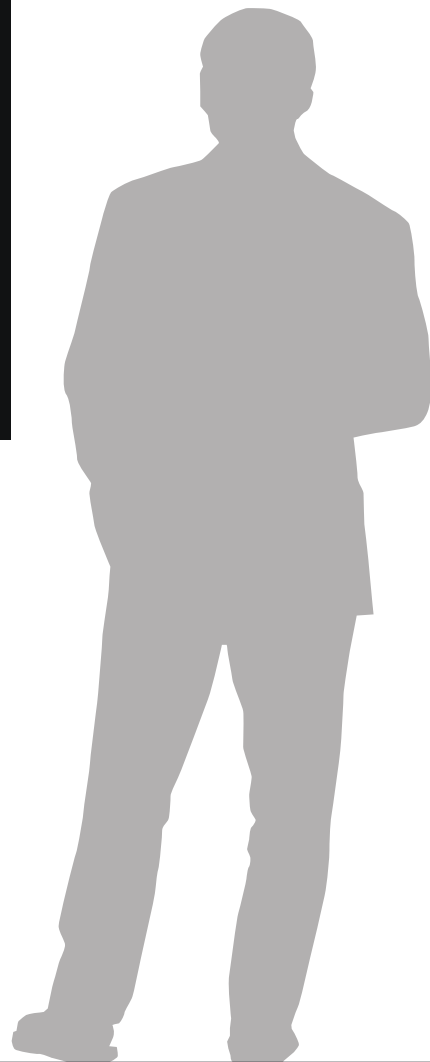
Side Elevation

Facility Announcers - Passenger Amenities



Sign Face Artwork ▲

Sign Front Elevation ►



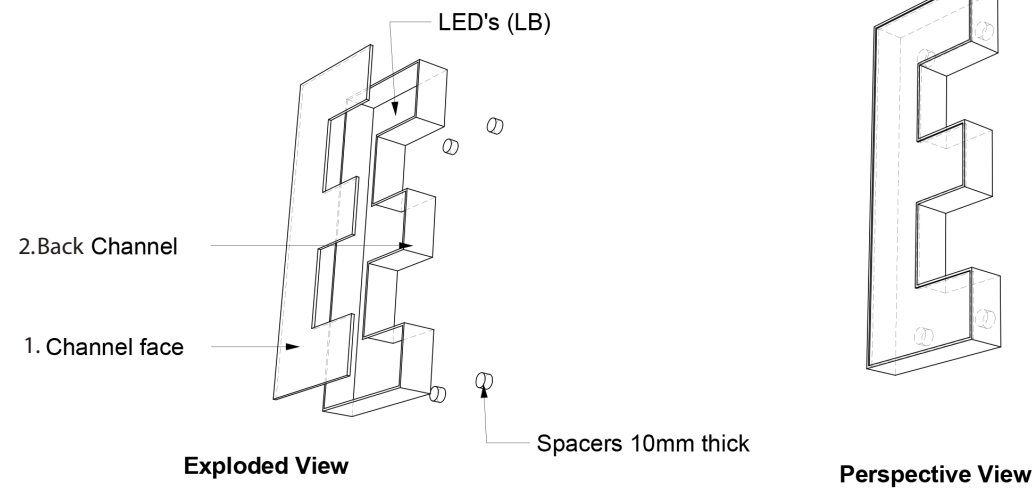
Note:

Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:
N.A.

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



XXXXXX Airport
XXXXXX हवाई अड्डा
XXXXXX विमानतळ

XXXXXX
Airport

DOUBLE LINER

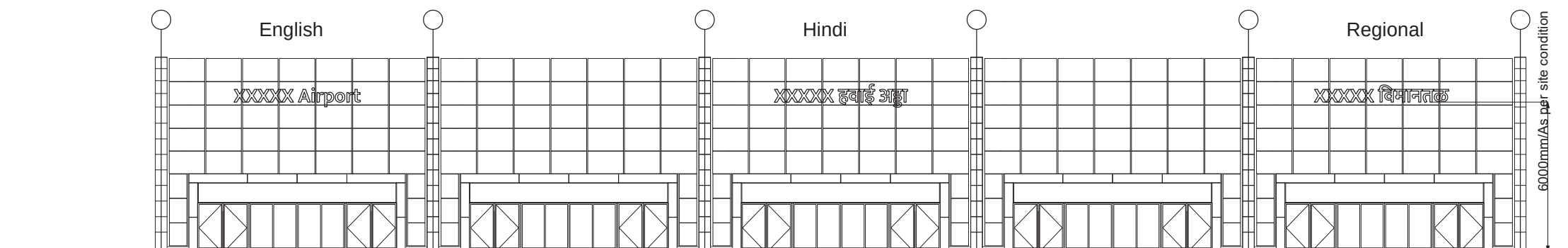
XXXXXX Airport

XXXXXX हवाई अड्डा

XXXXXX विमानतळ

Front

SINGLE LINER



Drawing showing the landside elevation showing the location of 3 language sign in relation to the grids.

Terminal Building Announcer

Principle

These sign identify the terminal building and are placed on the landside facade.
Sign Background (Type 1 - Letter fixing directly on available surface)
Sign Background (Type 2 - Letter fixing on Panel)

Material Specification

1.Channel face- White translucent 040, 5mm thick acrylic.
2. Back channel - A 100 mm deep channel made out of aluminium to receive the front acrylic and house the controller and LEDs
3. Spacer - Recommended for use for mounting the larger text on the glazing frame
Mounting and structure -
Details shall be developed by the EPC contractor in coordination with the glazing detail at specific locations as proposed in the sign.
AAI local body finalises the airport name.
Size of the letter length of the text depends on the Existing Terminal Elevation and canopy Elevation.
Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

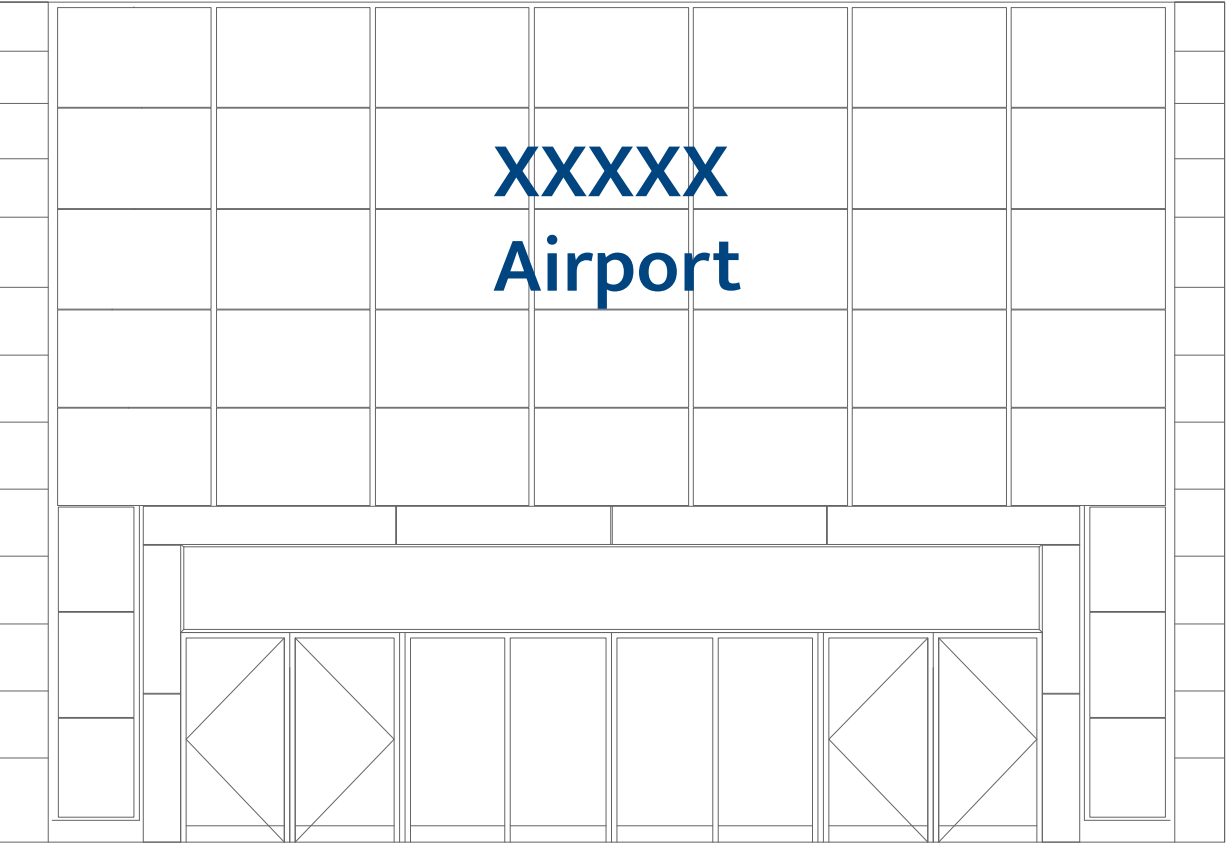
-Sizes / heights of letter used as per the site requirement: 450mm , 600mm ,900mm and 1200.
- Alternative fixing shall be hanging from existing structure (Canopy) at the airport or on the top of the building.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

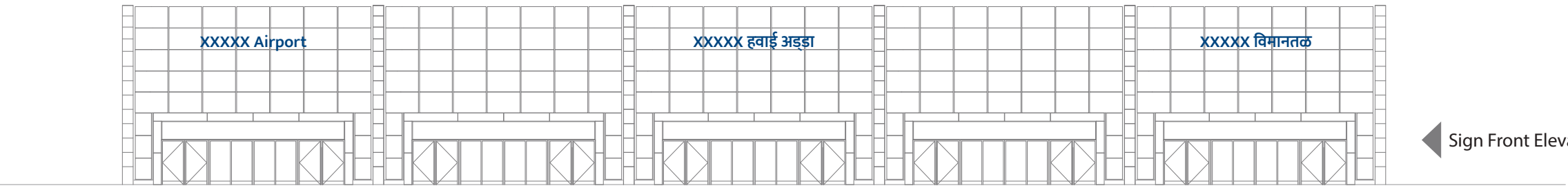


Sign Front Elevation
Type 1



Sign Front Elevation
Type 2

Note:
Artworks to be taken from the open file provided by the signage consultant.



Sign Front Elevation

Sign Adaptability as per Site Conditions:
-Sizes / heights of letter used as per the site requirement: 450mm , 600mm ,900mm and 1200.
- Alternative fixing shall be hanging from existing structure (Canopy) at the airport or on the top of the building.

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Airport Map

Principle

This sign is placed in the exteriors of the airport terminal and contains the map highlighting facilities like parking ,traffic flow,ancillary building like cargo etc.

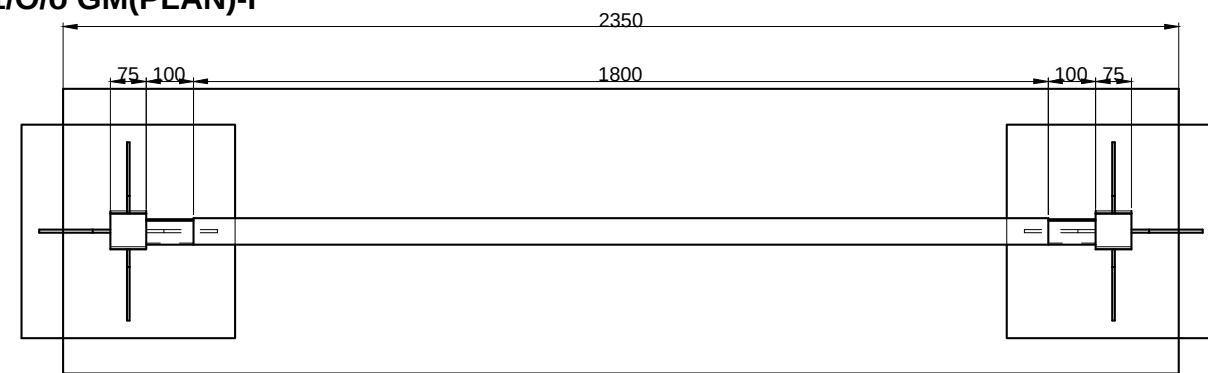
Material Specification

1. Sign face - Two sided sign face with white translucent 040 acrylic, 8mm thk, Graphics - Exterior grade plotter cut blockout vinyl matching pantone blue 541c, translucent printed vinyl for text/Map and pasted over white translucent acrylic.
 2. Sign frame - 50mm wide, aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.
 3. Sign structure - M.S. hollow box section 75x75 hotdipped galvanised and PU Painted to match RAL 9006 fixed to ground, base plate embedded below the floor finish and provided with a cover plate.
 4. Connector - 50 x 50 M.S. hollow section hot dipped galvanized and PU painted to match RAL 9006.All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.
- Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.
- Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

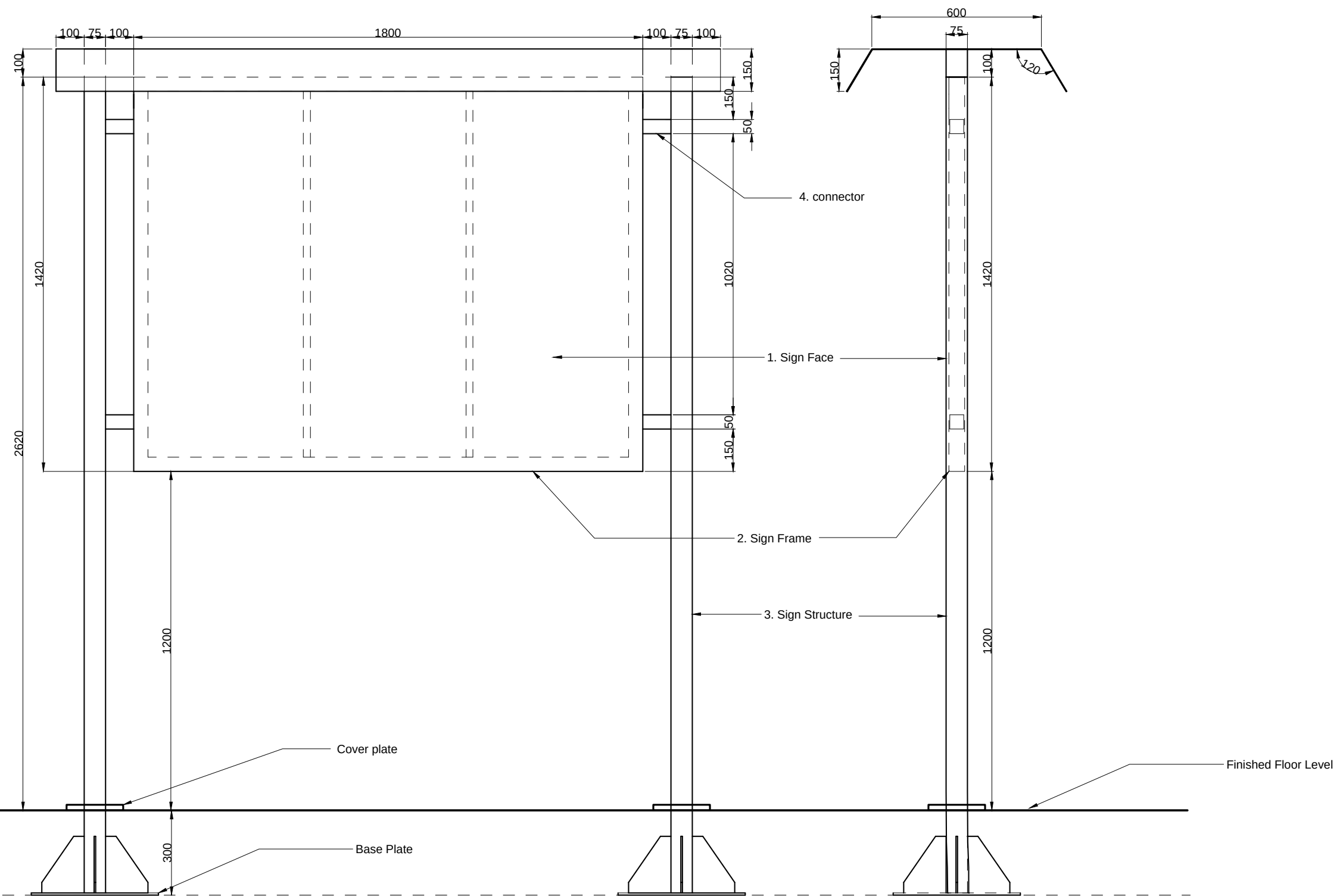
Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



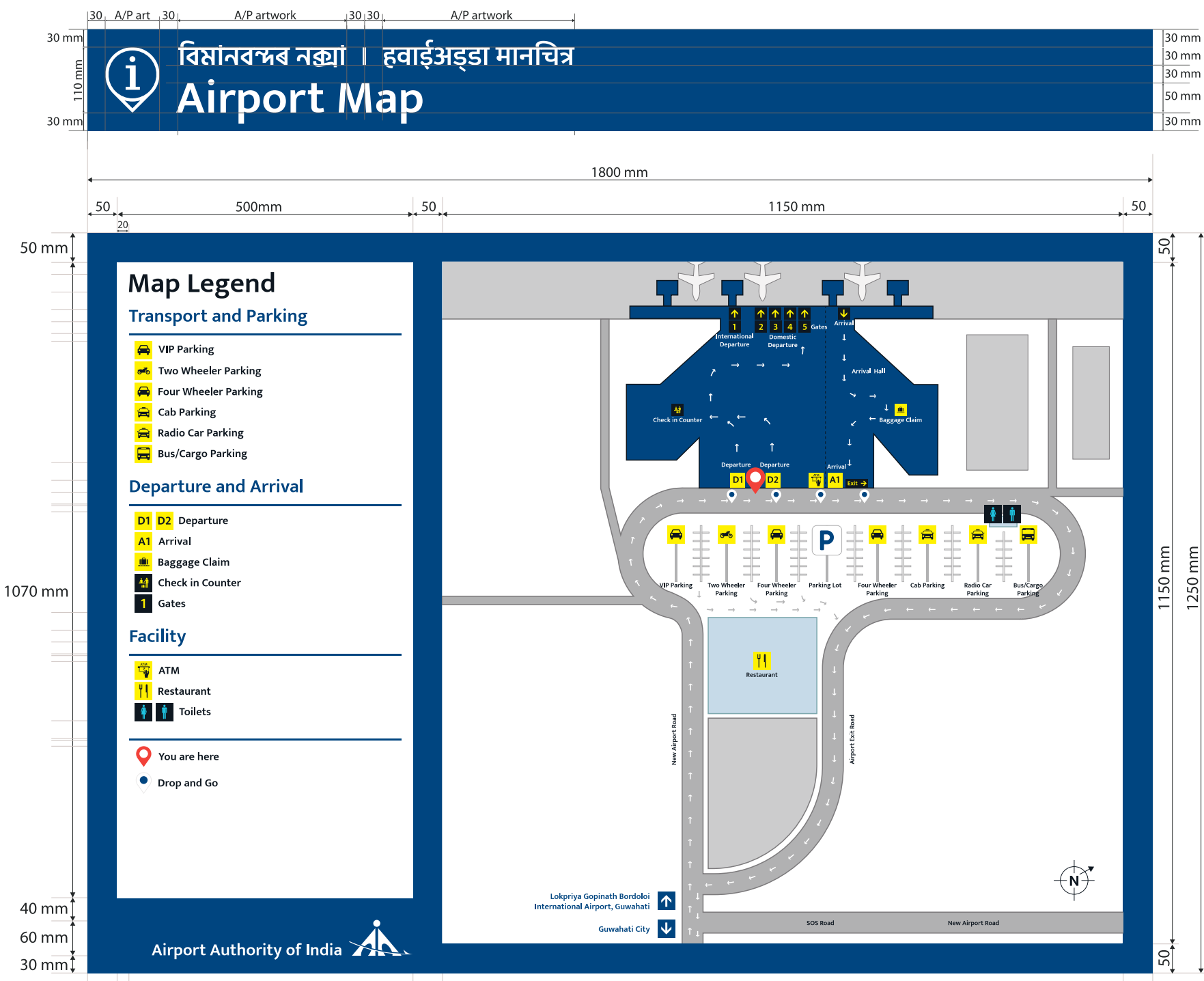
Plan



Front Elevation

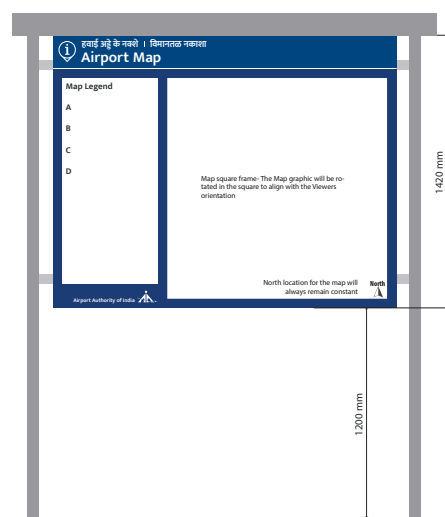
Side Elevation

Airport Map



Sign Face Artwork

Sign Front Elevation



Note:

Artworks to be taken from the open file provided by the signage consultant.

Map square frame- The Map graphic will be rotated in the square to align with the Viewers orientation

Blue vinyl is opaque, White vinyl is translucent. Vendor needs to create map artwork basis graphics template and site specific layout plans provided by AAI

Map Artwork Guideline - Map artwork should contain Terminal building, parking areas and internal road network connecting to the main road

Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



2.1 Interior Directional Signs

2.1a	Ceiling Hung Directional Sign
2.1b-1	Floor Mounted Directional Sign with FIDS
2.1b-2	Floor Mounted Directional Sign with Map
2.1b-3	Floor Mounted Directional Sign - Single
2.1b-4	Floor Mounted Directional Sign - Double
2.1c	Wall Mounted Directional Sign
2.1d	Wall Projected Directional Sign

Ceiling Hung Directional Sign

Principle

These sign help direct the movement pattern of passenger to facilities, and are suspended from ceiling.

Material Specification

1. Sign face : Two sided: Graphics - Plotter cut Blockout vinyl matching with Pantone Black 6C, for text vinyl matching with Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

Maximum Message line:3
Minimum Message line: 1

2. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. L Clip with dual lock.

3. SignStructure: Framework of aluminium 25mmx 25mm hollow square sections
Suspender - Telescopic suspender with height adjustment made of Stainless steel 35x35mm
Hollow sections mounted on slabs/beams/ walls.

All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.

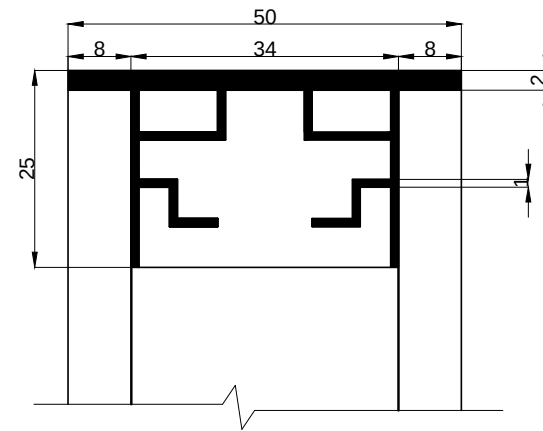
Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

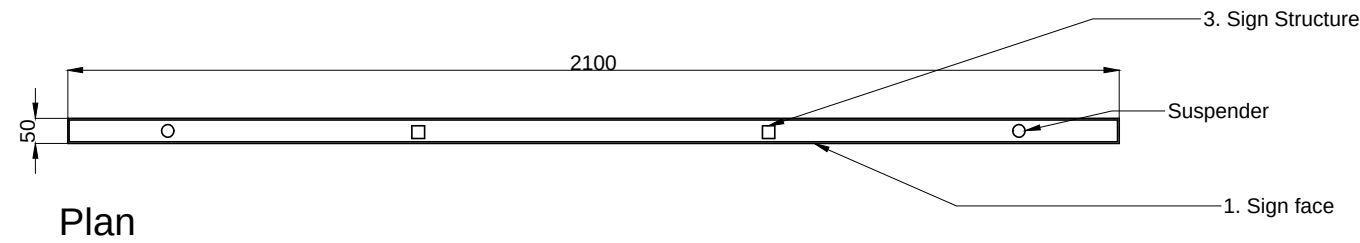
- Specified clear ht. for this signtype is 2800mm. In case of low ceiling, this may be reduced to not less than 2400mm.
- Minimum message panels 1, should not exceed 3 panels.

Keynotes:

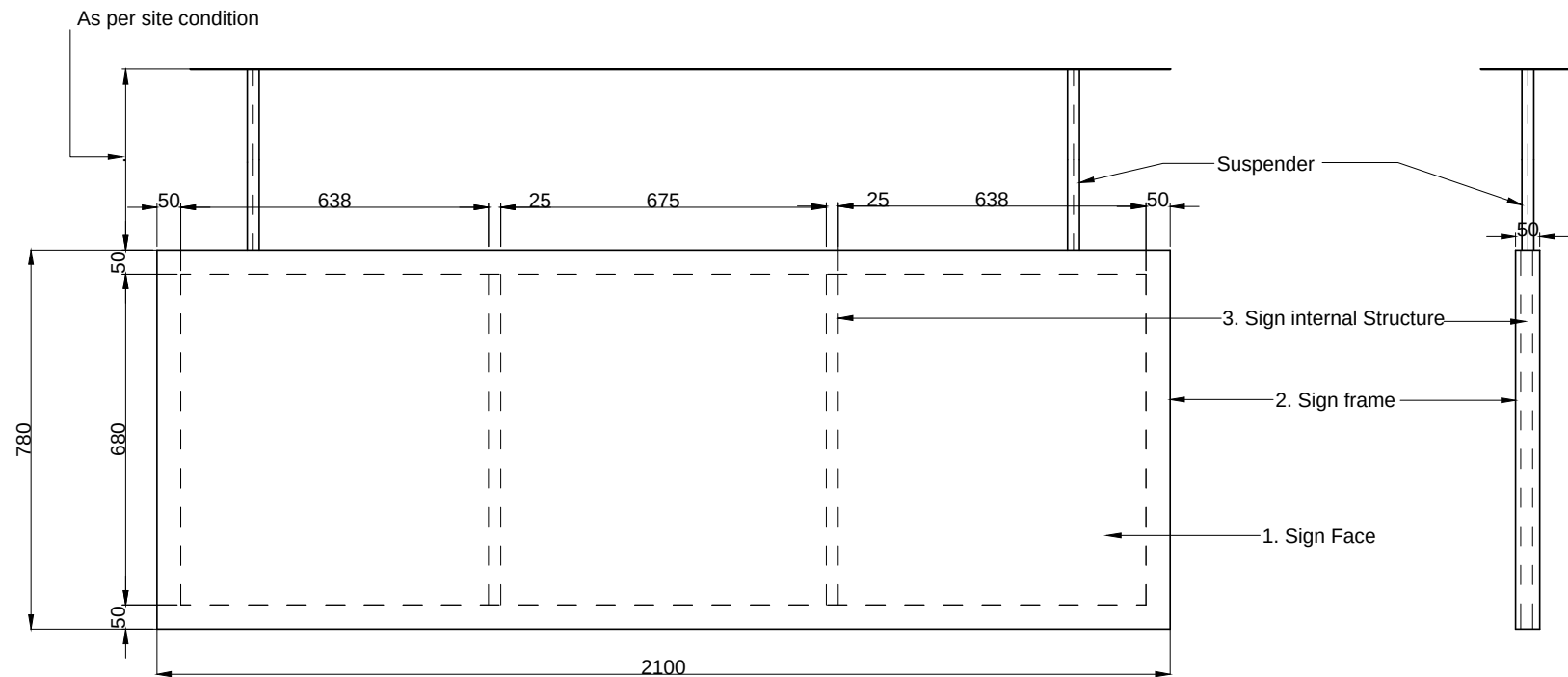
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Typical Aluminium Extrusion

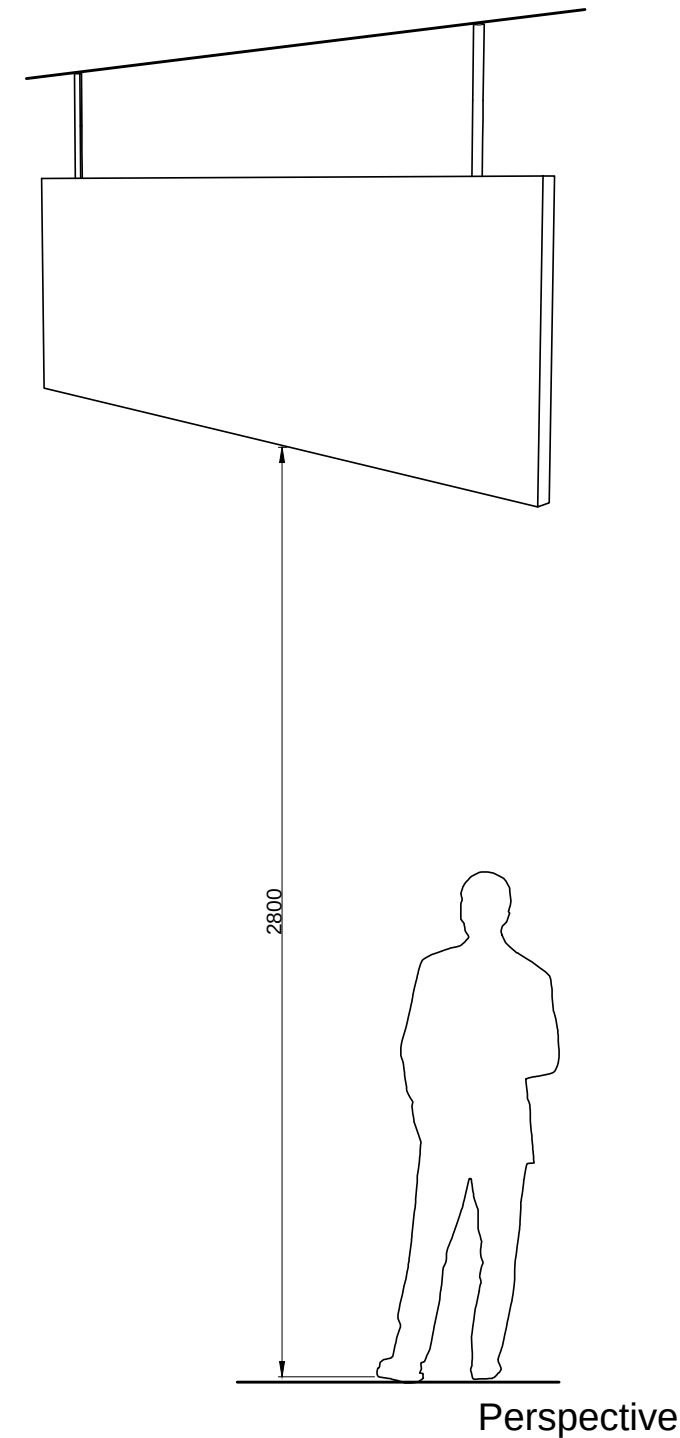


Plan



Front view

Side view



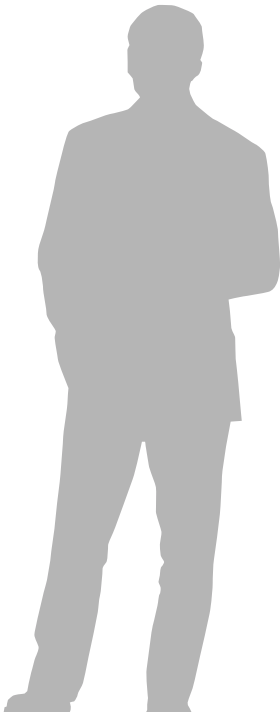
Perspective

Note:
Artworks to be taken from the open file provided by the signage consultant.



Please refer Artwork guidelines for directional signs on page no. 71

2800 mm



Sign Adaptability as per Site Conditions:
"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Floor Mounted Directional Sign - with FIDS

Principle

These sign help direct the movement pattern of passenger to facilities, and are floor mounted along with airline timings.

Material Specification

1. Sign face : Two Sided: Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text matching with Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

Maximum Message line: 5

Minimum Message line: 2

Provision of FIDS

Single Side - 2 no. of FIDS

Two Sides- 4 no. of FIDS

2. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face.

L clip with dual lock.

3. Sign structure - All structural members in Stainless steel Hollow box section 100 x 100 brush finish, connecting members of Stainless steel hollow box section 50 x 50 brush finish to hold the sign frame ,base plate embedded below the floor finish and provided with a cover plate.

4. Information panel - FIDS (Lcd screen 49") mounted on cross ties with brackets designed for the specific sizes FIDS should be considered without controller.

5. Cover Plate: 5mm thk ss cover plate mounted on flooring. 6. Cross Tie Member- Stainless steel hollow box section 50x50 brush finish acts as a conduit for electrical and data cables.

7. Crash Guard - Protection for sign from trollies ,wheeled baggage in 50 mm dia stainless steel brush finished pipe fixed with 8 mm SS plate brackets.

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

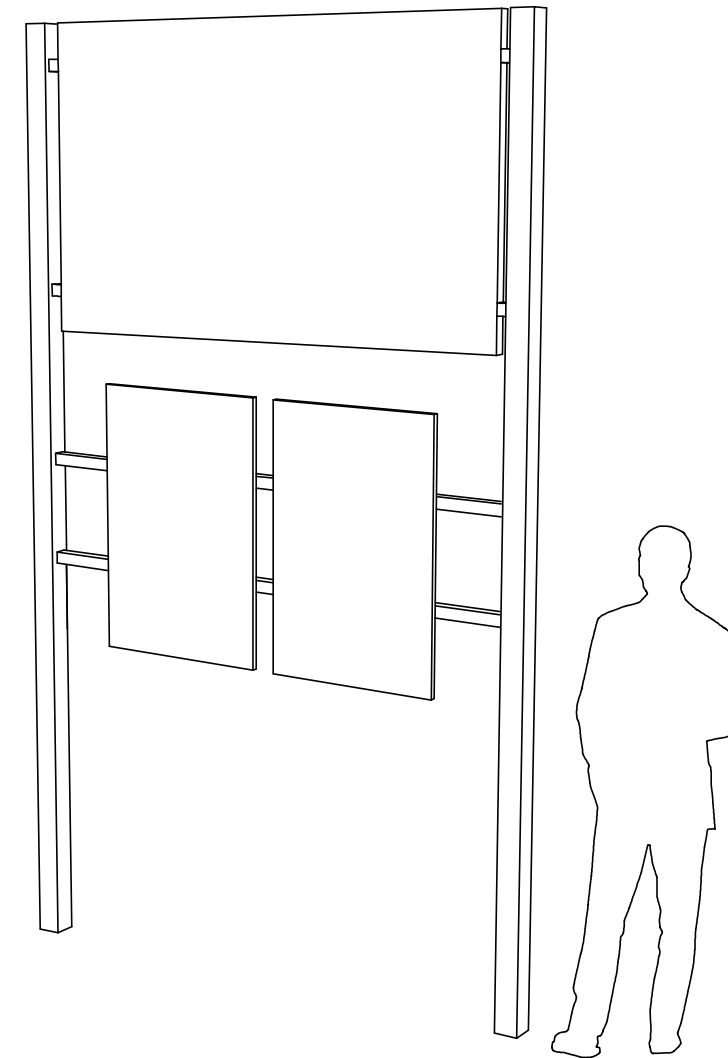
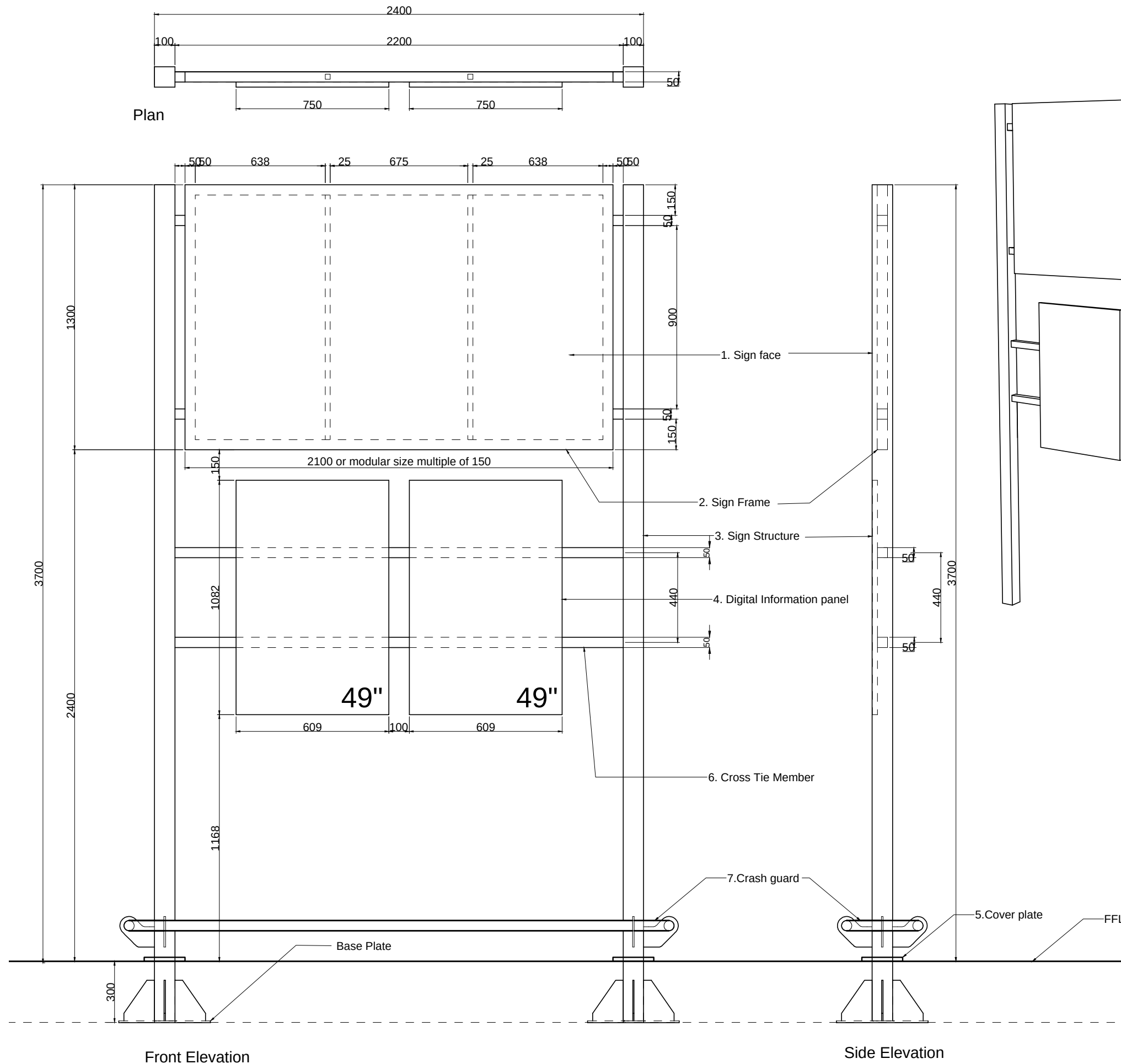
Lighting: All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

- Minimum message panels 2, should not exceed 5 panels.

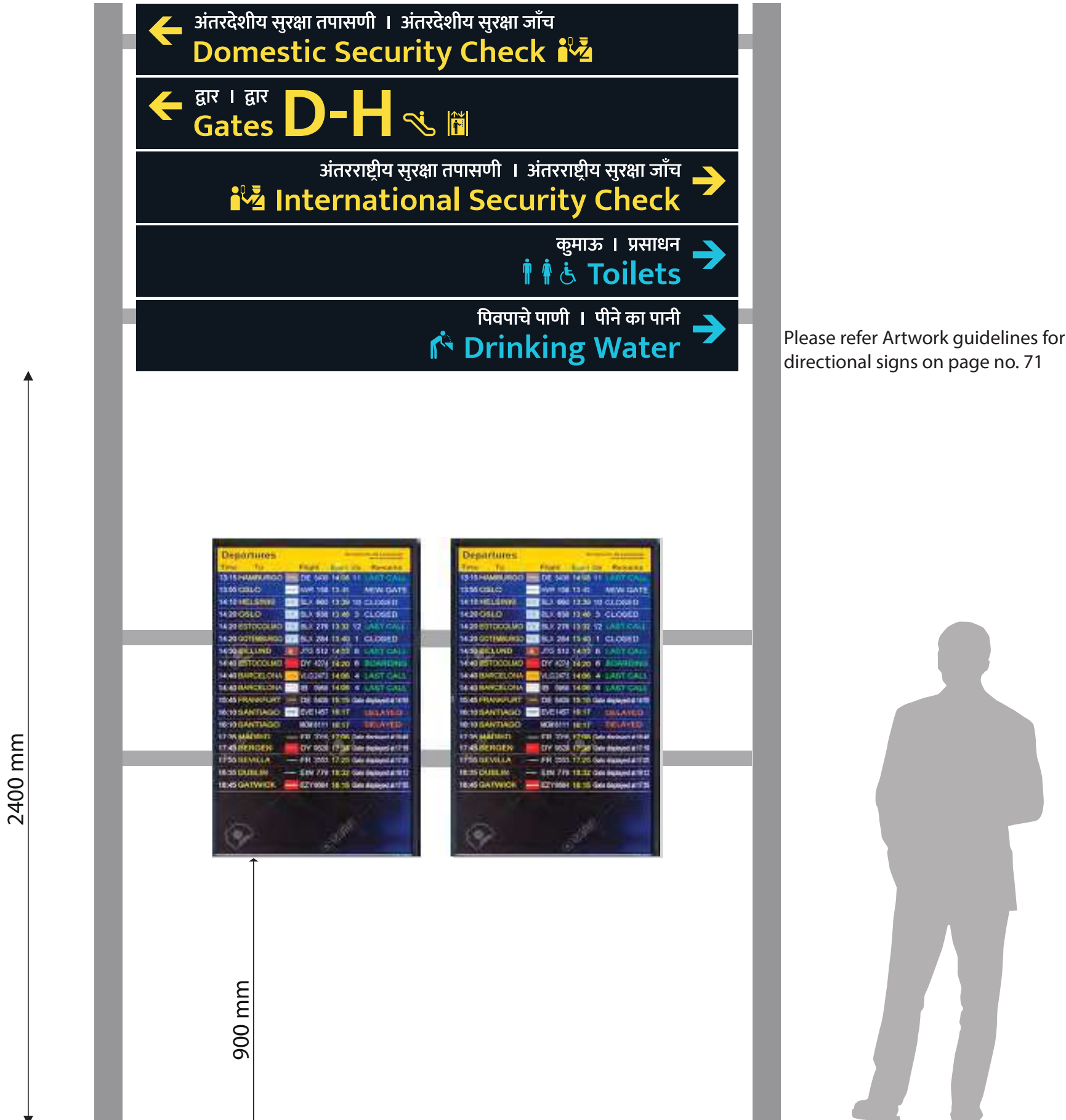
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Perspective

Floor Mounted Directional Sign - with FIDS



Note:
Artworks to be taken from the open file provided by the signage consultant.

Please refer Artwork guidelines for directional signs on page no. 71

The visual design and digital content of the screens will be done by specialised agency and not included in this project scope of work.

Sign Adaptability as per Site Conditions:
"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

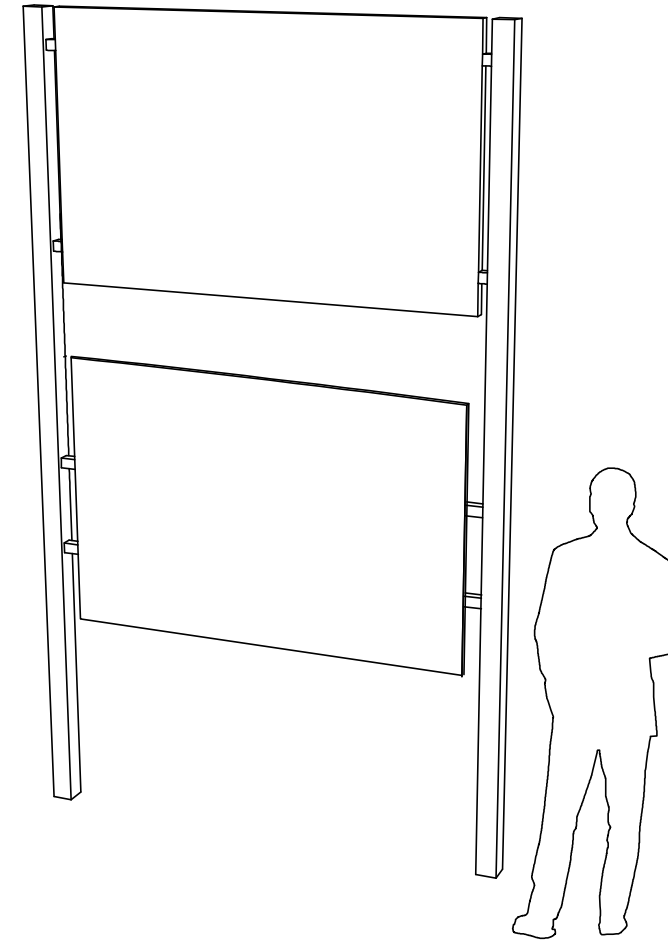
Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Principle

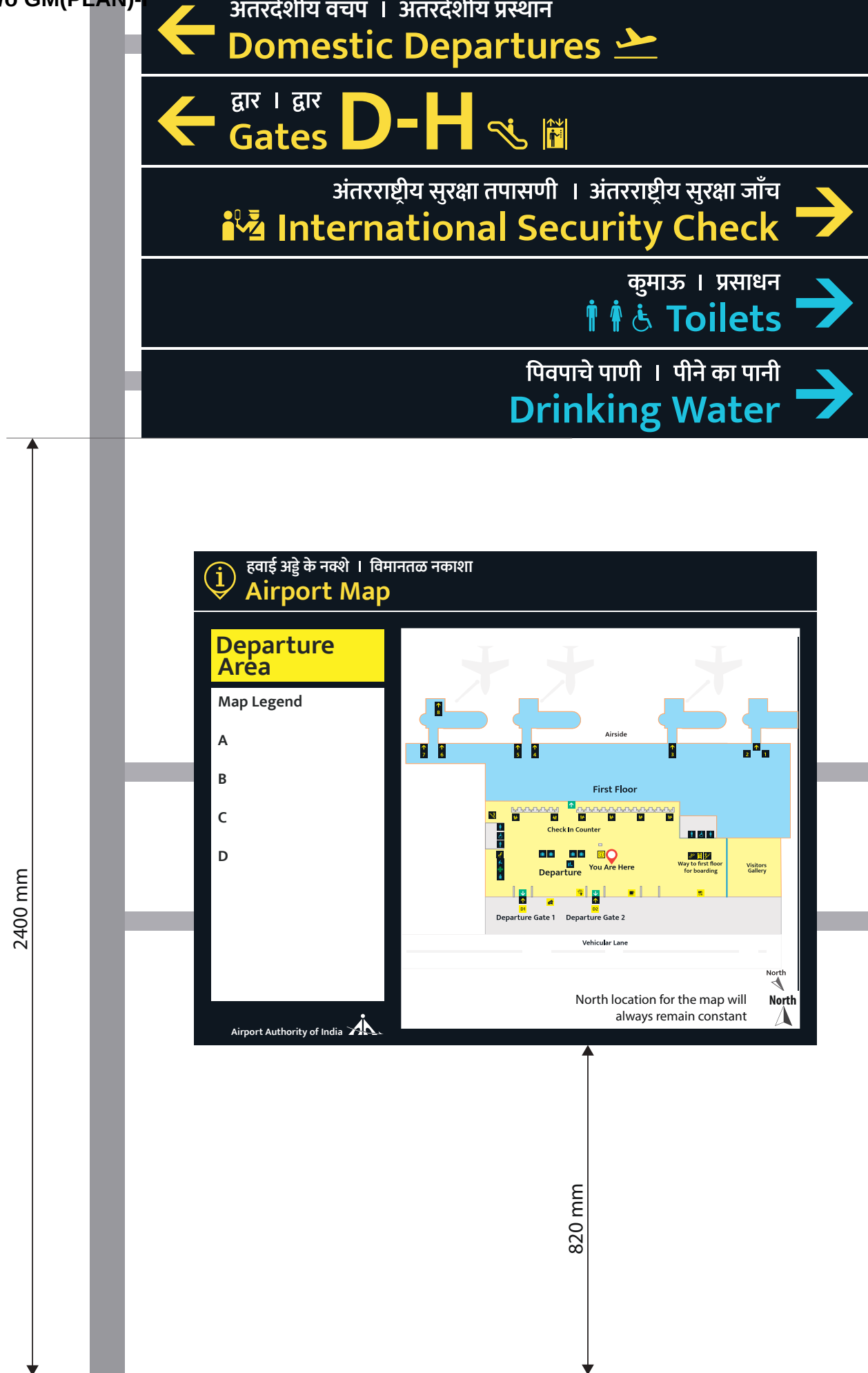
Material Specification

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Perspective



Please refer Artwork guidelines for directional signs on page no. 71

Floor Mounted Directional Sign - with Map

Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:
"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

← Sign Front Elevation

Floor Mounted Directional Sign - Single

Principle

These sign help direct the movement pattern of passenger to facilities, and are floor mounted.

Material Specification

1. Sign face: Two sided: - Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

Maximum Message line: 3
Minimum Message line: 1

2. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. L clip with dual lock.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

3. Sign structure - All structural members in Stainless steel Hollow box section 100 x 100 brush finish, connecting members of Stainless steel hollow box section 50 x 50 brush finish to hold the sign frame ,base plate embedded below the floor finish and provided with a cover plate. All hardware used for fixing of sign shall be Stainless steel.

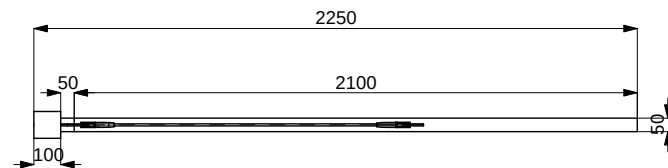
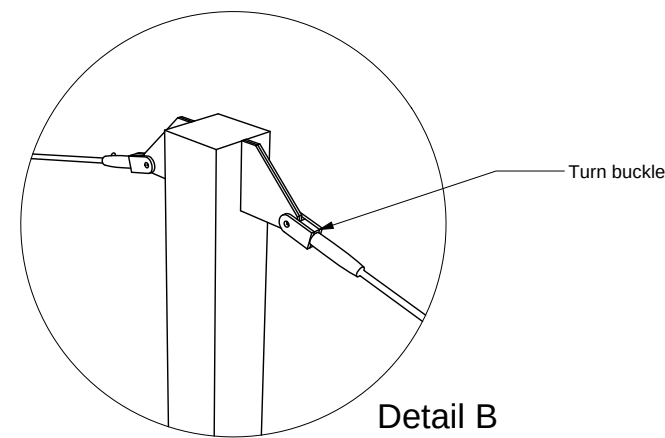
Projection support : Small plates 8mm thick connecting tension rod to structure and frame with threaded ends and turnbuckles for adjustments.(refer to detail B)

Sign Adaptability as per Site Conditions:

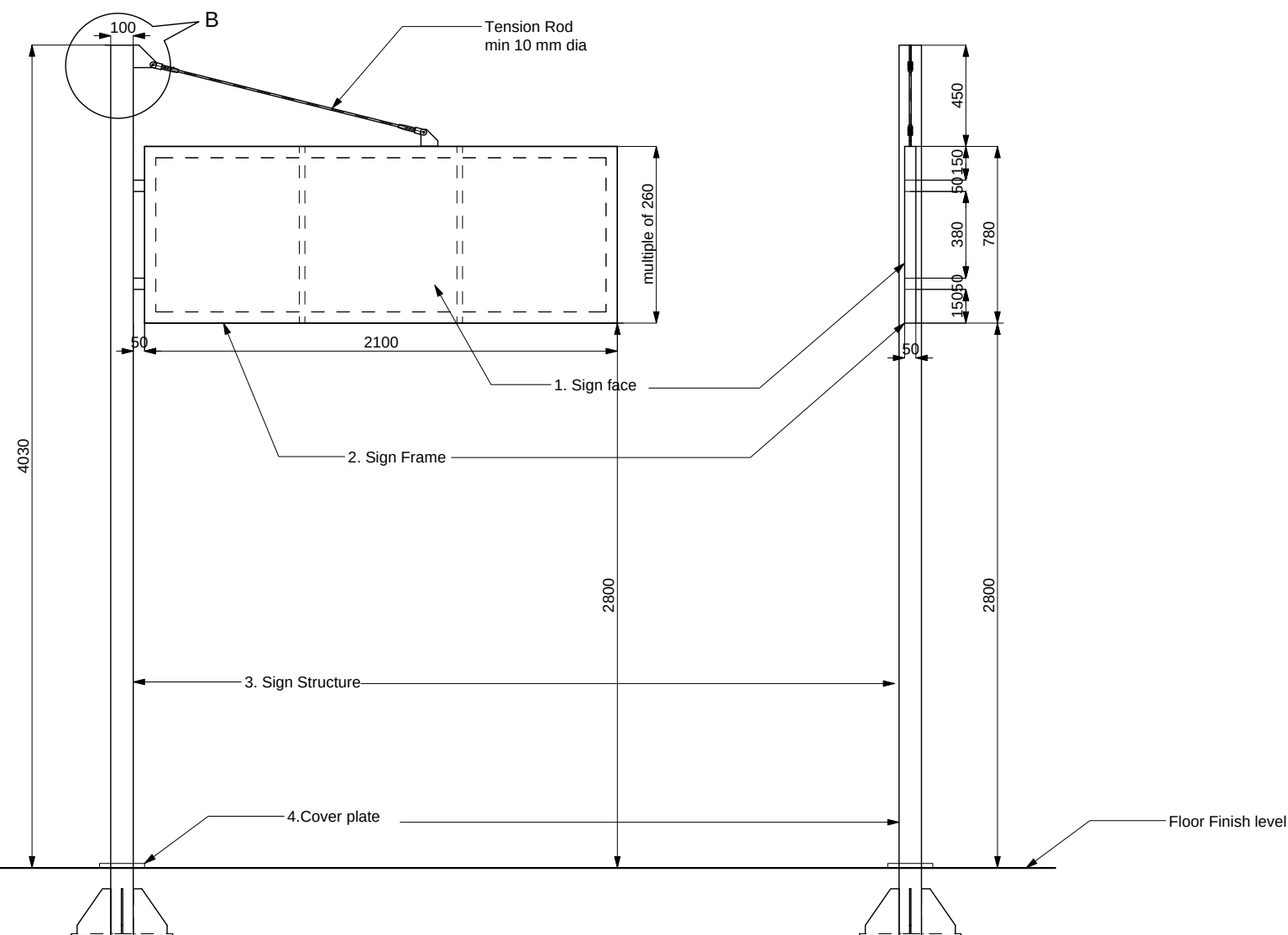
- Specified clear ht. for this signtype is 2800mm. In case of low ceiling, this may be reduced to not less than 2400mm.
- Minimum message panels 1, should not exceed 3 panels.
- Incase of 3,2,1 message sign height will change accordingly.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

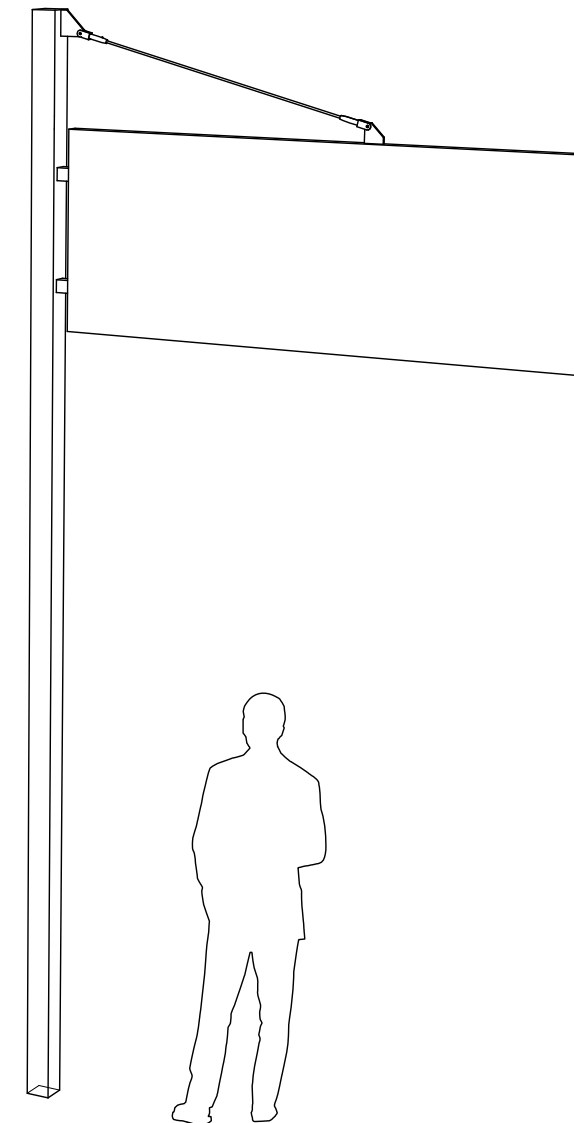


Plan



Front Elevation

Side Elevation



Perspective

Note:
Artworks to be taken from the open file provided by the signage consultant.

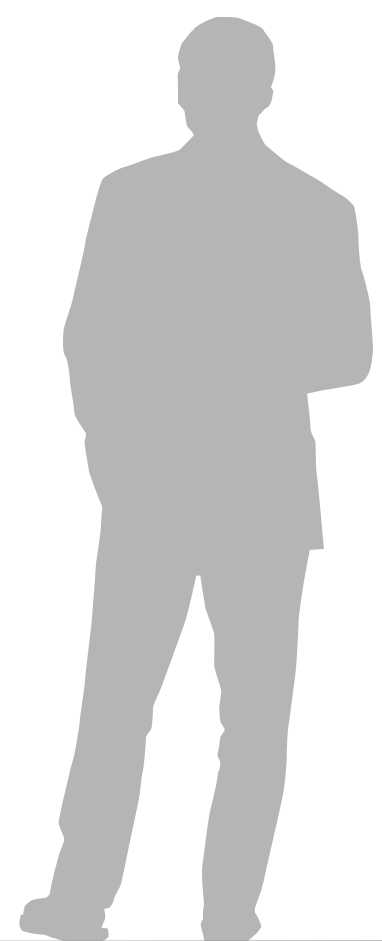
अंतरराष्ट्रीय सुरक्षा तपासणी | अंतरराष्ट्रीय सुरक्षा जाँच
International Security Check →

कुमाऊ | प्रसाधन
Toilets →

पिवपाचे पाणी | पीने का पानी
Drinking Water →

Please refer Artwork guidelines for directional signs on page no. 71

2800 mm



Sign Front Elevation

Sign Adaptability as per Site Conditions:
"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Floor Mounted Directional Sign - Double

Principle

These sign help direct the movement pattern of passenger to facilities, and are floor mounted.

Material Specification

1. Sign face: Two Sided: Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

Maximum Message line:3
Minimum Message line: 1

2. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. L clips with dual lock.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

3. Sign structure - All structural members in Stainless steel Hollow box section 100 x 100 brush finish, connecting members of Stainless steel hollow box section 50 x 50 brush finish to hold the sign frame ,base plate embedded below the floor finish and provided with a cover plate. All hardware used for fixing of sign shall be Stainless steel.

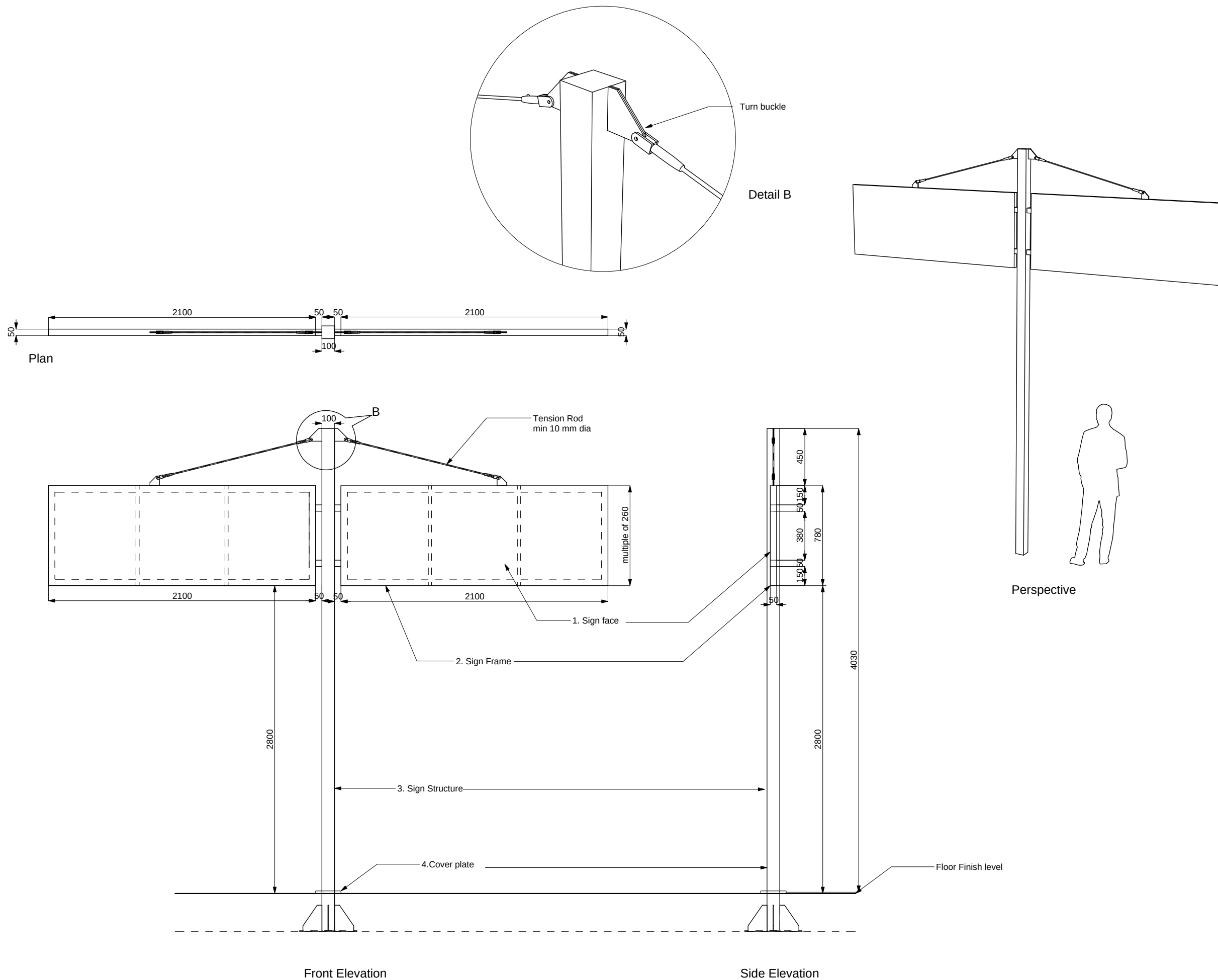
Projection support : Small plates 8mm thick connecting tension rod to structure and frame with threaded ends and turnbuckles for adjustments.(refer to detail B)

Sign Adaptability as per Site Conditions:

- Specified clear ht. for this signtype is 2800mm. In case of low ceiling, this may be reduced to not less than 2400mm.
- Minimum message panel 1, should not exceed 3 panels.

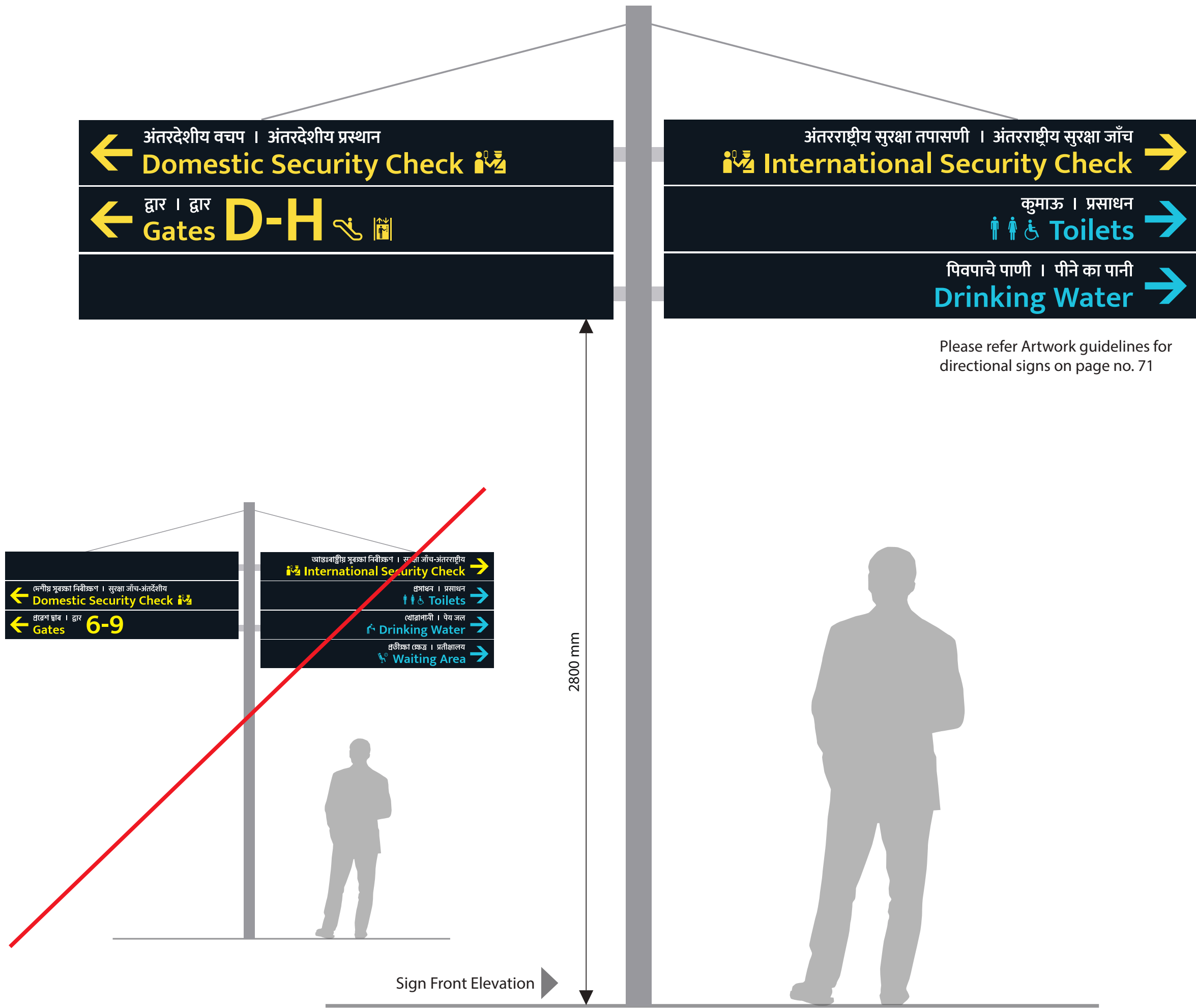
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Floor Mounted Directional Sign - Double

Note:
Artworks to be taken from the open file provided by the signage consultant.



Please refer Artwork guidelines for directional signs on page no. 71

Sign Adaptability as per Site Conditions:
"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

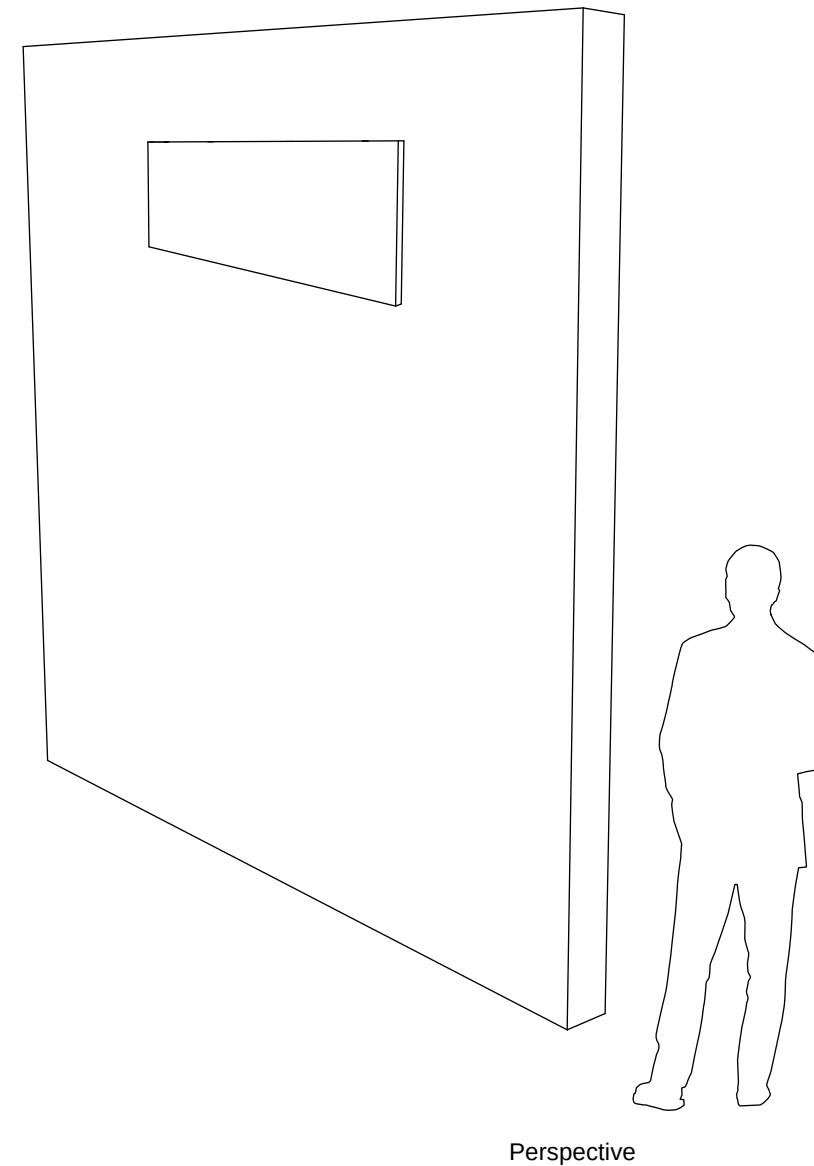
Principle

Material Specification

- Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





Note:

Artworks to be taken from the open file provided by the signage consultant.

Please refer Artwork guidelines for directional signs on page no. 71

Sign Adaptability as per Site Conditions:

"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Wall Projected Directional Sign

Principle

These sign help direct the movement pattern of passenger to facilities, and are projecting from wall.

Material Specification

1. Sign face: Two Sided: Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

Maximum Message line: 3
Minimum Message line: 1

2. Sign Frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. L clips with dual lock.

Projection support : Small plates 8mm thick connecting tension rod to structure and frame with threaded ends and turnbuckles for adjustments.(refer to detail B)

All hardware used for fixing of sign shall be Stainless steel. All fixing details or plate should not be visible .

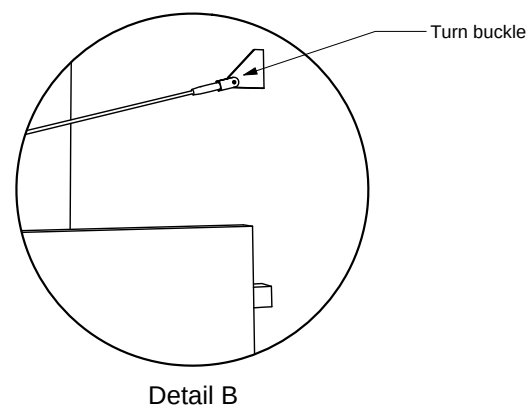
Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

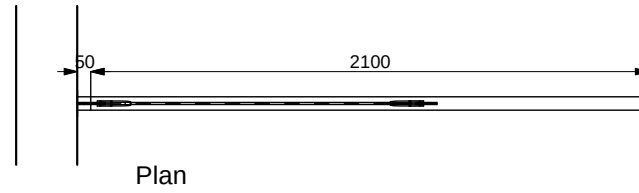
- Specified clear ht. for this signtype is 2800mm. In case of low ceiling, this may be reduced to not less than 2400mm.
- Minimum message panels 1, should not exceed 3 panels.

Keynotes:

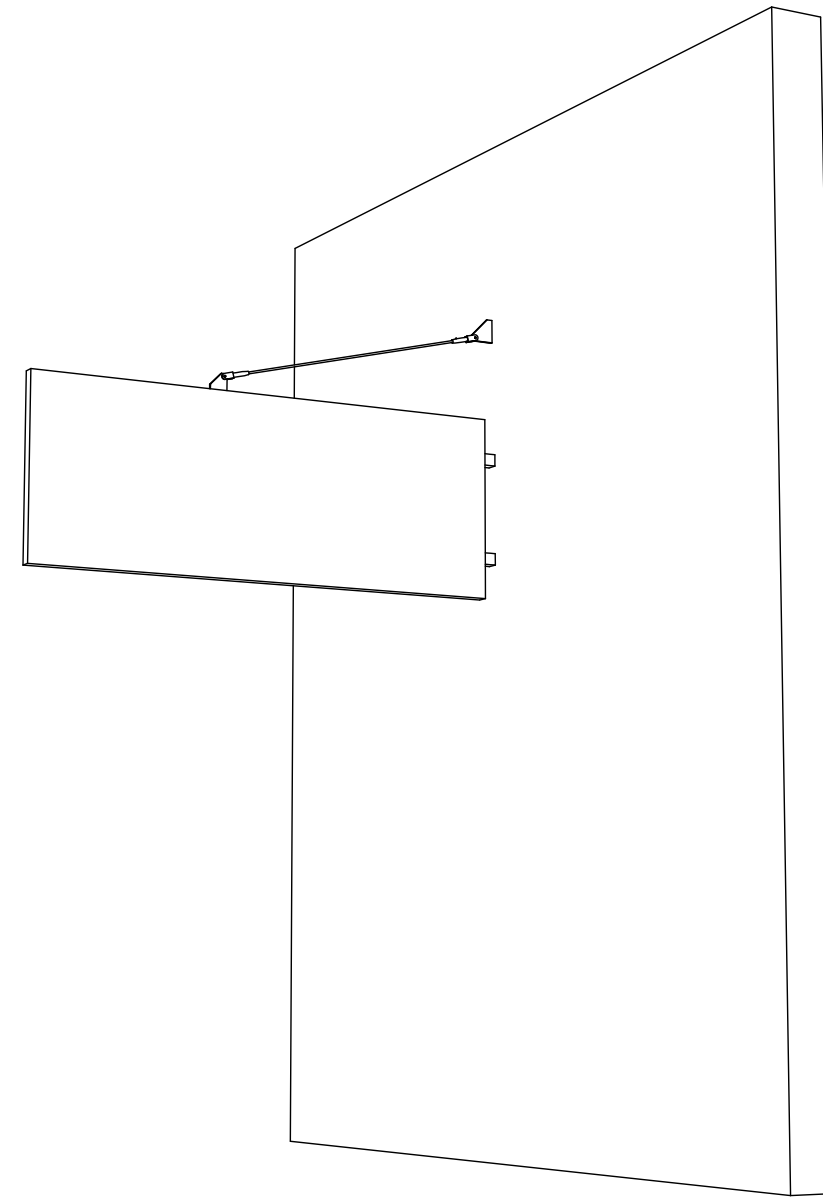
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



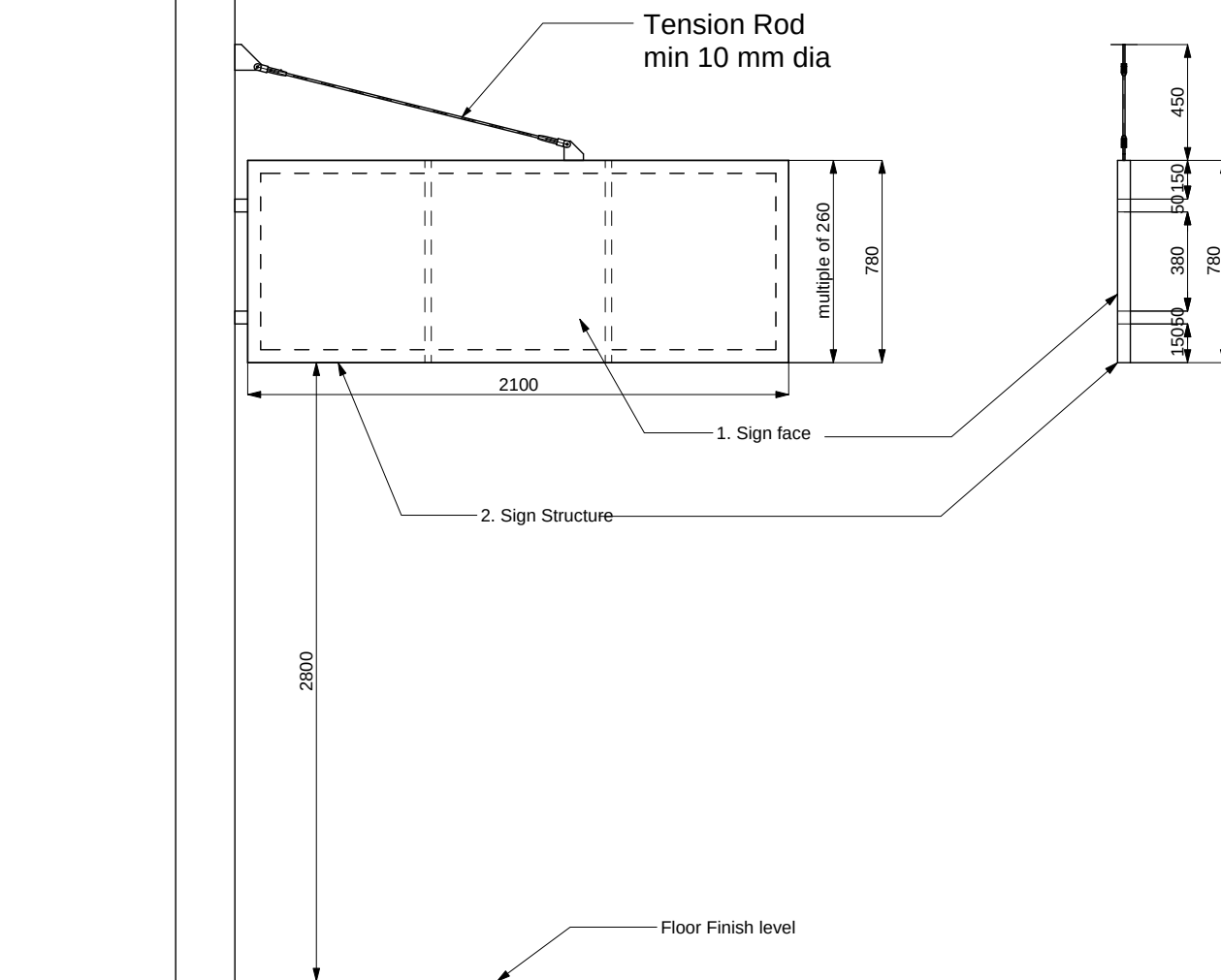
Detail B



Plan

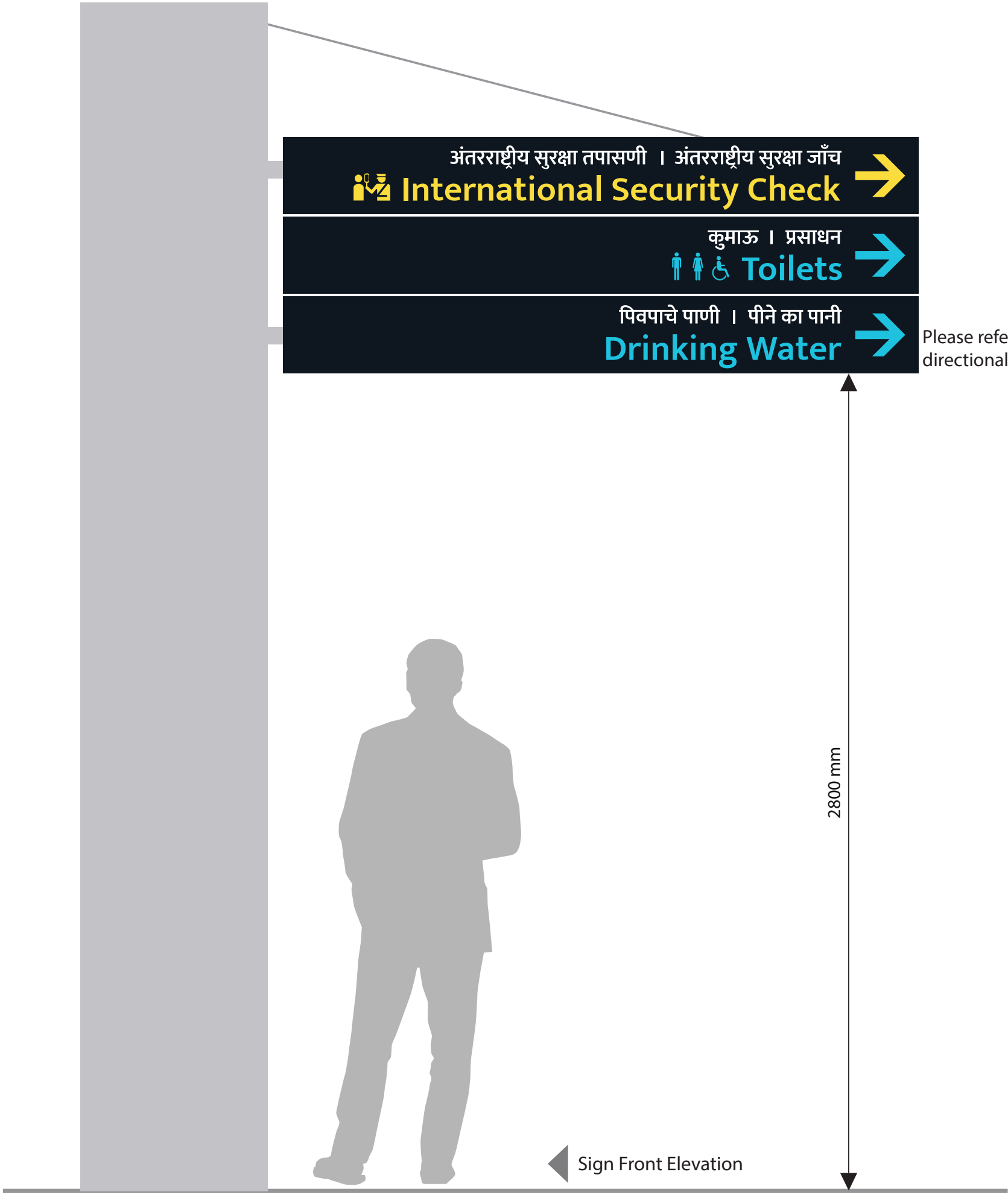


Perspective



Front Elevation

Side Elevation



Note:
Artworks to be taken from the open file provided by the signage consultant.

Please refer Artwork guidelines for directional signs on page no. 71

Sign Adaptability as per Site Conditions:
"Please refer Drg No : 2.1G for Adaptability note (Page 71)"

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



2.2 Facility Announcer Signs

2.2a	Wall Mounted Facility Announcer Sign
2.2b	Wall Projected Facility Announcer Sign
2.2c	Door Mounted Facility Announcer Sign
2.2d-1	Counter Mount Facility Announcer Sign
2.2d-2	Counter Mount Facility Announcer Sign - with Screen
2.2e-1	Ceiling Hung Facility Announcer Sign
2.2e-2	Ceiling Hung Facility Announcer Sign - with Screen
2.2f	Floor Mounted Facility Announcer Sign
2.2g-1	Boarding Gates - Totem
2.2g-2	Boarding Gates - Wall Projected
2.2g-3	Boarding Gates - wall Mounted
2.2h	Belt No. Sign
2.2i	Bay Announcer
2.2j-1	Baggage Screening - Pole
2.2j-2	Baggage Screening - Box

Wall Mounted Facility Announcer

Principle

These signs announce the various facilities and are mounted on wall. Distance between the door/window opening and the sign should be 300mm.

Material Specification

1. Sign Face: Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

2. Sign Frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. The panel should be made easily openable for maintainance.

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

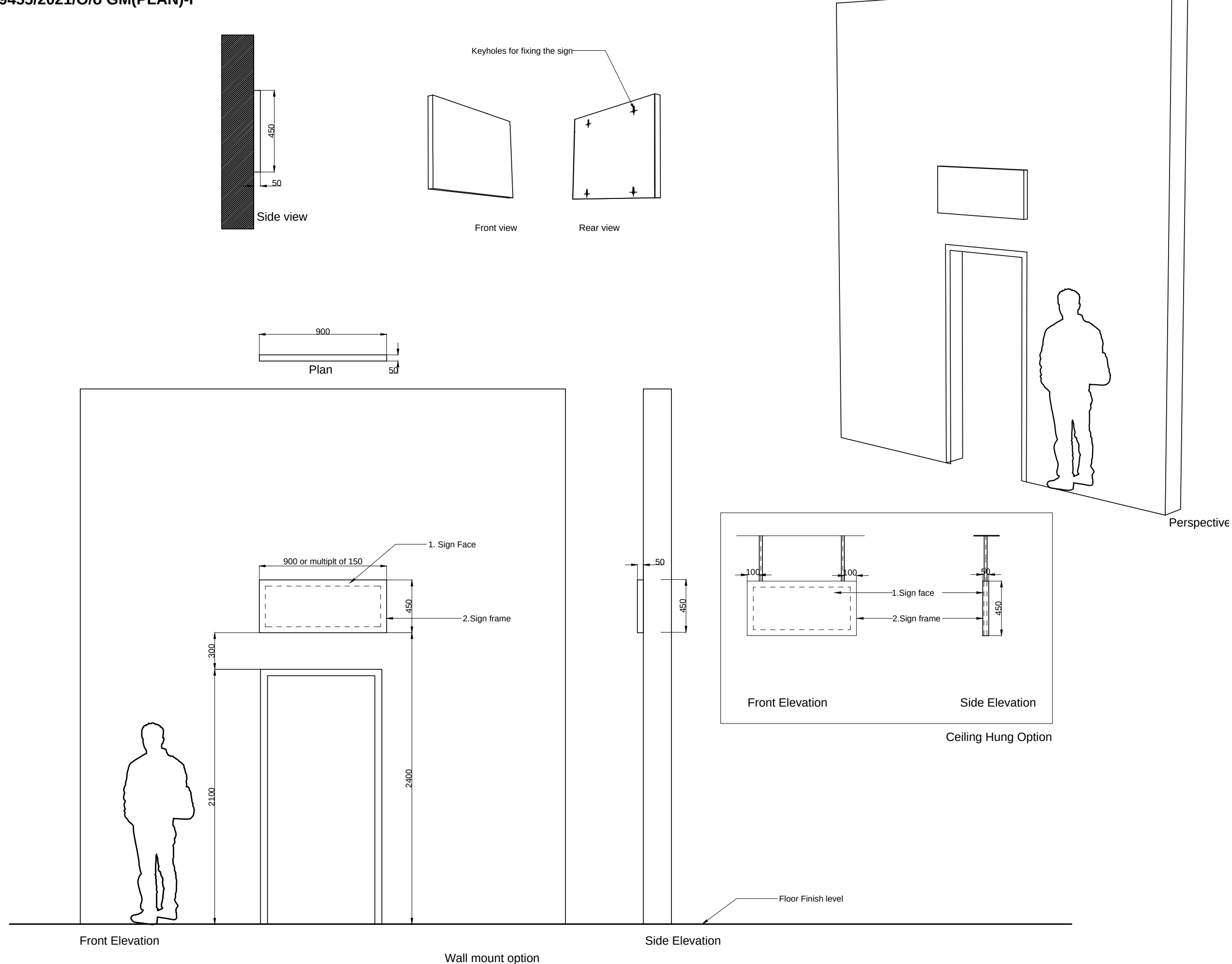
Alternate fixing options:

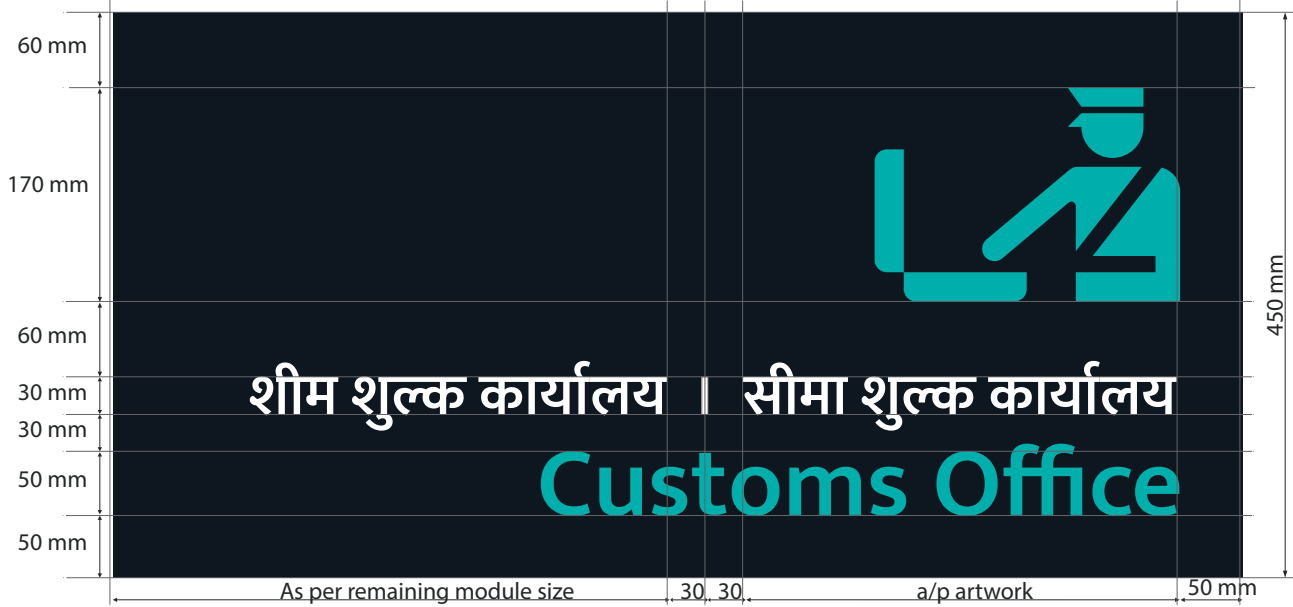
In case wall mounting is not possible(e.g. glass partition etc.) suspend from ceiling, with illumination. If ceiling also is too high or illumination is not possible, provide Vinyl Sticker on Glass.

Suspender - Telescopic suspender with height adjustment made of Stainless steel 35x35mm Hollow sections mounted on slabs/beams/ walls.

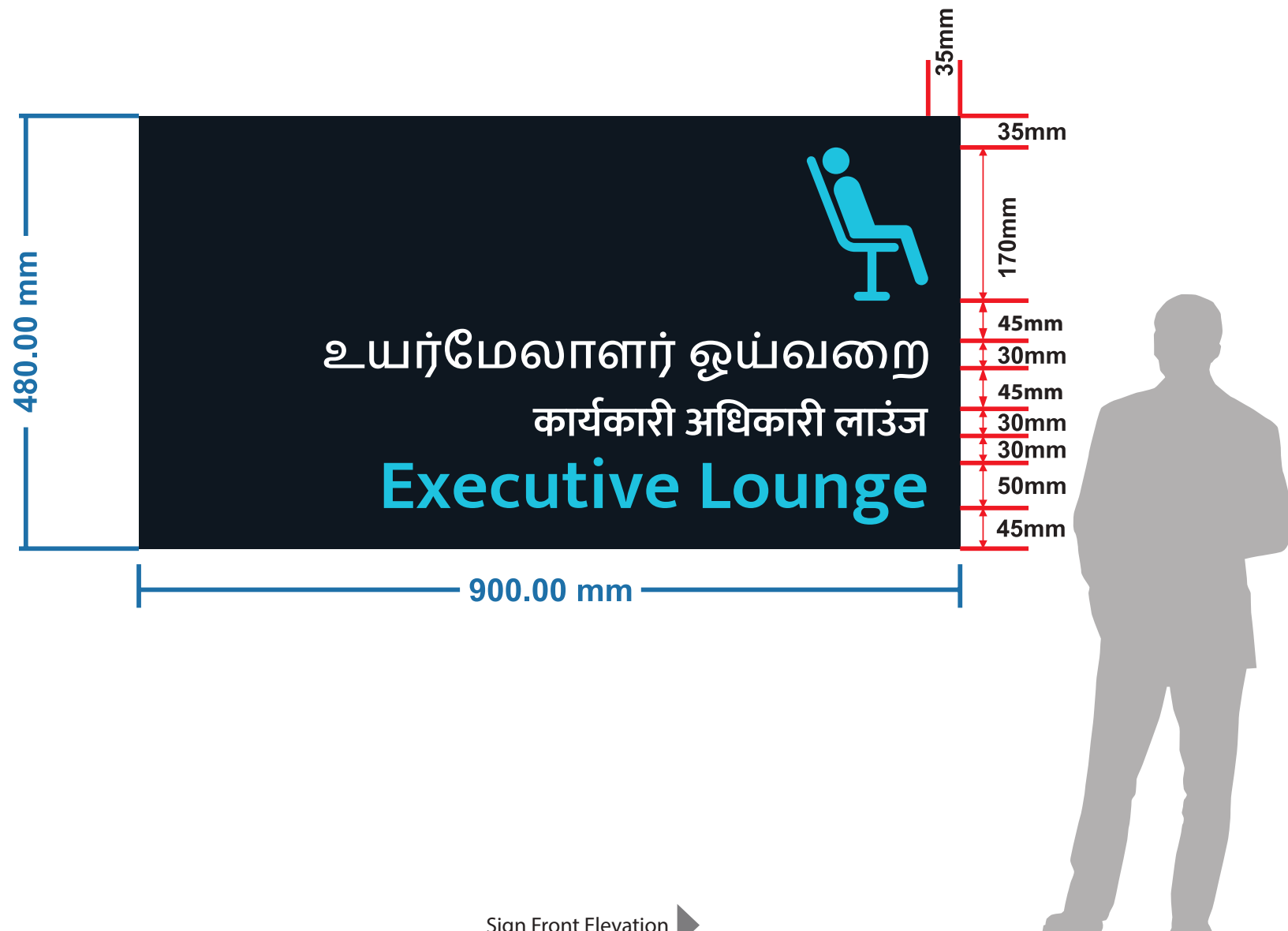
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





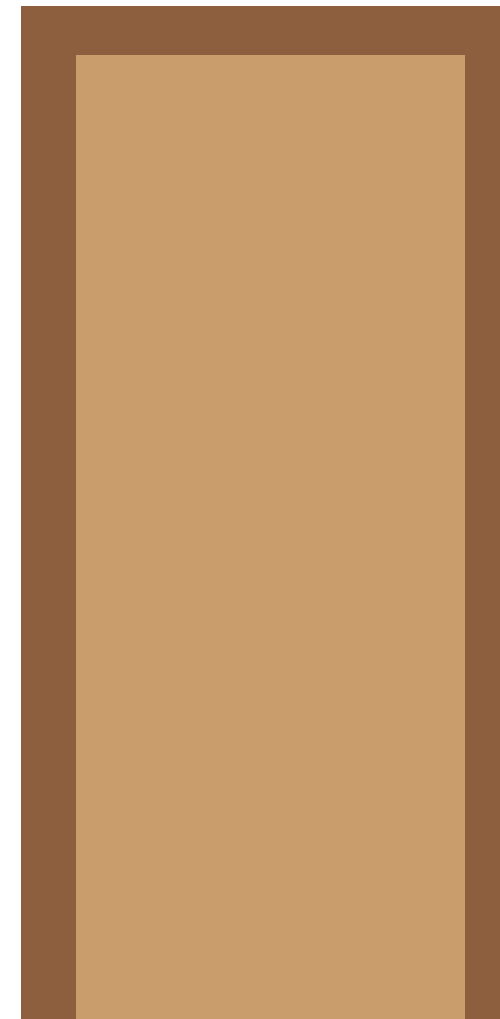
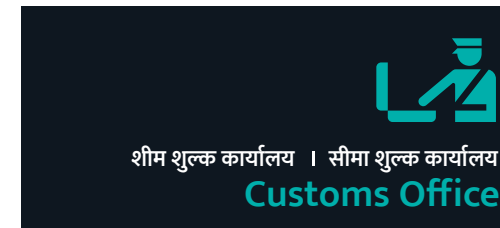
Sign Face Artwork ▲



Sign Front Elevation ▶

Note:

Artworks to be taken from the open file provided by the signage consultant.



Sign Adaptability as per Site Conditions:

In case of longer content the stacking of languages is recommended as shown in the artwork.

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Wall Projected Facility Announcer

Principle

These signs announce the various facilities and are projecting from wall.

Material Specification

1. Sign Face Two Sided: Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

2. Sign Frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. The panel should be made easily openable for maintenance.

3. Connector - Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

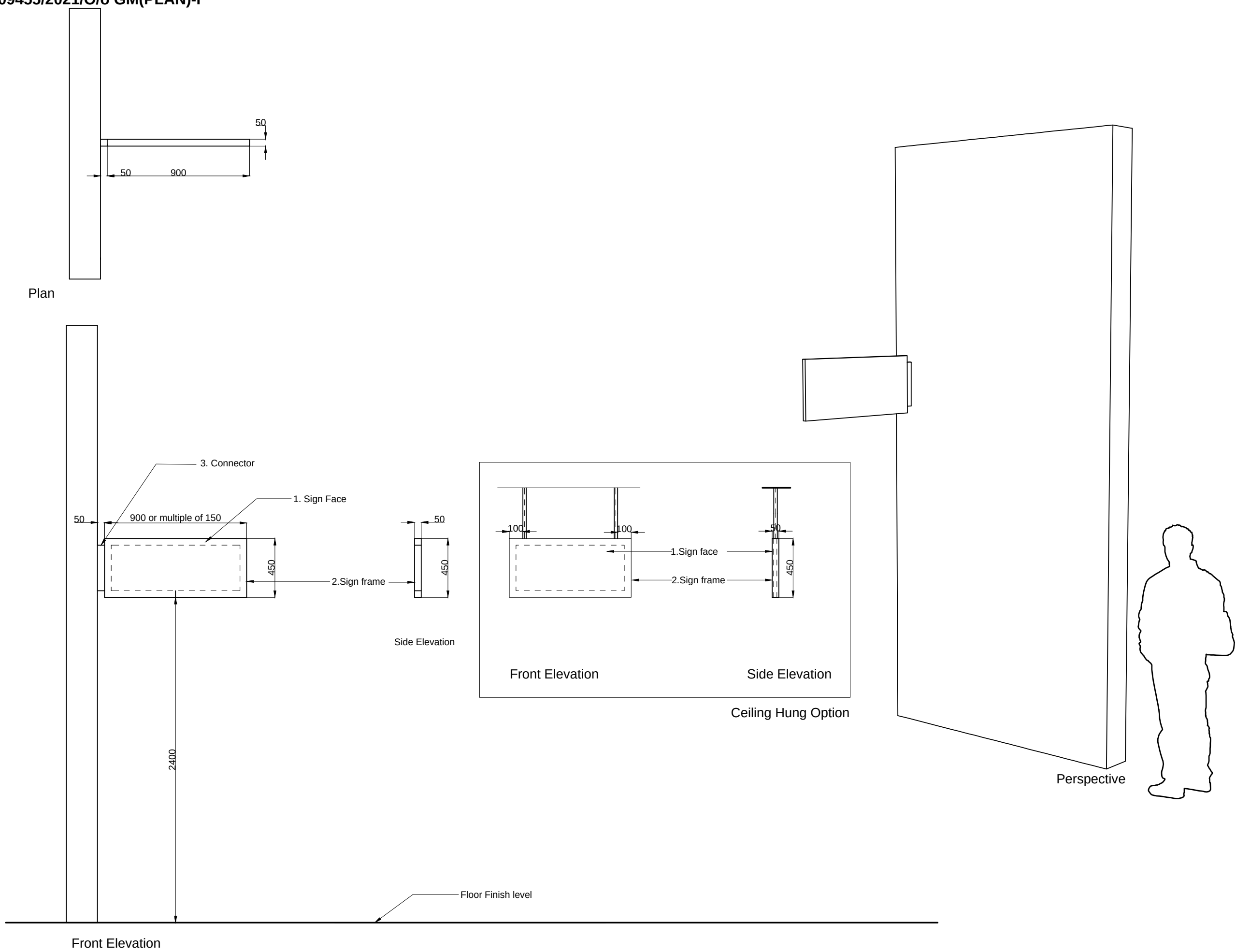
Sign Adaptability as per Site Conditions:

Alternate fixing options:

In case wall mounting is not possible(e.g. glass partition etc.) suspend from ceiling, with illumination. If ceiling also is too high or illumination is not possible, provide Vinyl Sticker on Glass.
Suspender - Telescopic suspender with height adjustment made of Stainless steel 35x35mm Hollow sections mounted on slabs/beams/ walls.

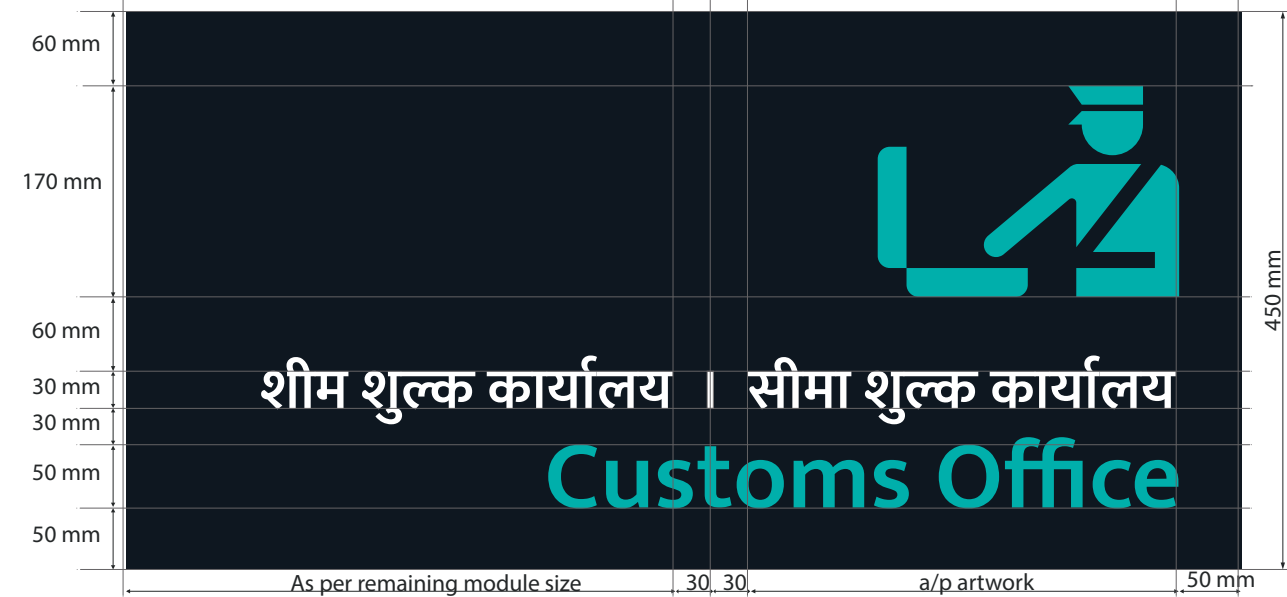
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Wall Projected Facility
Announcer

Note:
Artworks to be taken from the open file
provided by the signage consultant.



Sign Face Artwork ▲

Sign Type 2.2b

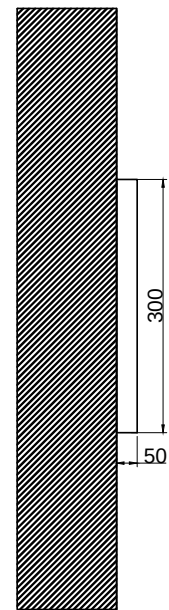


Sign Front Elevation ►

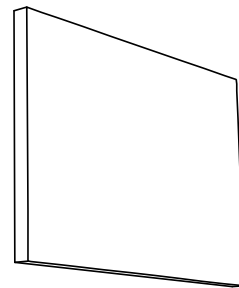


Sign Adaptability as per Site Conditions:
In case of longer content the stacking of
languages is recommended as shown in the
artwork.

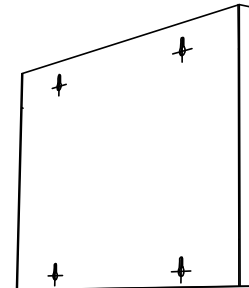
Keynotes:
The graphic template here specifies the grid,
composition and proportion of the content,
as per design intent. Final artworks will be
prepared by the Vendor along with shop
drawings and vetted structural design.



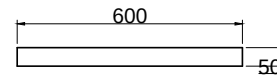
Side view



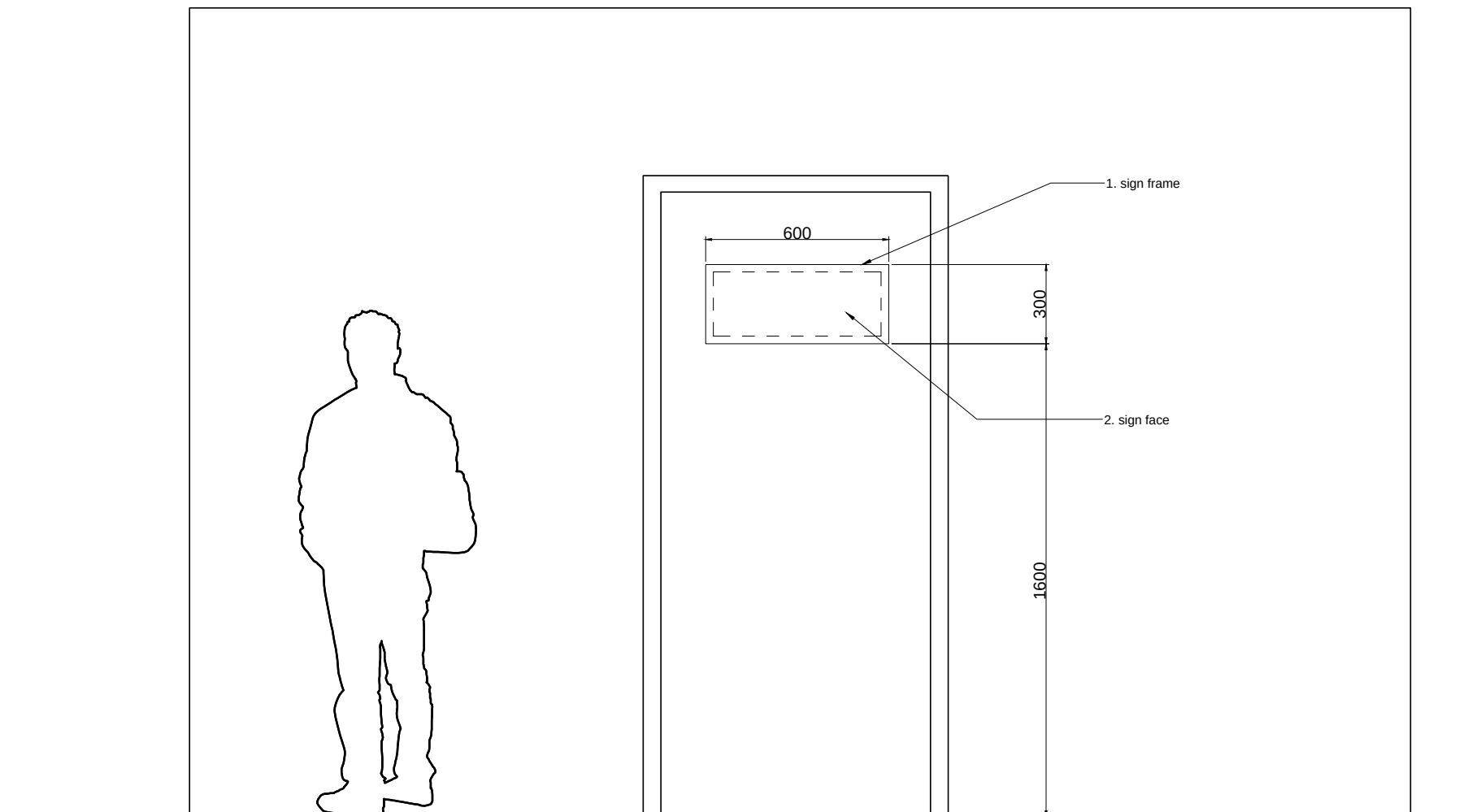
Front view



Rear view



Plan



Principle

These signs announce the various facilities and are mounted on door.

Material Specification

1. Sign Frame -25mm wide aluminium extrusion with inbuilt frame to receive the sign face. The panel should be made easily openable for maintenance.

2. Sign Face: Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

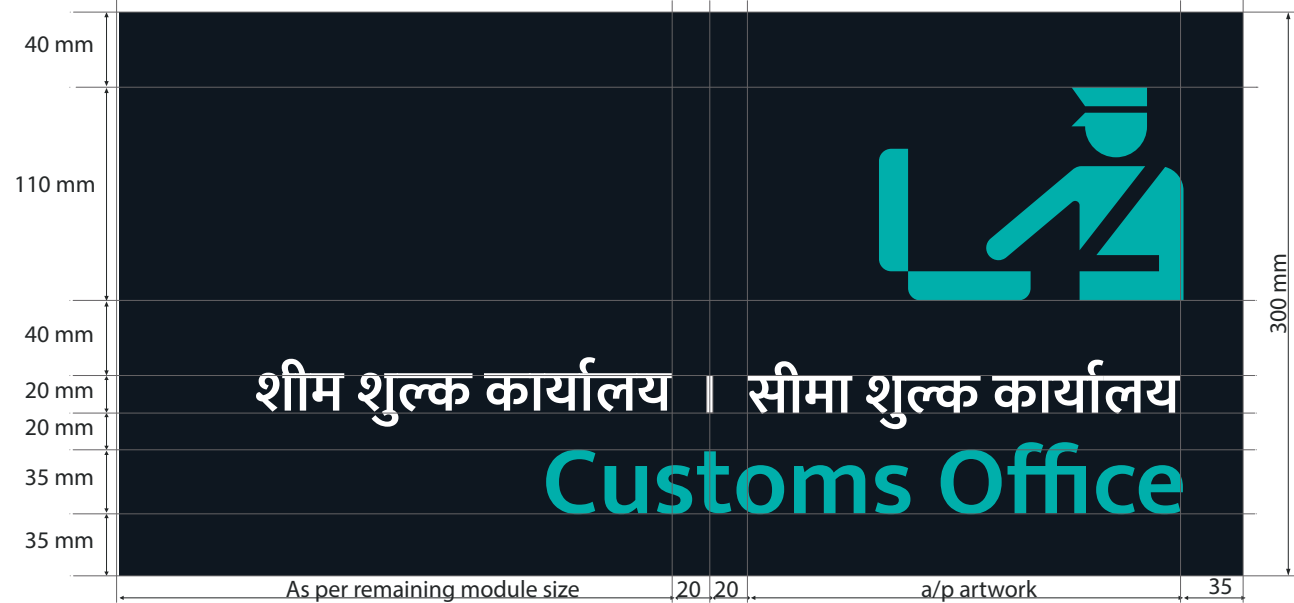
Incase of glass door only Sign face graphics (vinyl sticker) can be used,without the acrylic and structure.

Sign Adaptability as per Site Conditions:

- Maximum width of sign should be 600 mm.

Keynotes:

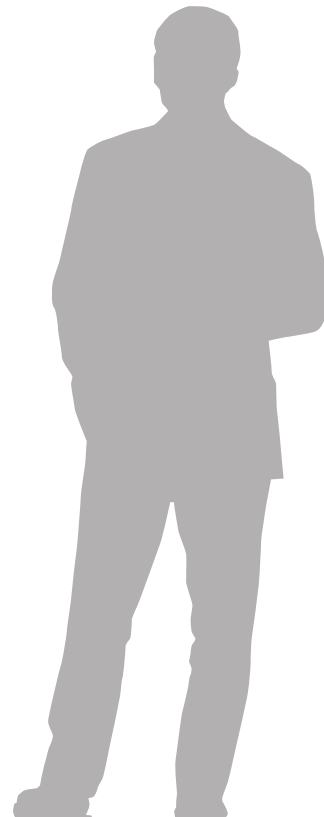
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Sign Face Artwork ▲



Sign Front Elevation ►



Note:

Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

In case of longer content the stacking of languages is recommended as shown in the artwork.

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Counter Mounted Facility Announcer

Principle

These signs announce the various facilities and are placed on the counters.

Material Specification

1. Sign face - Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

2. Sign frame -50mm wide aluminium extrusion with inbuilt frame to receive the sign face.
The panel should be made easily openable for maintainance.

3. Sign structure - All structural members in Stainless steel Hollow box section 75x75mm brush finish integrated with the design of counter mounted on floor with all data and electrical cableing concealeaed inside, base plate embedded below the floor finish and provided with a cover plate. All hardware used for fixing of sign shall be Stainless steel.

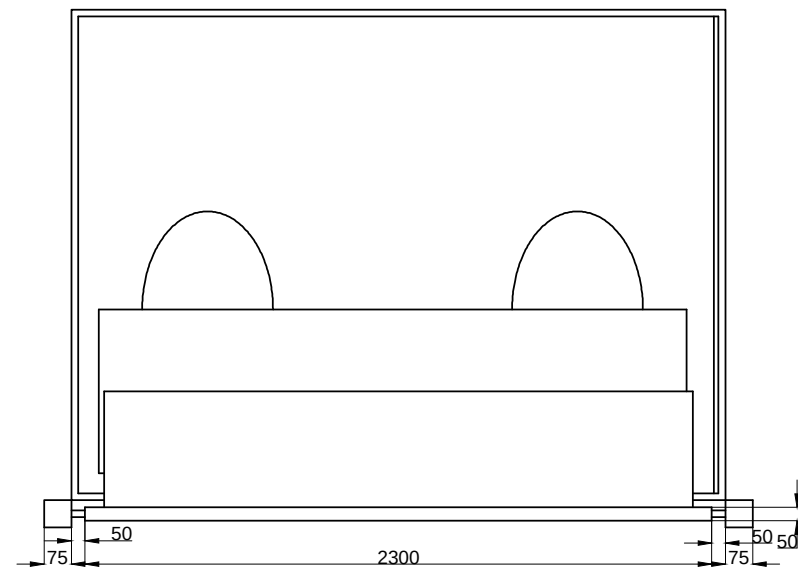
4. Connector: Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

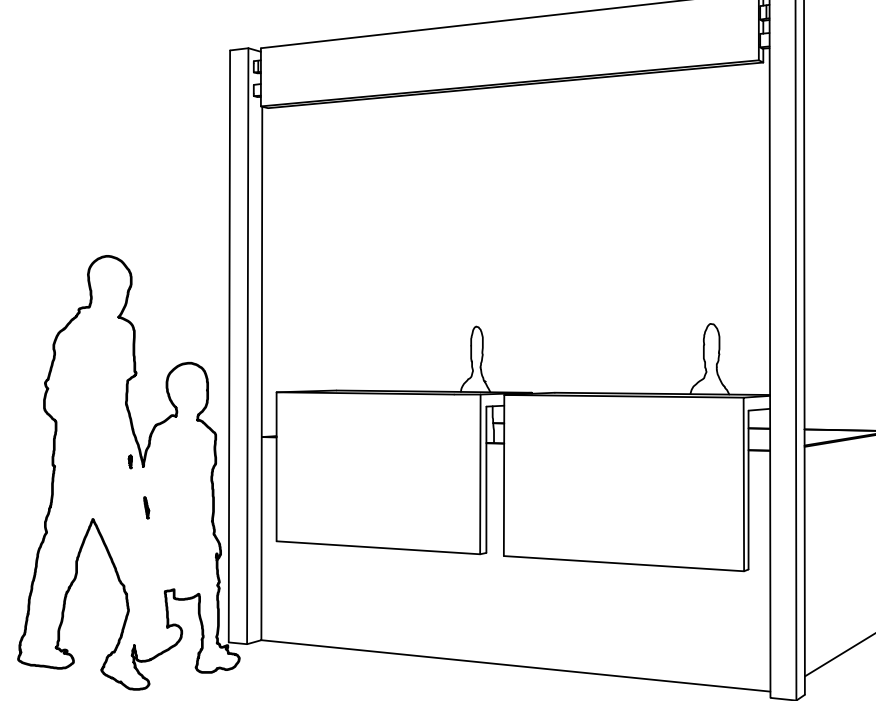
Sign Adaptability as per Site Conditions:

Keynotes:

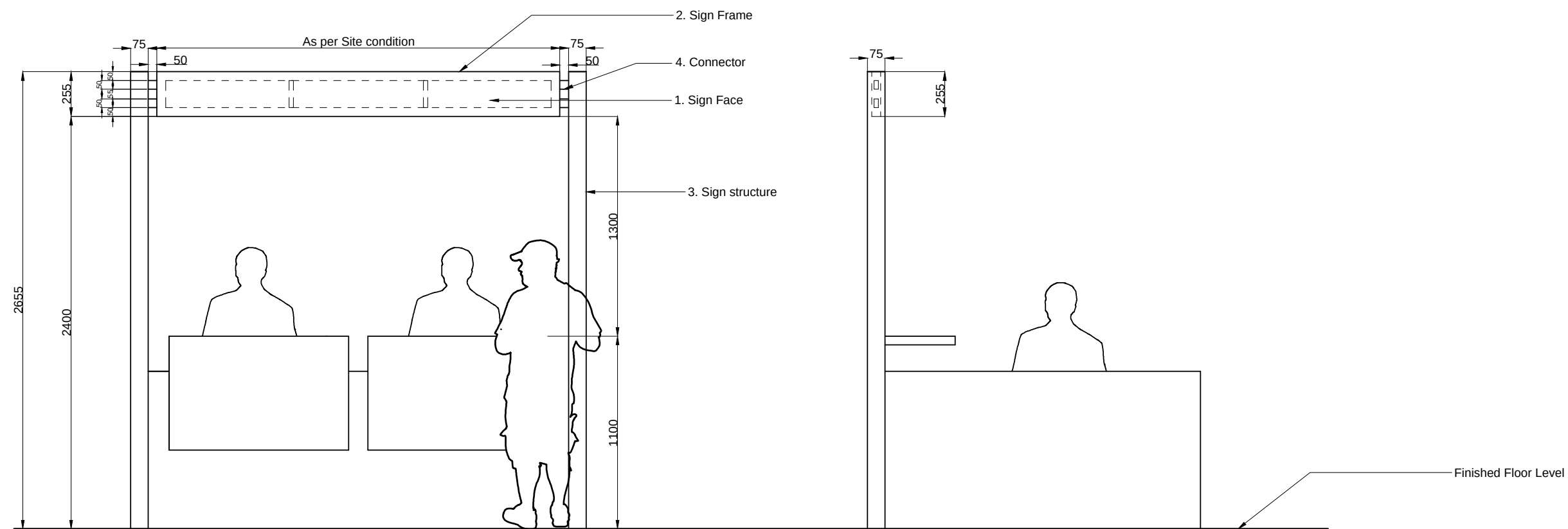
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Plan

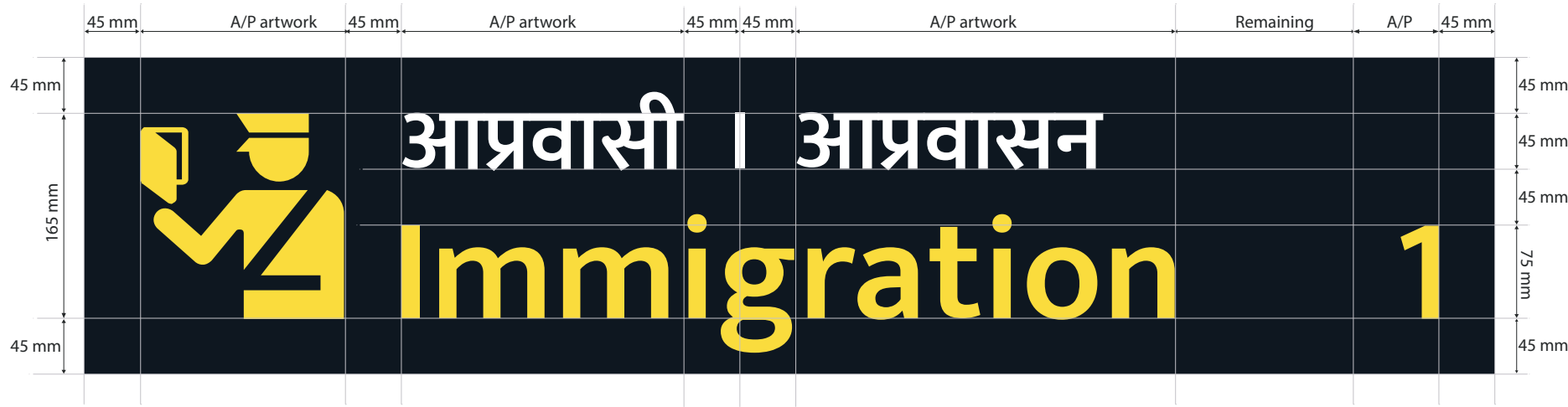


Perspective



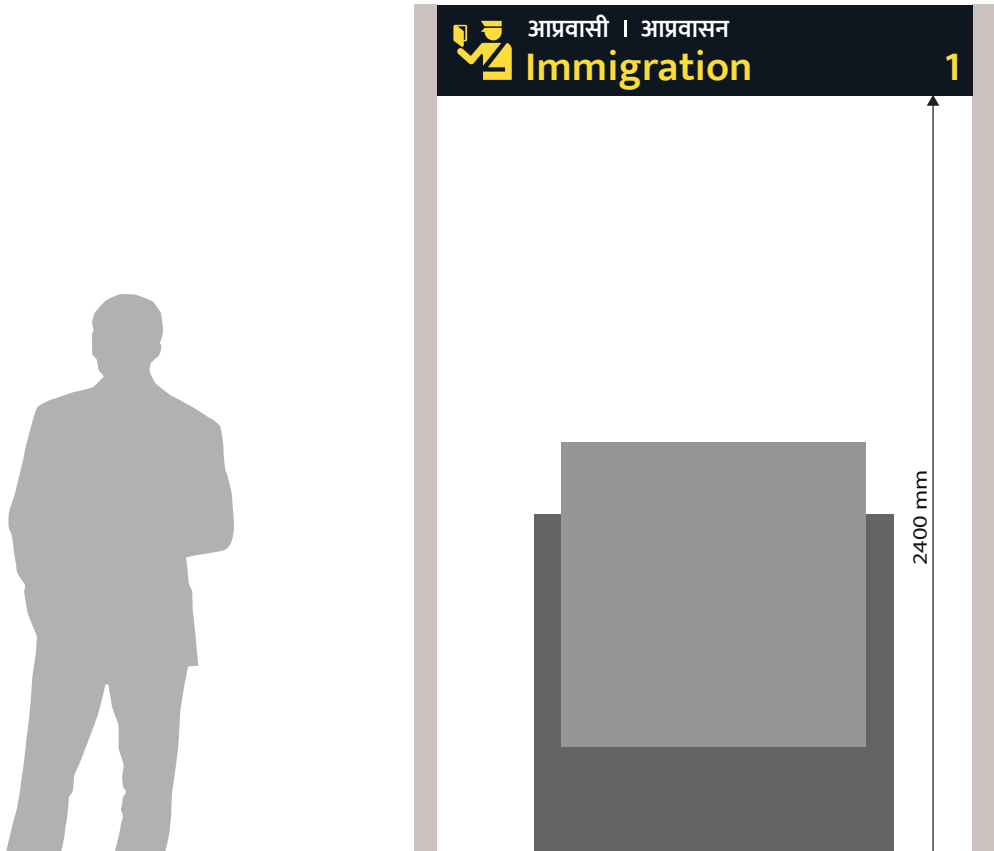
Front Elevation

Side Elevation



Sign Face Artwork ▲

Note:
Artworks to be taken from the open file provided by the signage consultant.



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

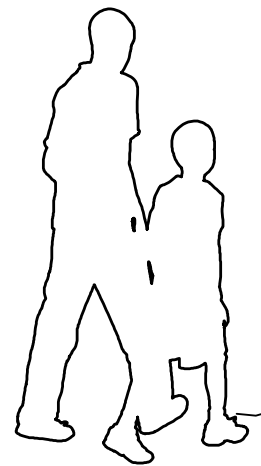
Principle

Material Specification

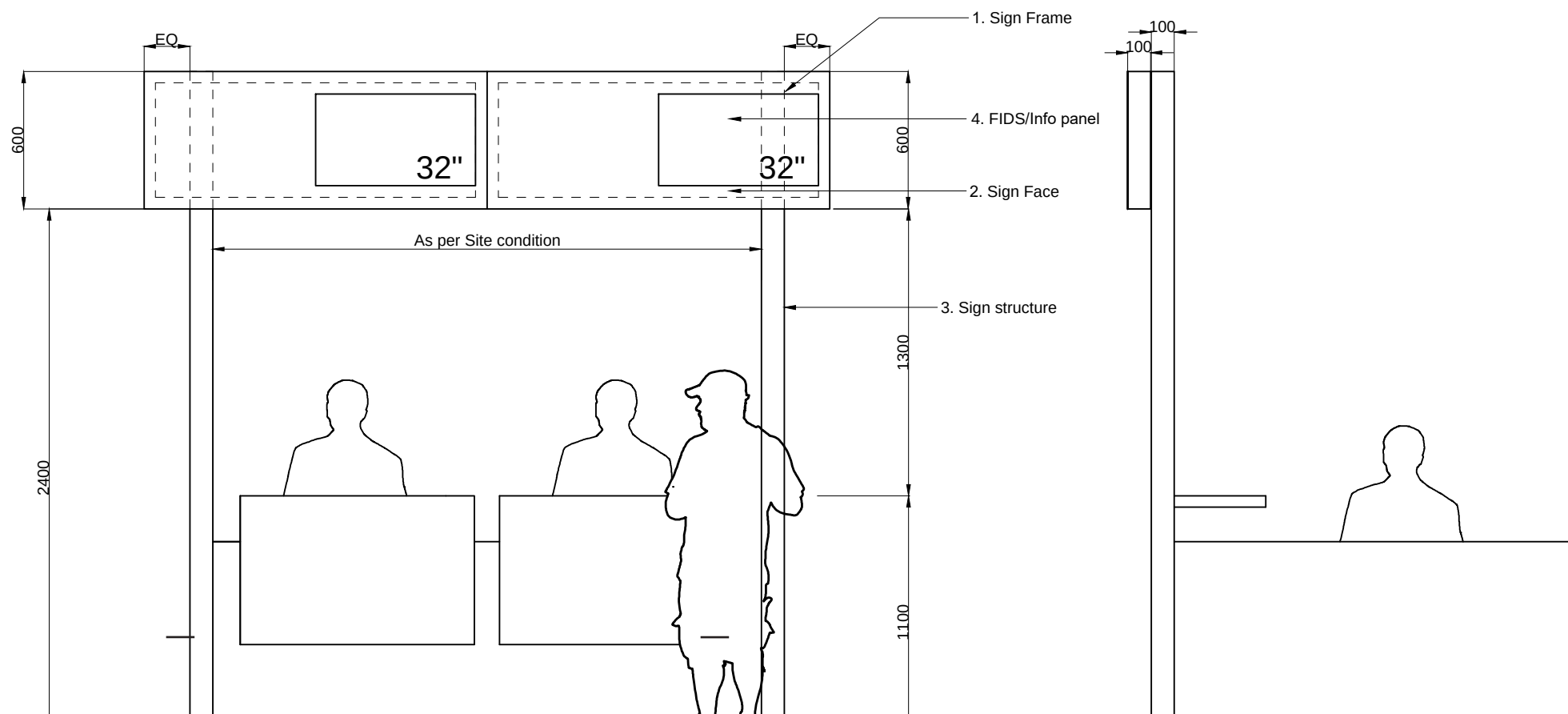
- Sign Adaptability as per Site Conditions:**

Keynotes:

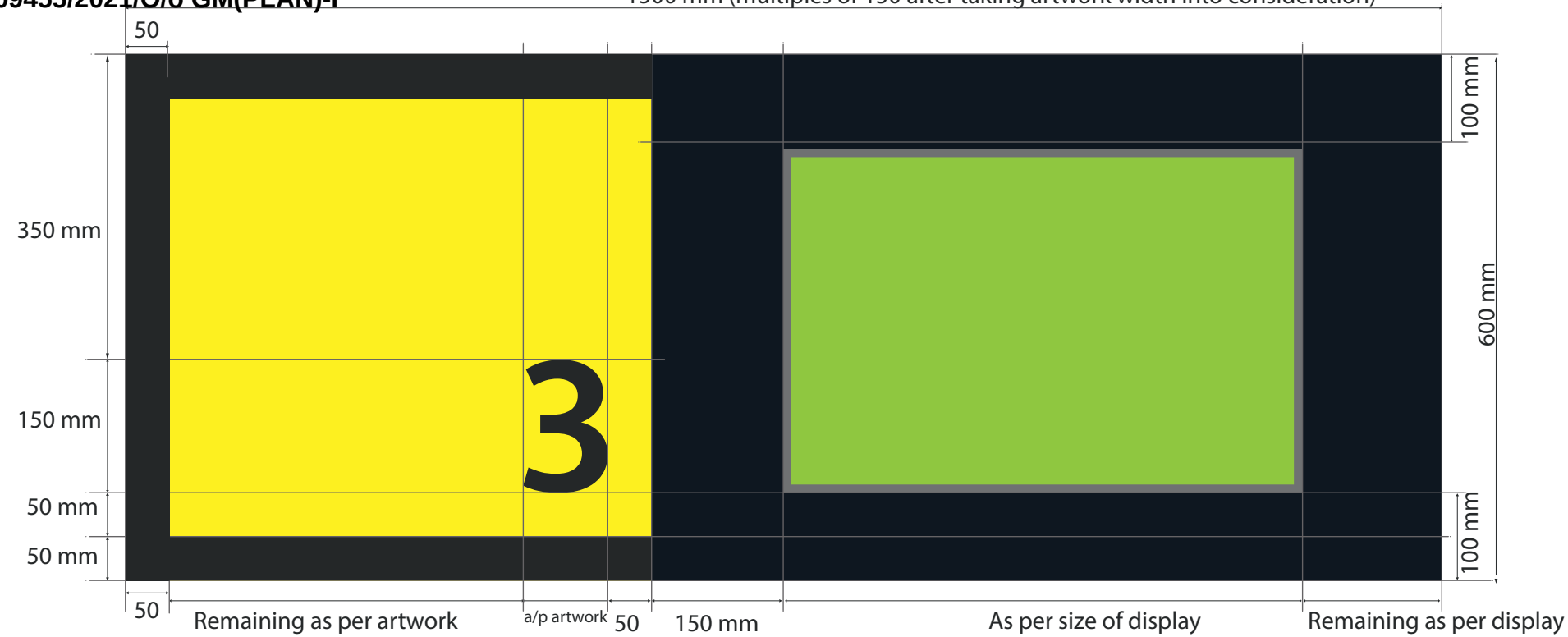
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



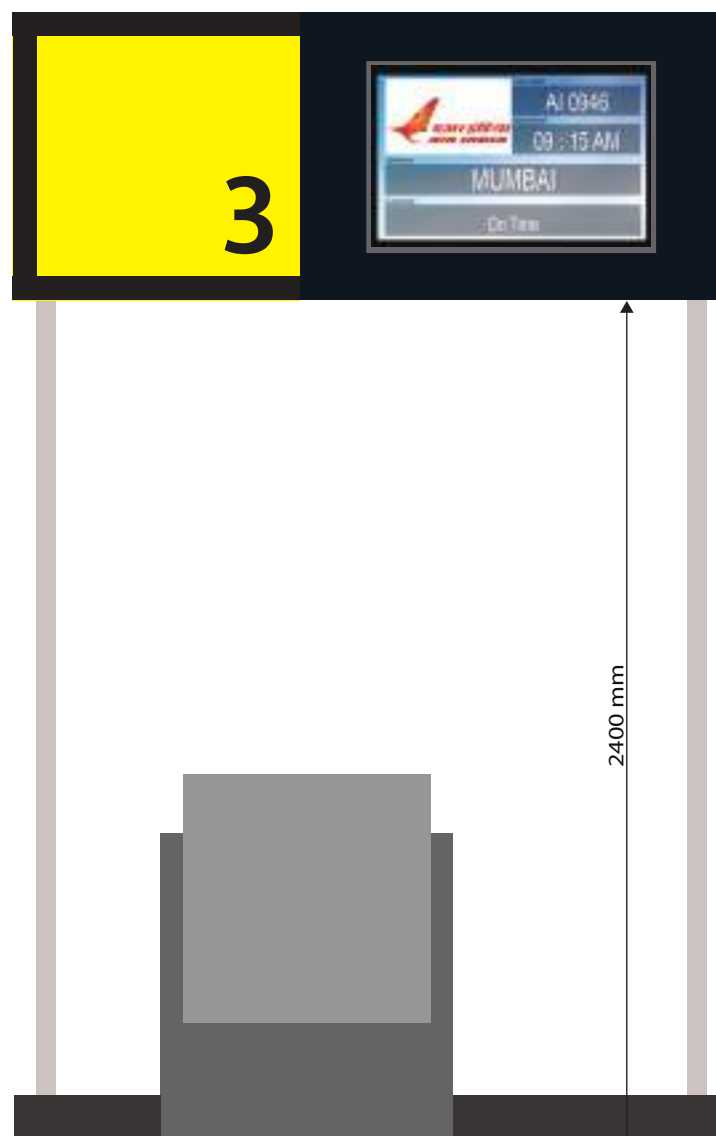
Perspective



— Finished FI



Sign Face Artwork ▲



Counter Mounted Facility Announcer - with screen

Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Ceiling Hung Facility Announcer Sign

Principle

Ceiling hung facility announcer help identify the red-green chanel and immigration.

Material Specification

1. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.
2. Sign face -Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.
3. Suspender - Telescopic 35x35mm Stainless steel Hollow sections mounted on slabs/ beams/walls. All hardware used for fixing of sign shall be Stainless steel.

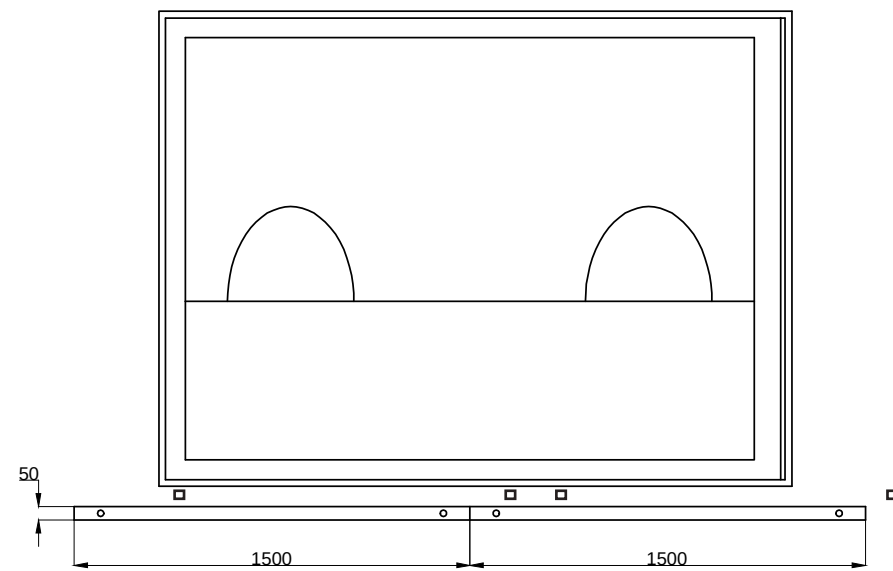
Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

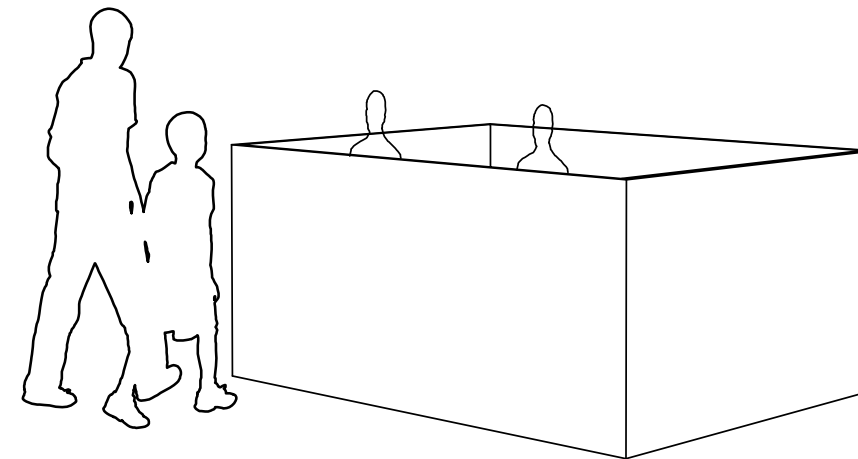
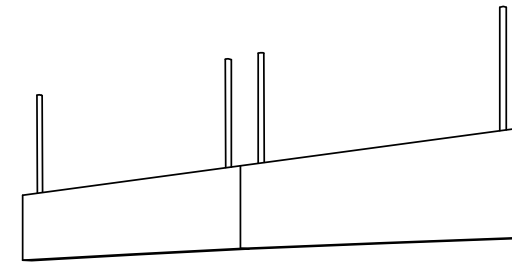
Sign Adaptability as per Site Conditions:

Keynotes:

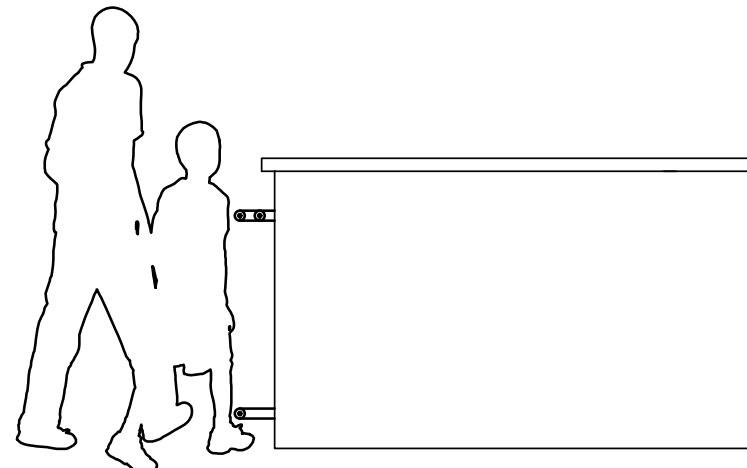
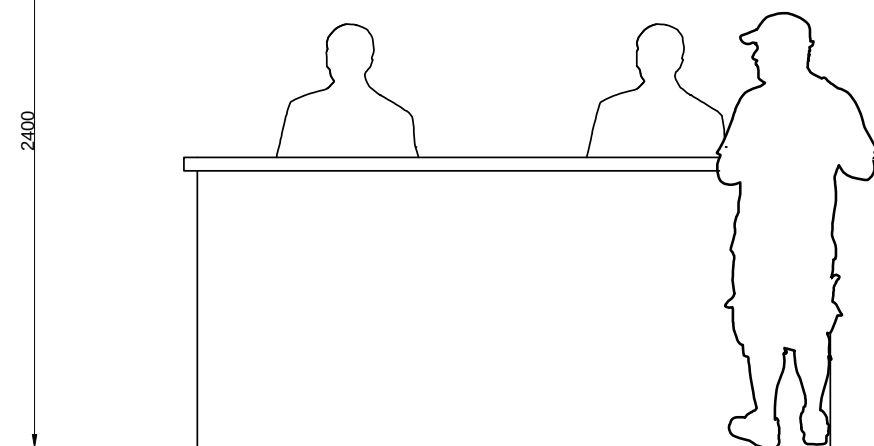
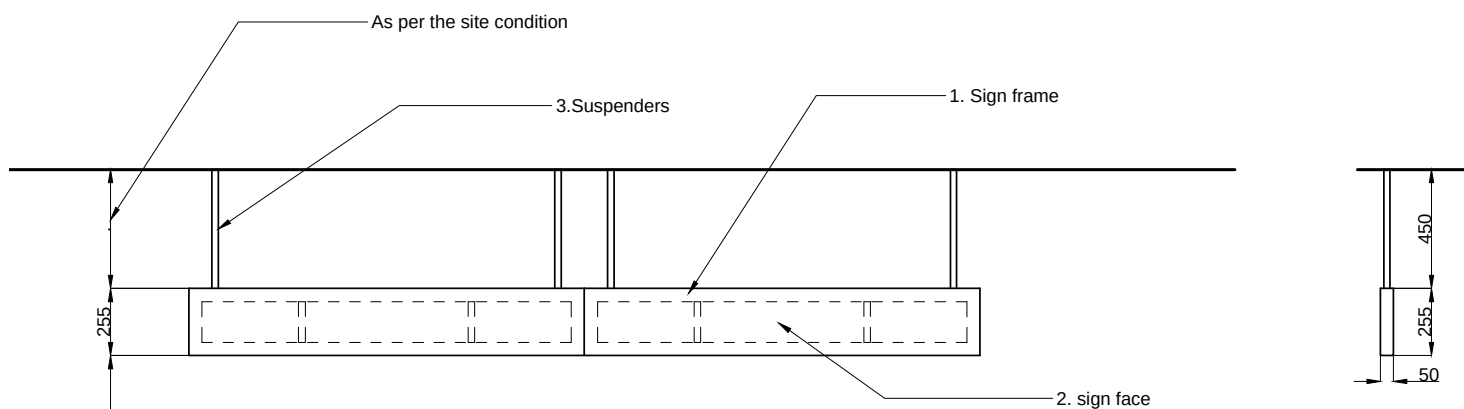
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

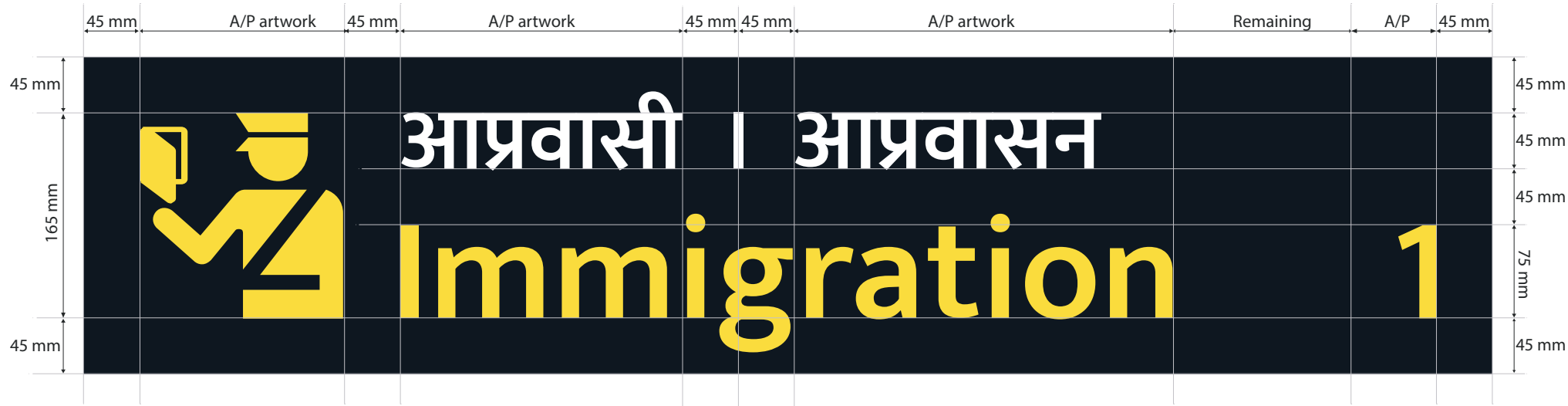


Plan

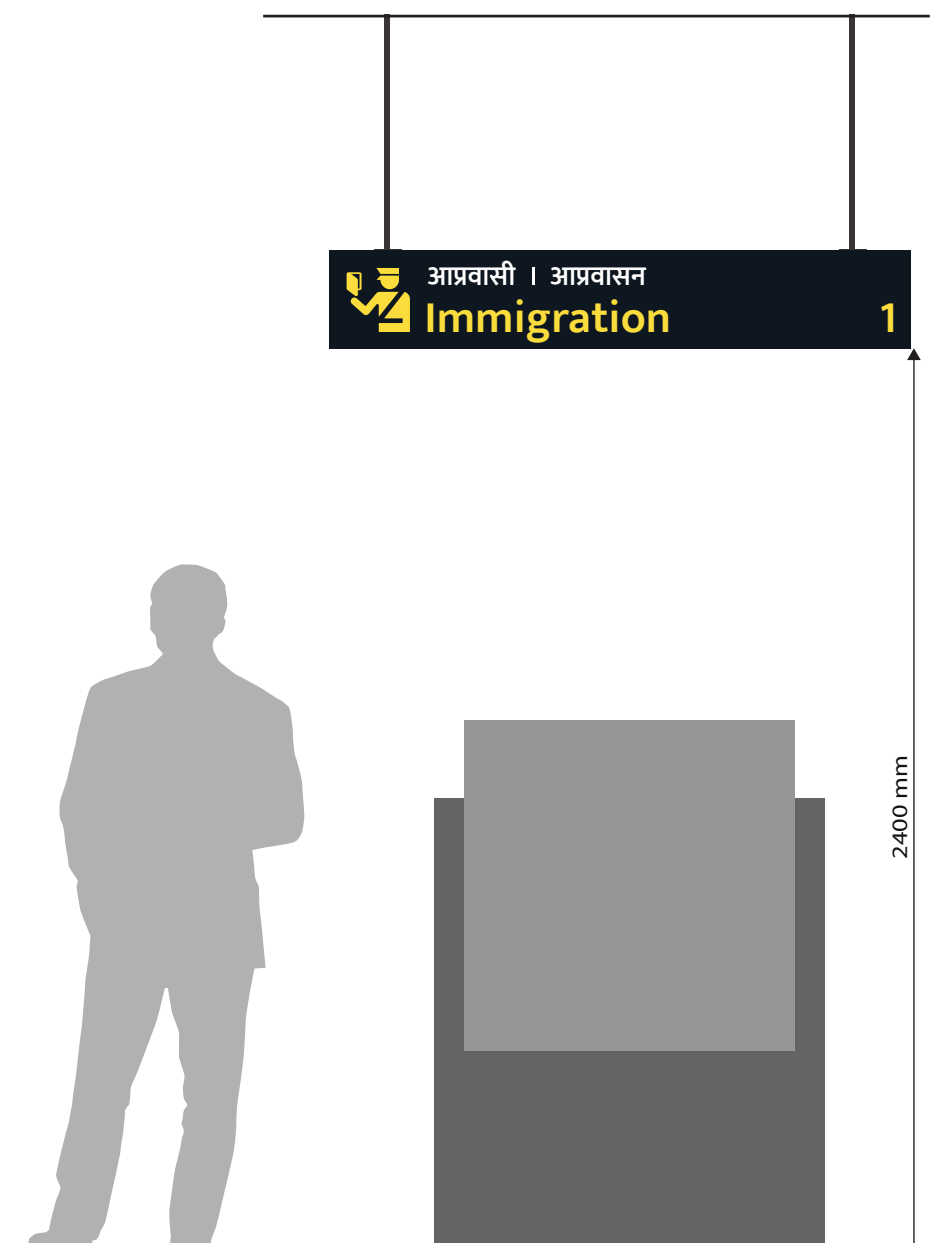


Perspective





Sign Face Artwork ▲



Sign Front Elevation ►

Ceiling Hung Facility Announcer Sign

Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Ceiling Hung Facility Announcer Sign - With Screen

Principle

Ceiling hung facility announcer with screens help identify the check in counters.

Material Specification

1. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. The panel should be made easily openable for maintainance.
2. Sign face - Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.
3. FIDS/Information Panel- Digital Panel mounted on cross ties internally, with brackets designed for the specified sizes ie. 32". Provision of detail of screen fixing arrangement and ventilation arrangement should be considered while making the final shop drawing by the sinage contractor.
4. Suspender - Telescopic 35x35mm Stainless steel Hollow sections mounted on slabs/ beams/walls. All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

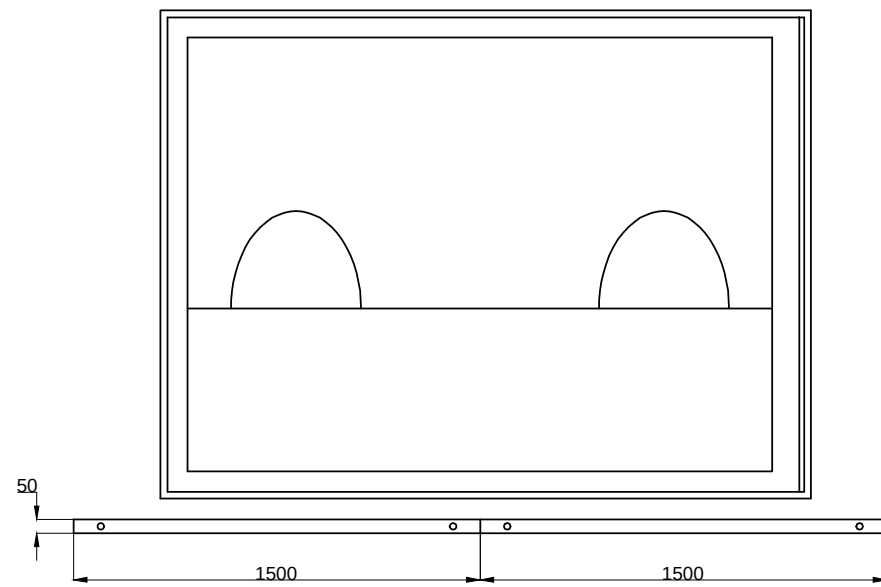
This Signage should properly accomodate the width of the FIDS/LED TVs of 32" & should be equipped with the periodical maintainance arrangement without disturbing the installed position of LED TVs.Adequate backside arrangement to avoid the led lights leakage.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

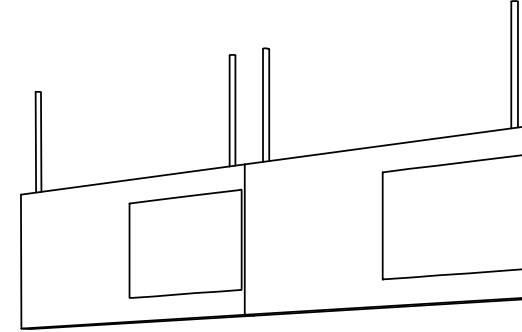
Sign Adaptability as per Site Conditions:

Keynotes:

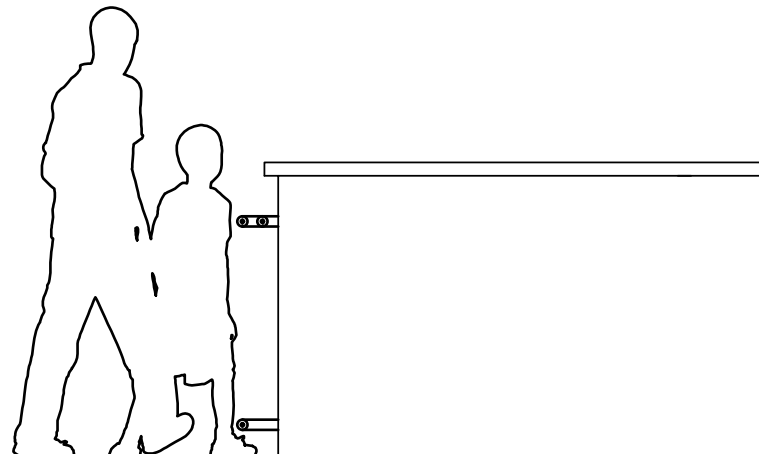
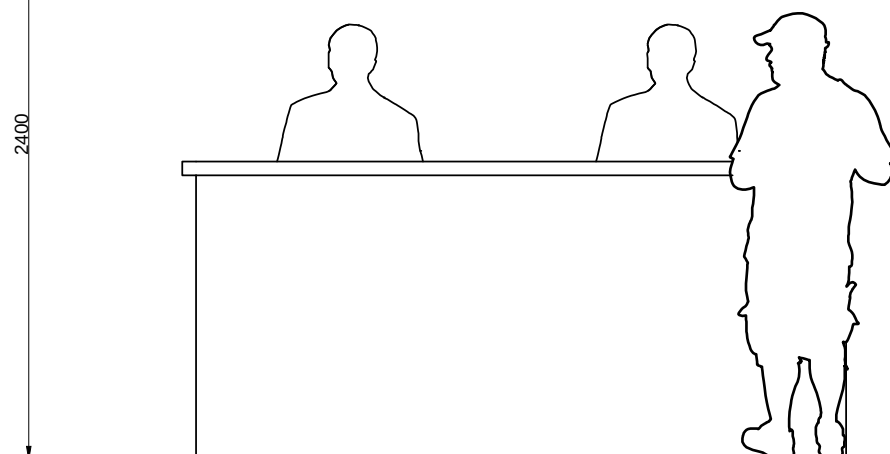
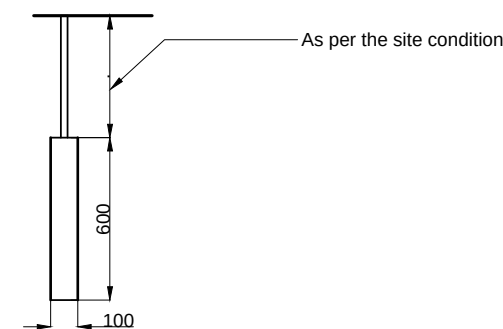
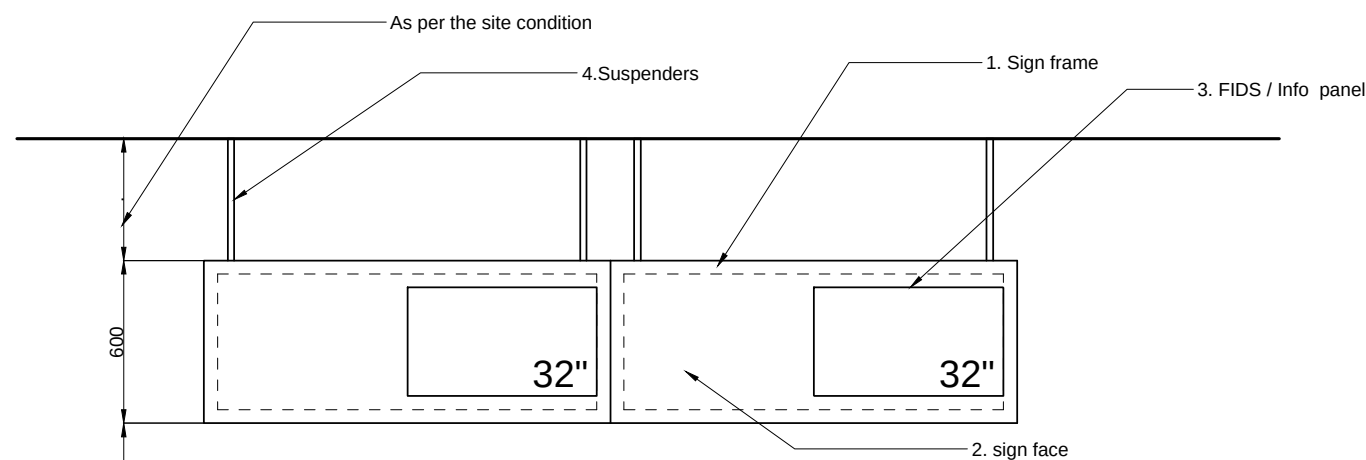
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

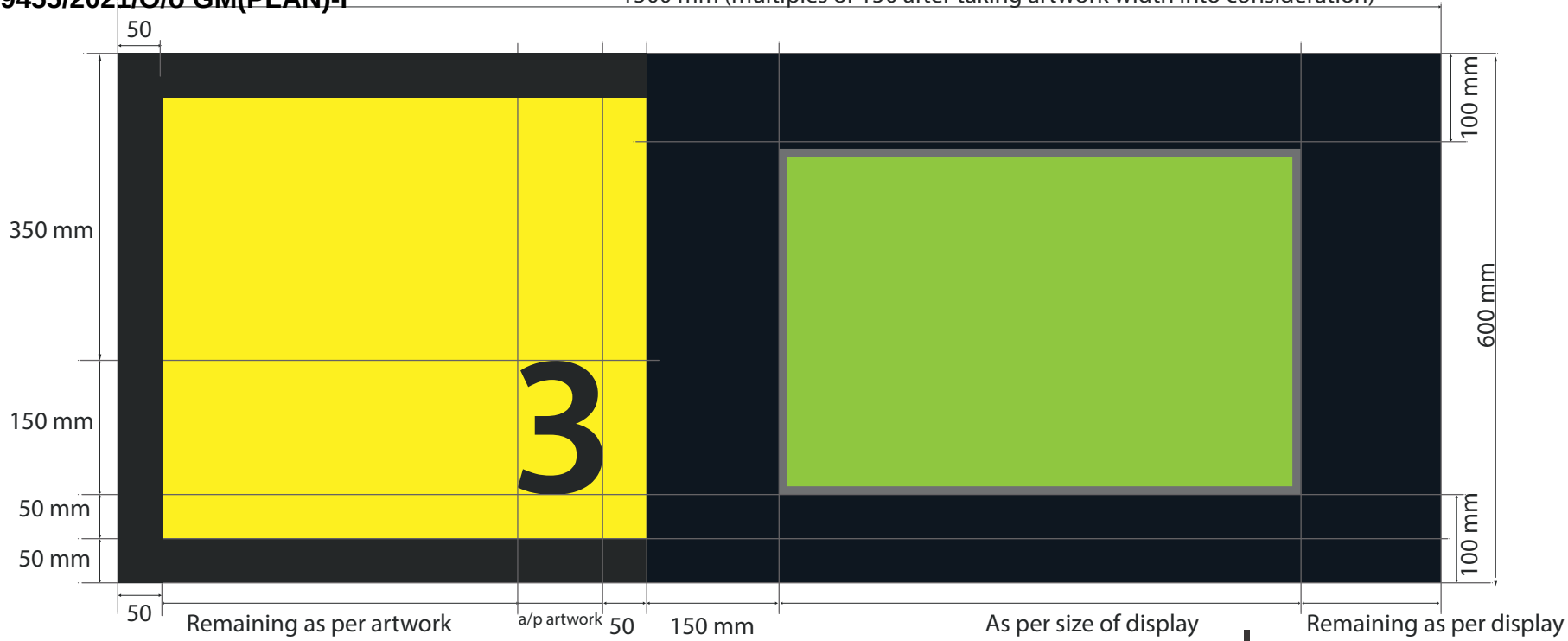


Plan

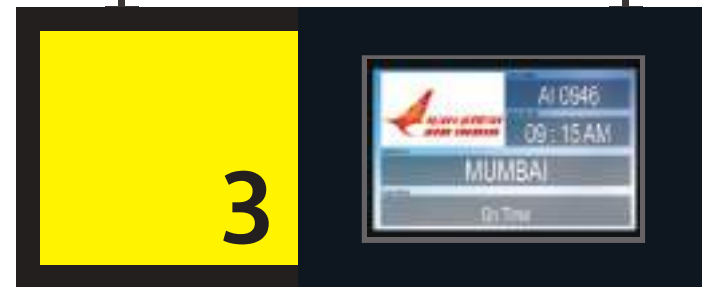


Perspective





Sign Face Artwork ▲



Ceiling Hung Facility Announcer Sign - With Screen

Note:

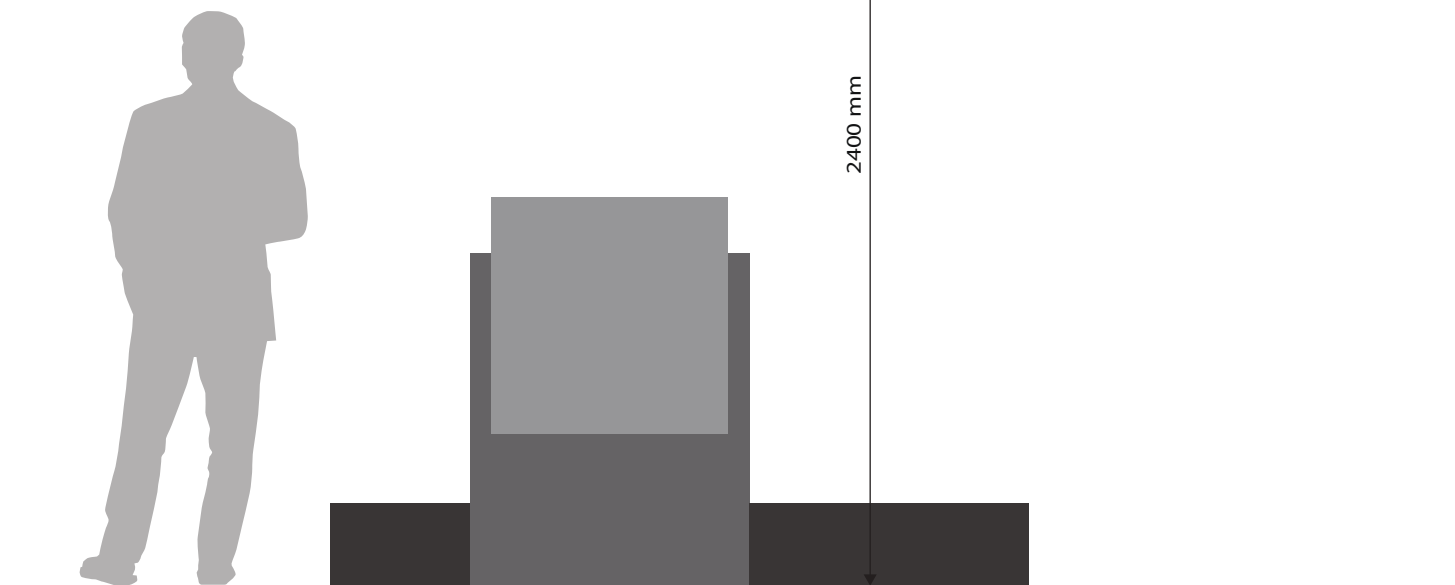
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Sign Front Elevation ►



Floor Mounted Facility Announcer

Principle

These signs announces various stand alone facilities without major structures and are mounted on pole.

Material Specification

1. Sign face: Two Sided : Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.

2. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.

3. Sign structure - All structural members in Stainless steel Hollow box section 100x100 brush finish, base plate embedded below the floor finish and provided with a cover plate.

4. Connector - Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

All hardware used for fixing of sign shall be Stainless steel
Secret fixing methods should be used to fix parts together.

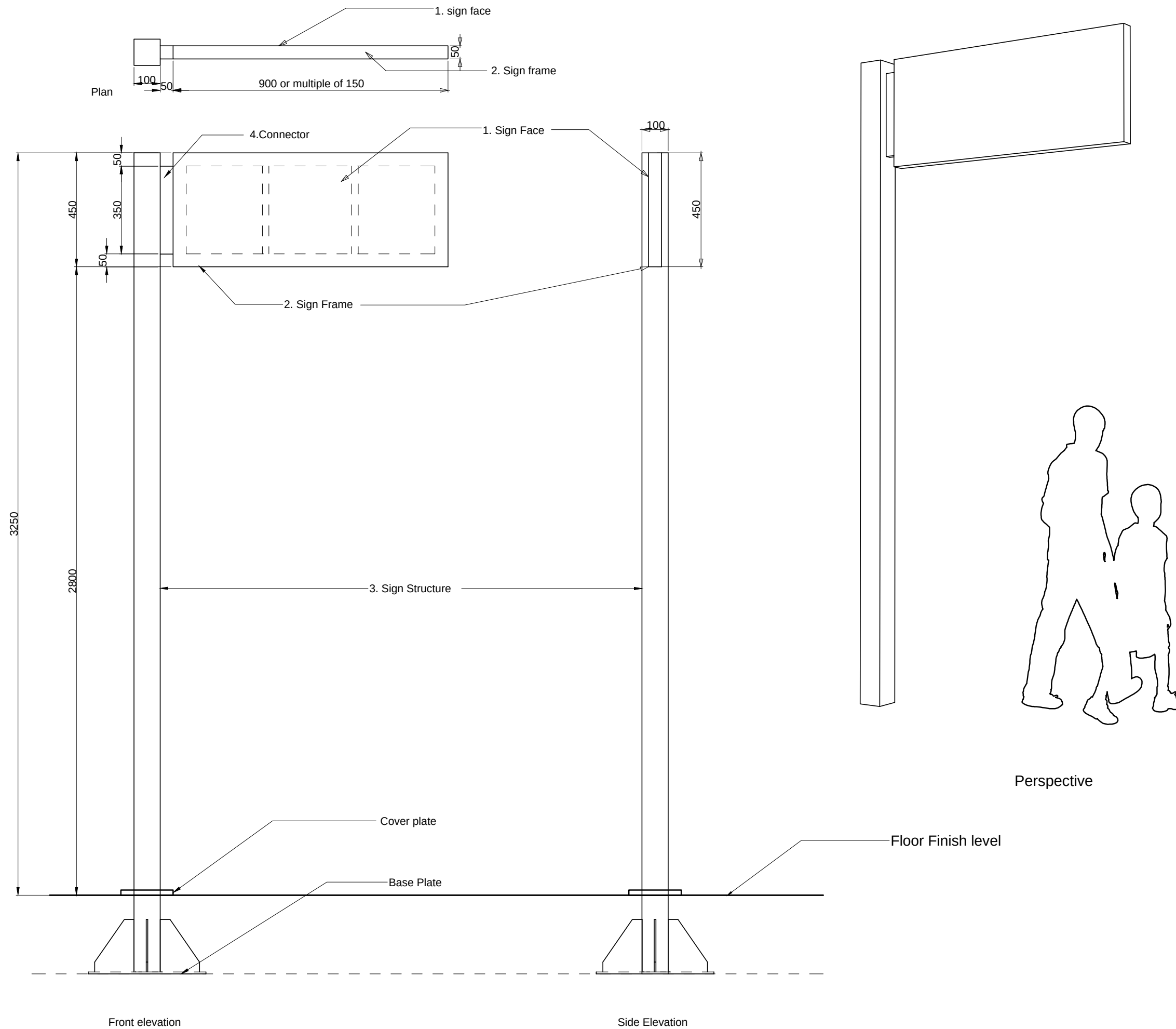
Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

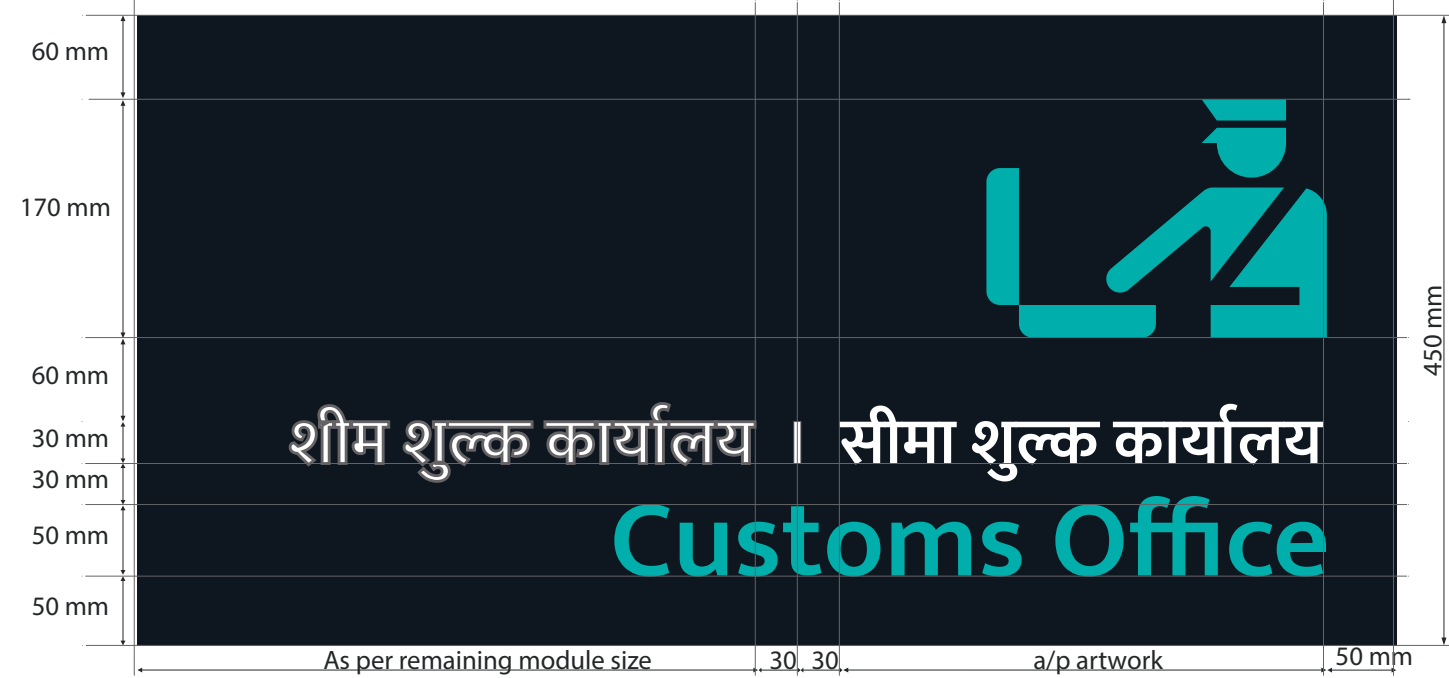
Sign Adaptability as per Site Conditions:

- Minimum sign face bottom should be 2400 mm, should not exceed 2800 mm.

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





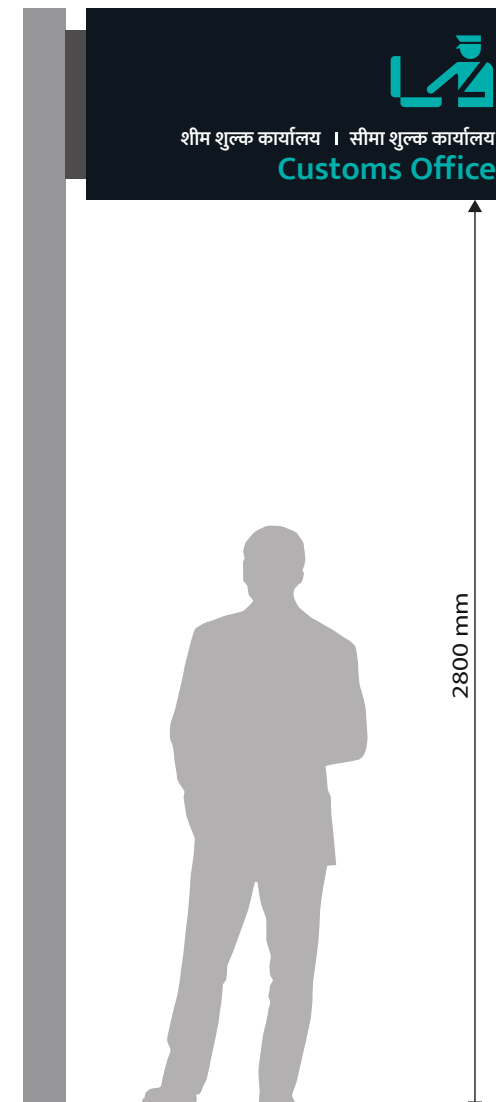
Sign Face Artwork ▲



Sign Front Elevation ►

Note:

Artworks to be taken from the open file provided by the signage consultant.



Sign Adaptability as per Site Conditions:

In case of longer content the stacking of languages is recommended as shown in the artwork.

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

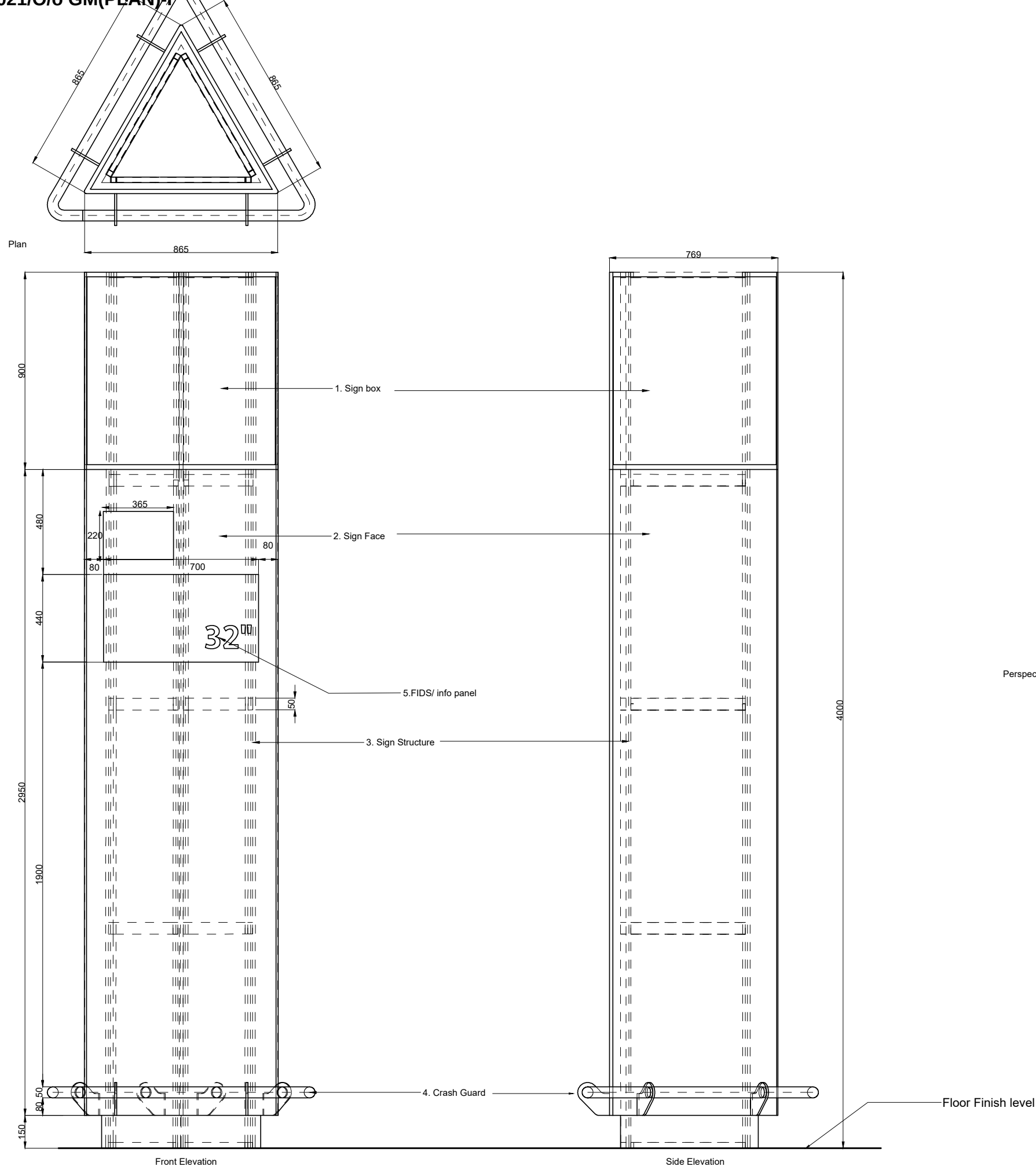
Boarding Gates - Totem

Principle

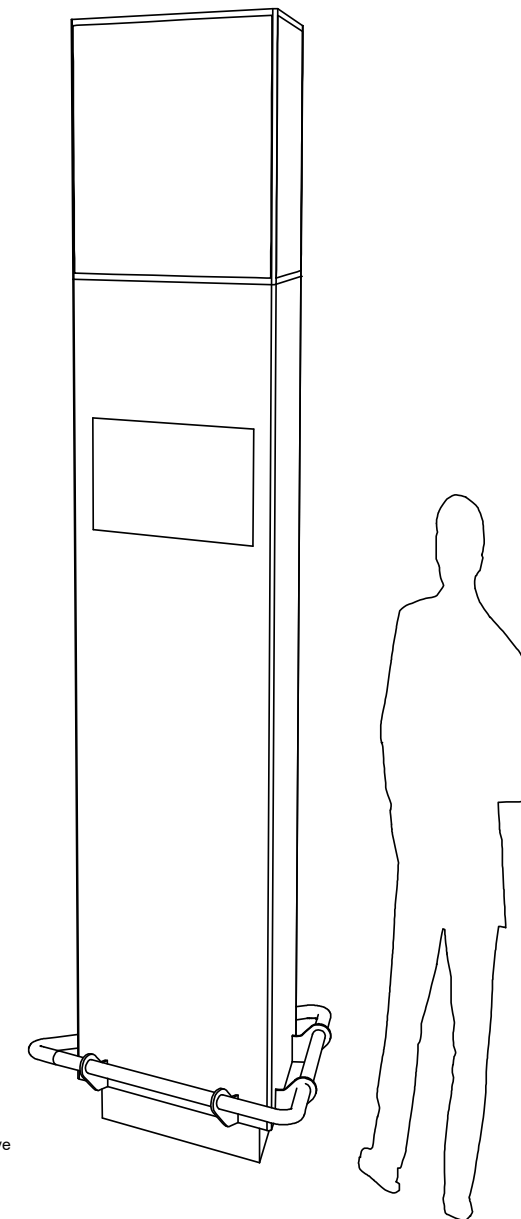
These sign help identify the boarding gates(remote or aero bridge).These also include the FIDS systems.

Material Specification

1. Sign Box: Lasercut,Bent Fabricated in 8mm thick white translucent 040 acrylic with vinyl matching pantone yellow C
 - 2.Sign face - 3 mm thick aluminium sheet fabricated, PU Painted with black RAL 9011. Through and through laser cutting for back lit text.
 3. Sign structure - MS square post 50mmx50mm and mounting square sections, hotdipped galvanised and PU Painted to match RAL 9006 grouted in ground.
 - 4.Crash Guard - Protection for sign from trollies ,wheeled baggage in 50 mm dia stainless steel brush finished pipe fixed with 8 mm SS plate brackets
 5. FIDS/Information Panel- Digital Panel mounted on cross ties internally, with brackets designed for the specified sizes ie. 32".
- Provision of detail of screen fixing arrangement and ventilation arrangement should be considered while making the final shop drawing by the sinage contractor.
- All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.
- This Signage should properly accomodate the width of the FIDS/LED TVs of 32" & should be equipped with the periodical maintainance arrangement without disturbing the installed position of LED TVs.Adequate backside arrangement to avoid the led lights leakage.
- Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.
- Sign Adaptability as per Site Conditions:**
- Minimum sign height should be 2400 mm, should not exceed 2950 mm



Perspective

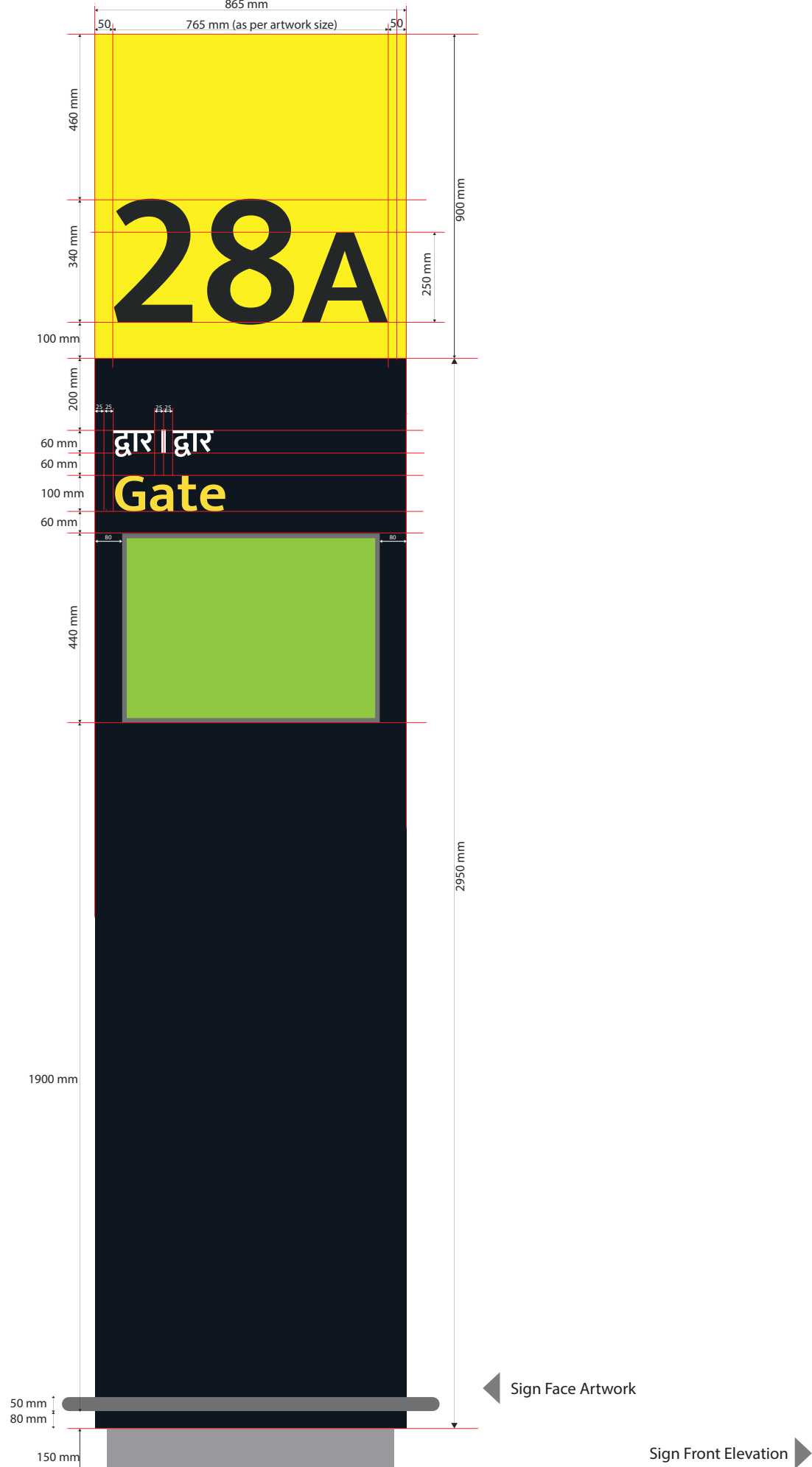


Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

Boarding Gates - Totem

Note:
Artworks to be taken from the open file provided by the signage consultant.



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Boarding Gates - Wall Projected

Principle

These sign help identify the boarding gates(remote or aero bridge).

Material Specification

1. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to relieve the sign face. The panel should be made easily openable for maintainance.
2. Sign face: Two Sided: Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick White translucent 040 acrylic.
3. Connector - Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

All hardware used for fixing of sign shall be Stainless steel. Projection supported internally by side mounting of SS frame. Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

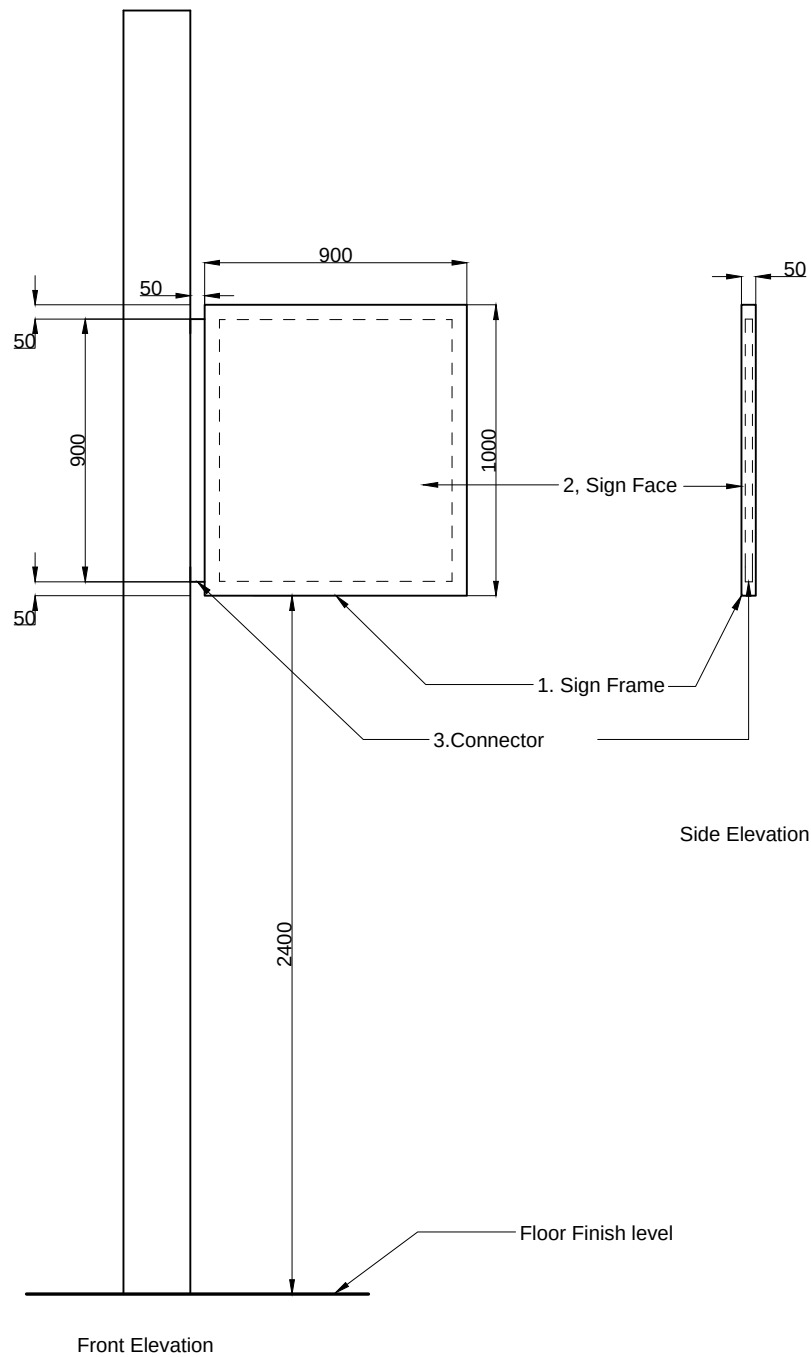
Sign Adaptability as per Site Conditions:

As per site conditions it can be reduced to 50% OR 75%.

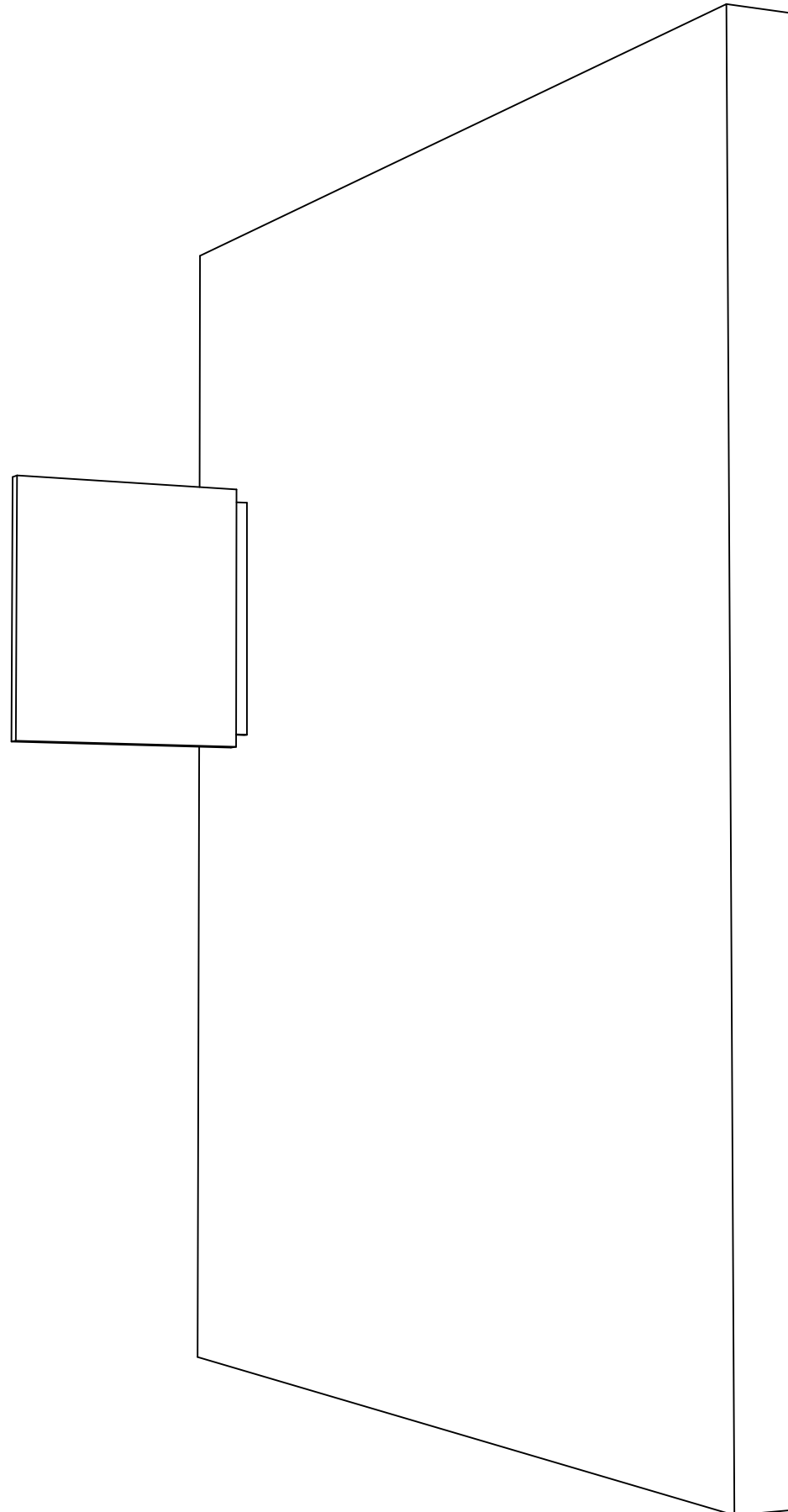
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

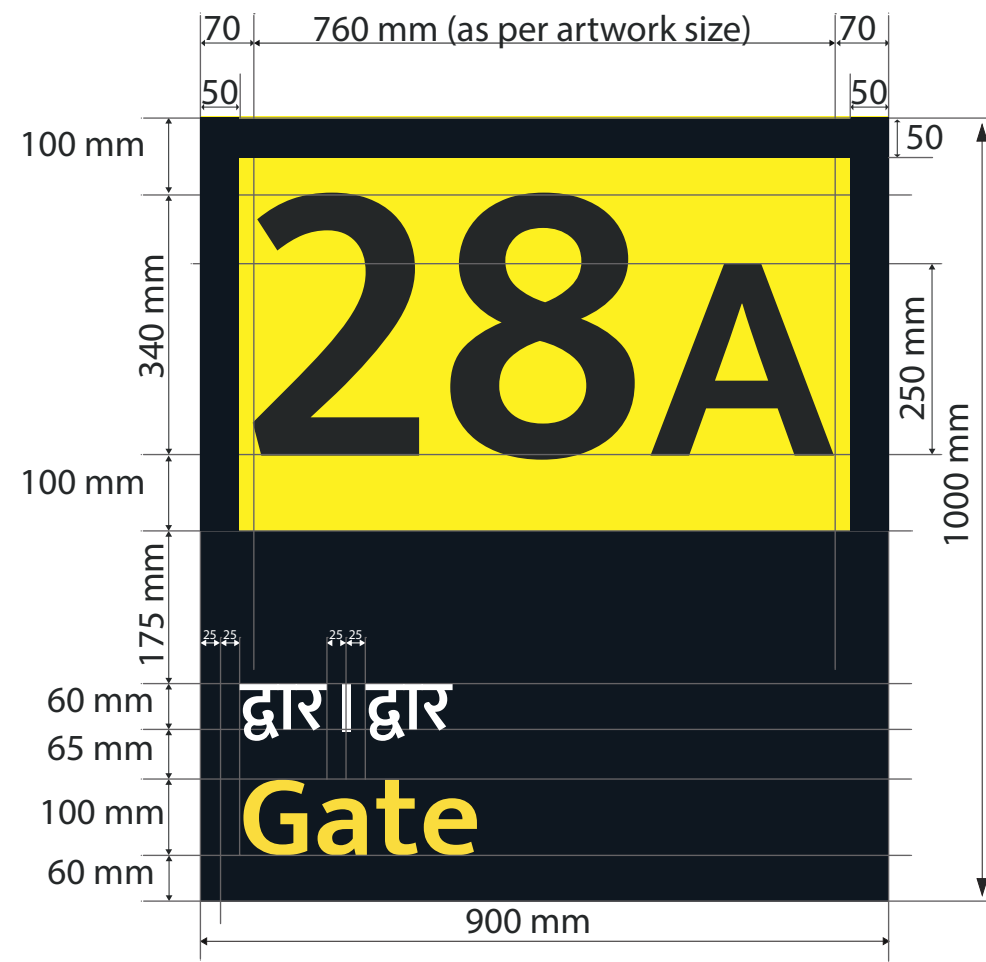
Plan



Perspective



Boarding Gates - Wall Projected

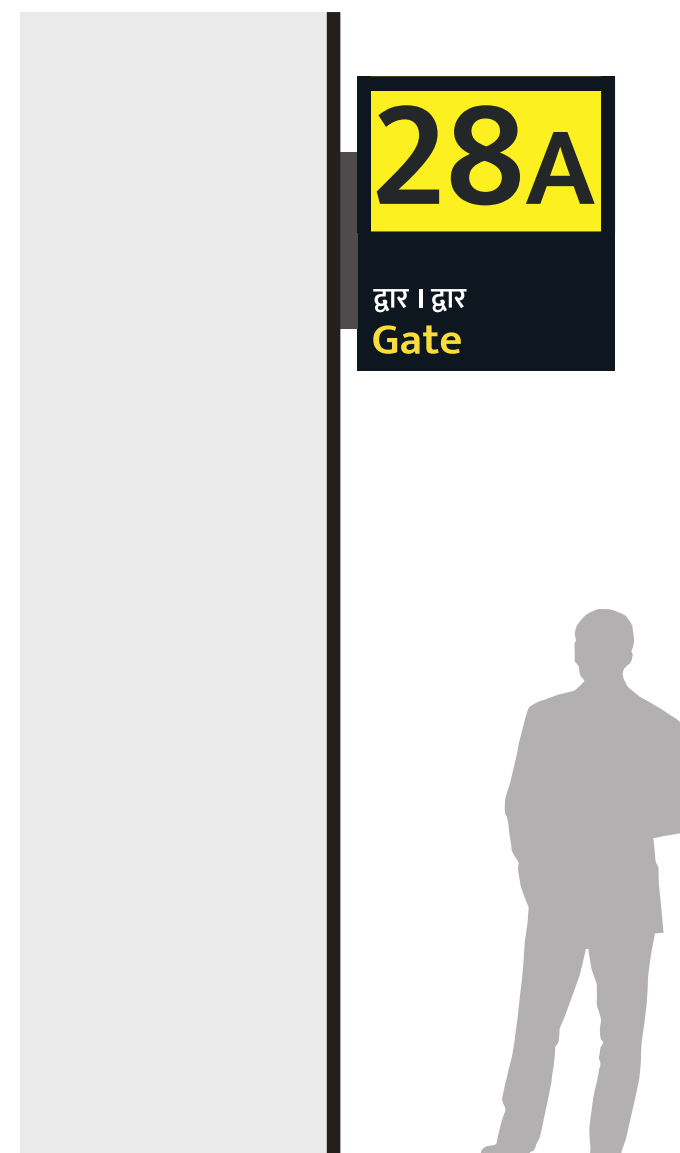


Sign Face Artwork ▲

Note:

Artworks to be taken from the open file provided by the signage consultant.

Artwork in yellow vinyl box is to be center aligned.



Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

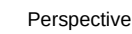
Principle

Material Specification

- Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Keynotes:

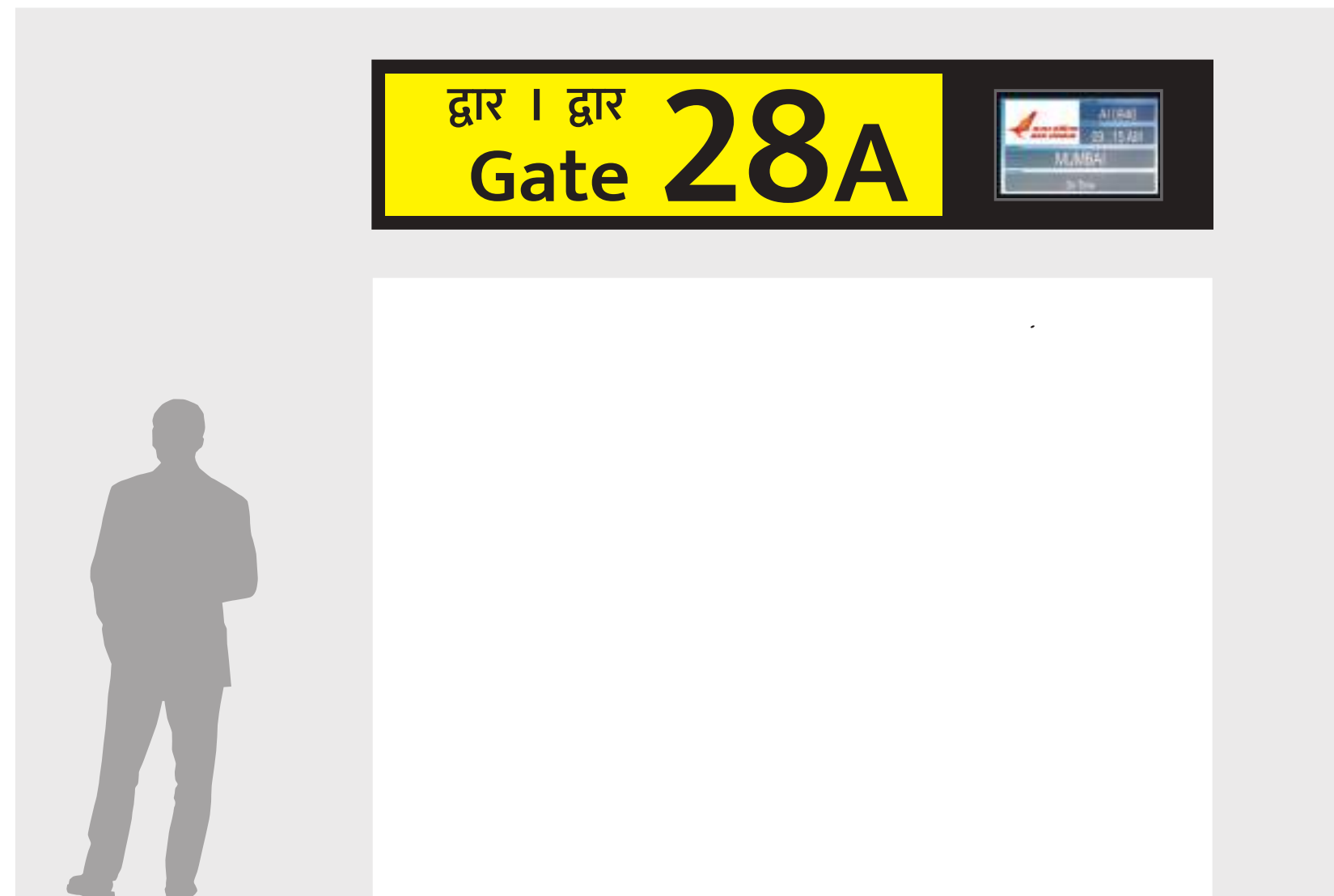
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





Note:
Artworks to be taken from the open file provided by the signage consultant.

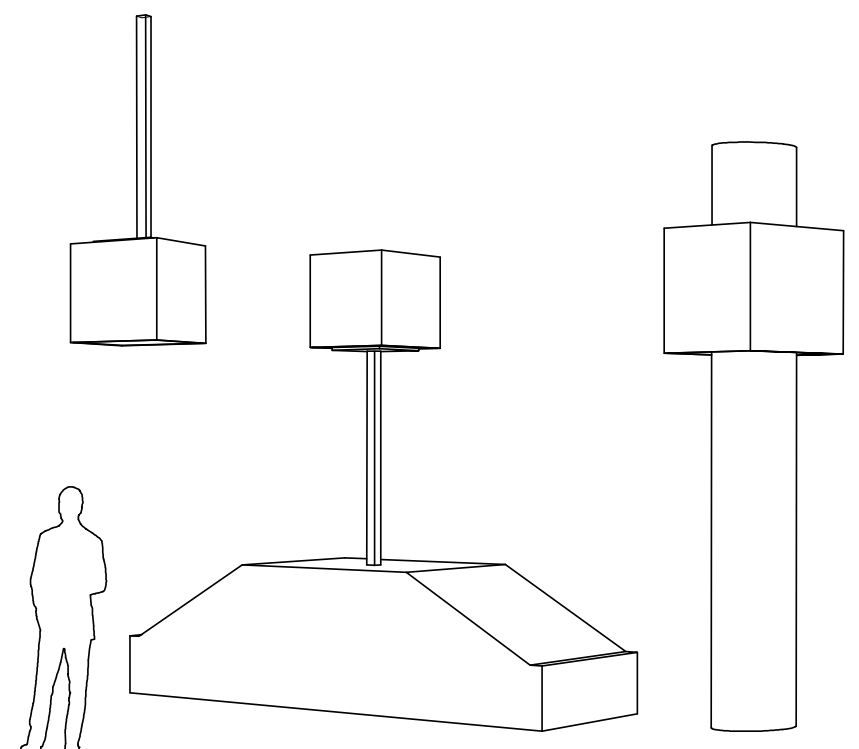
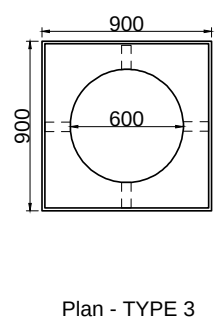
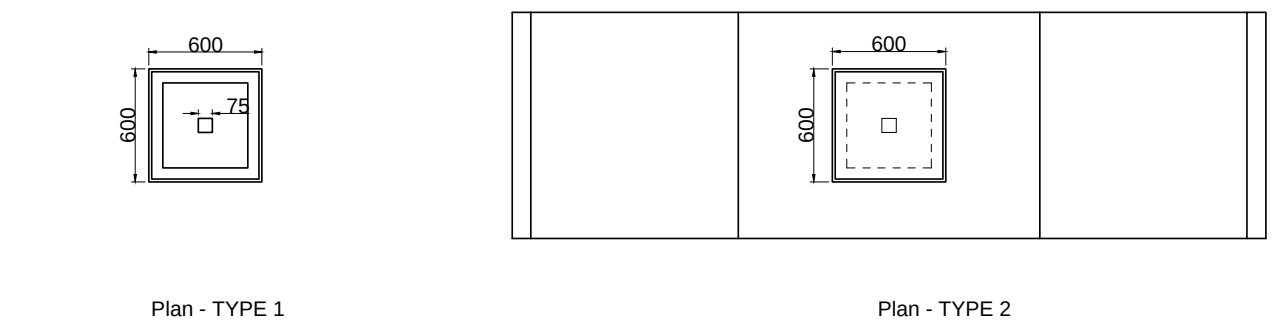
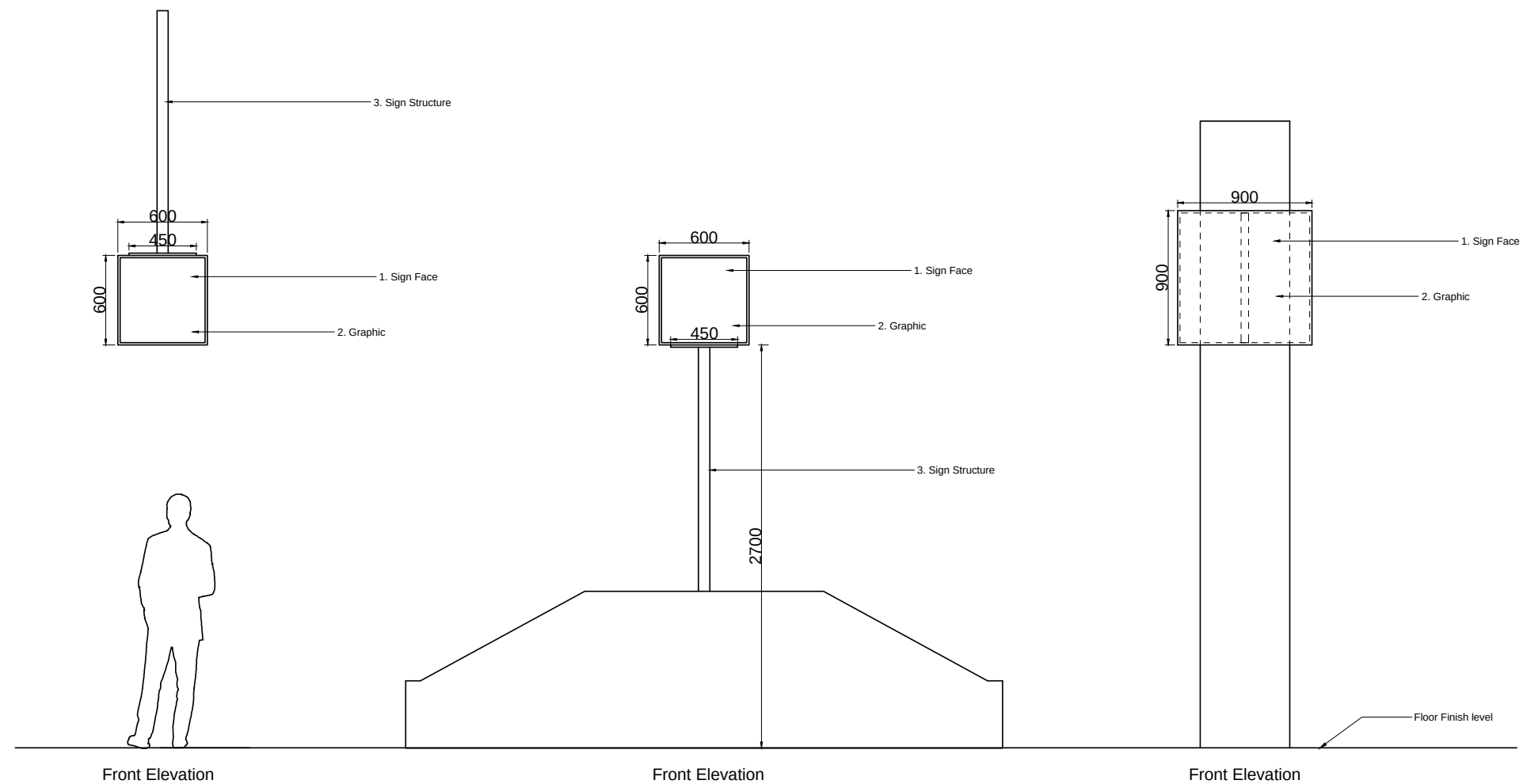
Sign Face Artwork



Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



Material Specification

- Type 1**
1. Sign Face – Entire Sign face all 4 sides, to be made of 8 mm thk white translucent 040 acrylic , with the letters/pictogram to match Pantone Black 6C and the rest of the vinyl to match Yellow Pantone Yellow C. To be mounted onto framework using appropriate fixing ties/bolts.
 2. Sign Structure/Suspender - Stainless steel Hollow section mounted on slabs/beams/walls.
 3. Bottom panel – Bottom MS Panel PU Painted in colour to match Vinyl Black of 95%(Pantone Black 6C).

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together. All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

- Type 2**
1. Sign Face – Entire Sign face all 4 sides, 8mm thk White translucent 040 acrylic, . Graphics - Plotter cut vinyl matching Pantone Yellow C, Blockout vinyl for text matching Pantone Black 6-C, pasted over acrylic with white diffuser film on inside face.
 2. Sign structure - All structural members in Stainless steel 75x75mm Hollow box section brush finish, base plate embedded below the floor finish and provided with a floor trim ring.
 3. Bottom panel – Bottom MS Panel PU Painted in colour to match Vinyl Black of 95%(Pantone Black 6C).

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together. All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign type 2.2h

Belt No. Sign

Principle

These sign help identify the baggage screening machines in the arrival areas. Overall dimensions of sign face varies between 450 x 450 x 450 mm to 600 x 600 x 600 mm to 900 x 900 x 900.

Material Specification

- Type 3**
1. Sign Face – Entire Sign face all 4 sides, to be made of 8mm thk 040 translucent acrylic , with the letters/ pictogram to match Pantone Black 6C and the rest of the vinyl to match Yellow Pantone Yellow C. To be mounted onto framework using appropriate fixing ties/bolts.
 2. Sign structure – Internal Structure of MS, fixed to Column using brackets.
 3. Bottom panel – Bottom MS Panel PU Painted in colour to match Vinyl Black of 95%(Pantone Black 6C).

Alternate Sizes as per ite conditions:
450mm x 450mm
600mm x 600 mm
900mm x 900mm

All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together. All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

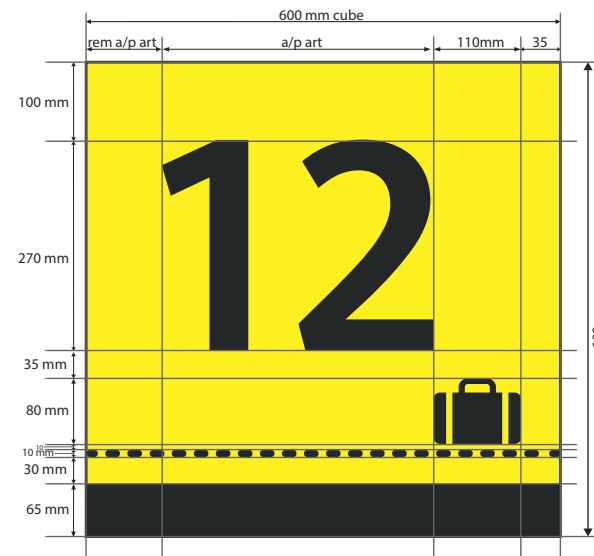
Sign Adaptability as per Site Conditions:
- Overall dimensions of sign face varies between 450 x 450 x 450 mm to 600 x 600 x 600 mm to 900 x 900 x 900.

Keynotes:
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

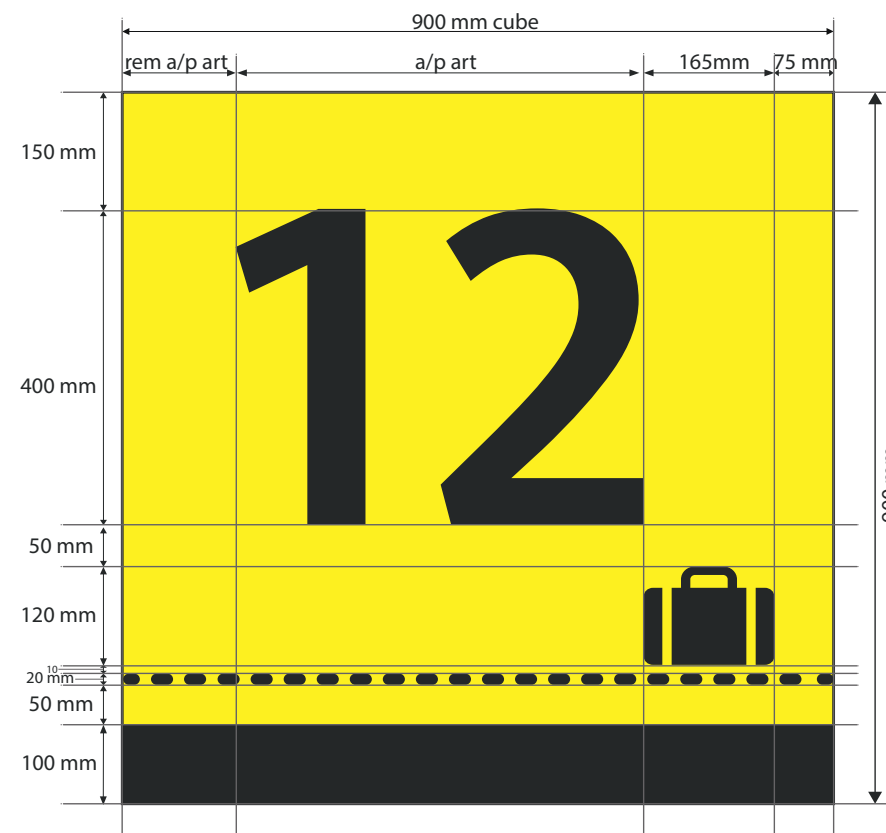
Belt No. Sign

Note:
Artworks to be taken from the open file provided by the signage consultant.

Artwork From All four Side is identical.



Sign Face Artwork Type 1 & 2 ▲



Sign Face Artwork Type 3 ▲



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Sign Front Elevation ▶

Bay Announcer

Principle

These signs announce the bay/ counters allocation in areas checkin, immigration etc.

Material Specification

1. Sign Box: Laser cut, Bent Fabricated in 8mm thick white translucent 040 acrylic with pantone yellowC Vinyl pasted on it with backlighting.
2. Sign face - 3 mm thick aluminium fabrication mounted on the sign structure with black RAL 9011 powder coating with a provision of through and through laser cutting for airline branding panel. Airline branding panel : printed media vinyl pasted on 8mm thick 040 White translucent acrylic with a backlit provision on two sides of sign box.
3. Sign structure - MS square post 50x50mm, hot dipped galvanised and PU Painted to match RAL 9006 grouted in ground to receive the triangular aluminium fabrication sign box.
4. Crash Guard - Protection for sign from trollies , wheeled baggage in 50 mm dia stainless steel brush finished pipe fixed with 8 mm SS plate brackets
5. Airline Branding Panel- Laser cutting in sign face to accomodate 8mm white translucent 040 acrylic with printed vinyl media.

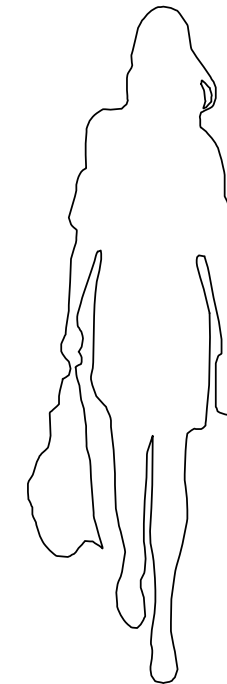
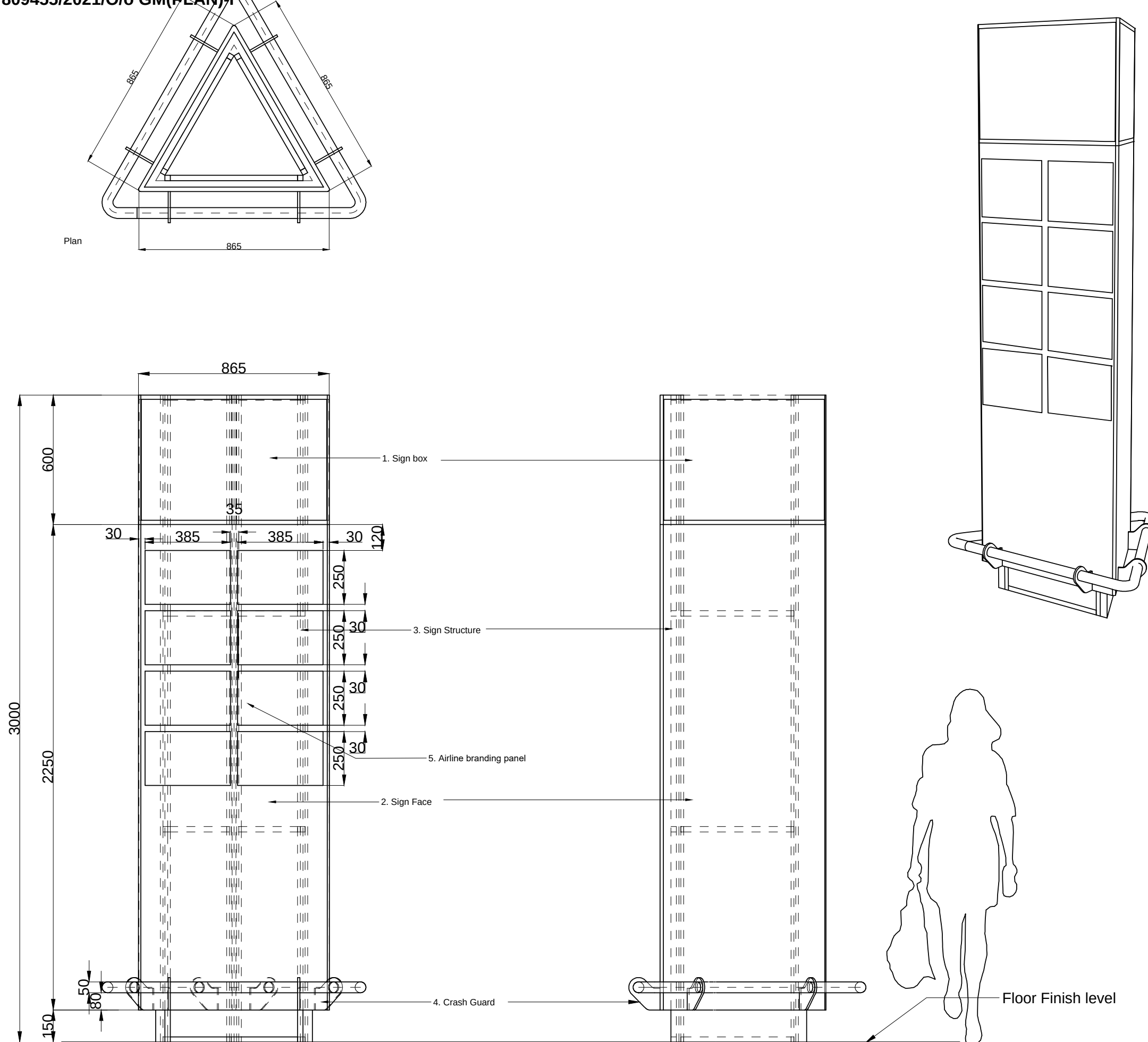
All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

Keynotes:

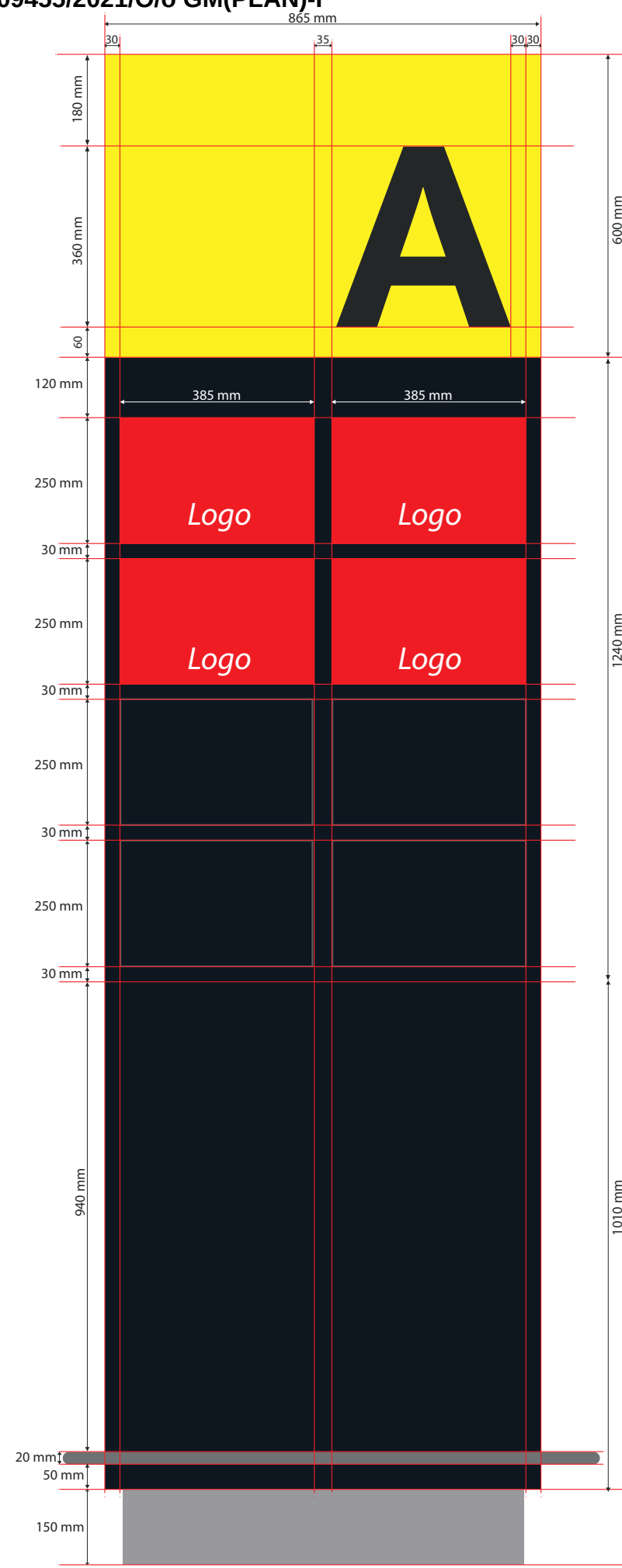
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Bay Announcer

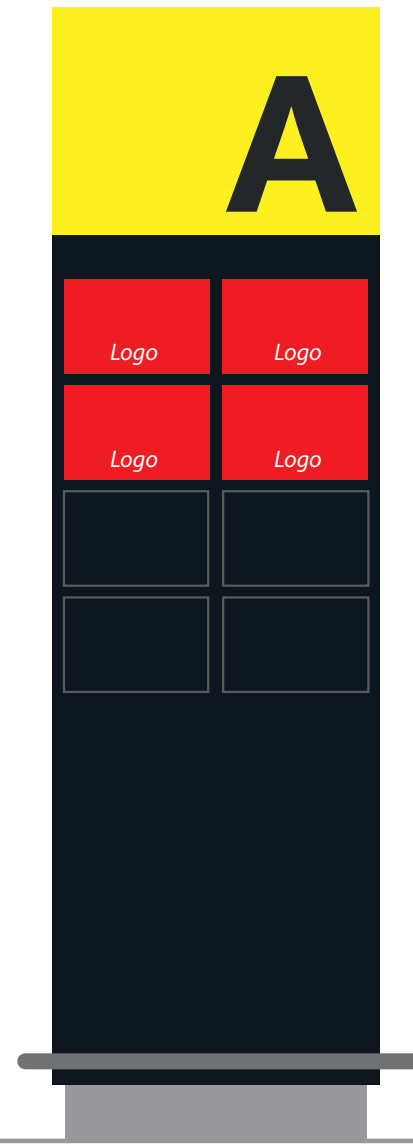
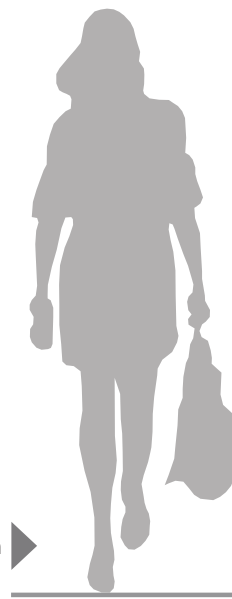
Note:

Artworks to be taken from the open file provided by the signage consultant.



Sign Face Artwork

Sign Front Elevation



Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Baggage Screening - Pole

Principle

These sign help identify the baggage screening machines in the check in areas.It also announce the airline carrier.

Material Specification

- 1. Sign frame - 50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance. L clip with dual lock.
- 2. Sign face : Two Sided: Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text Cyan Pantone 311C and printed vinyl media for airline logos as per graphics, pasted over 5mm thick White translucent 040 acrylic.
- 3. Sign structure - All structural members in Stainless steel Hollow box section 100x100 brush finish, base plate embedded below the floor finish and provided with a cover plate.
- 4. Cover Plate: 5mm thk s.s. cover plate mounted on flooring.
- 5. Connector - Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

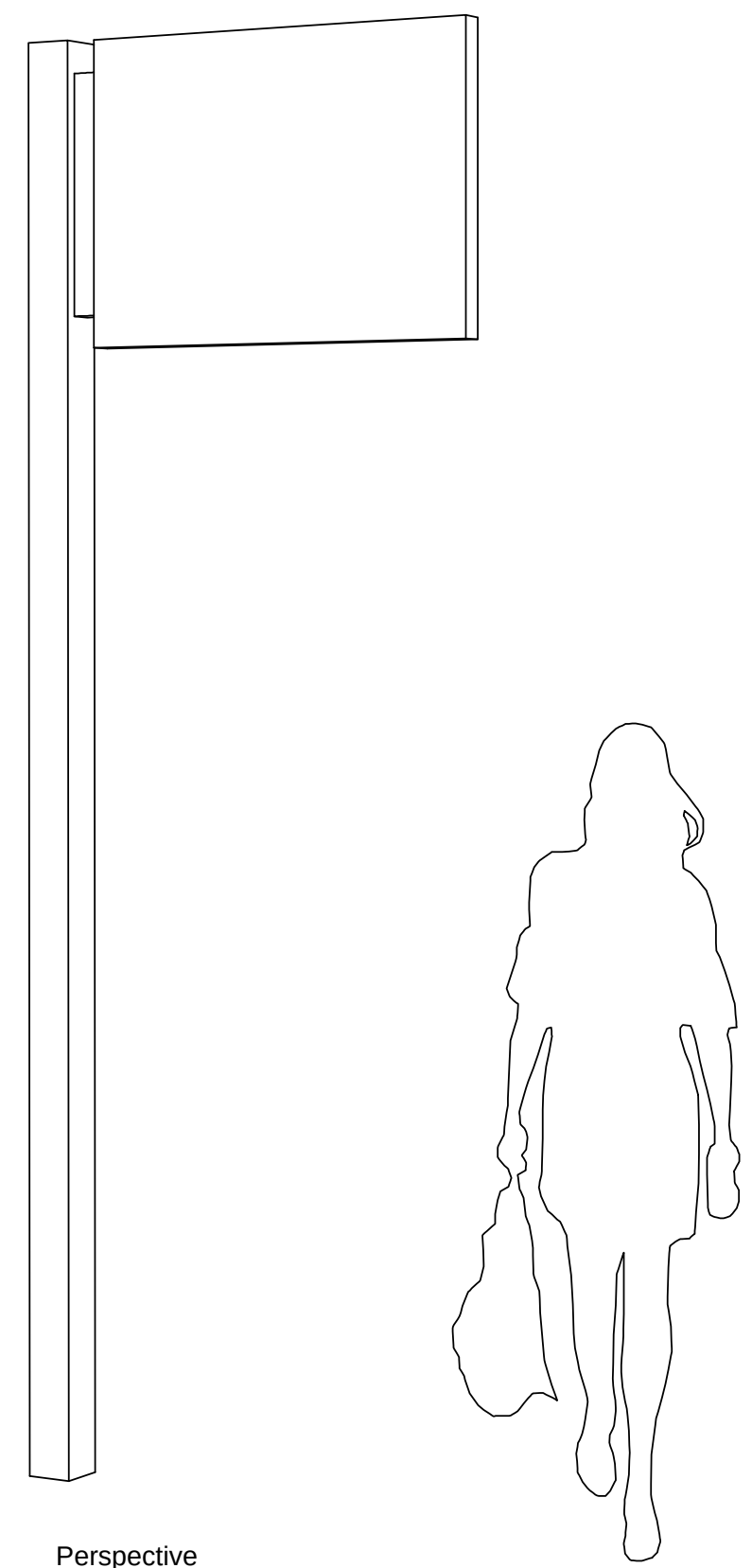
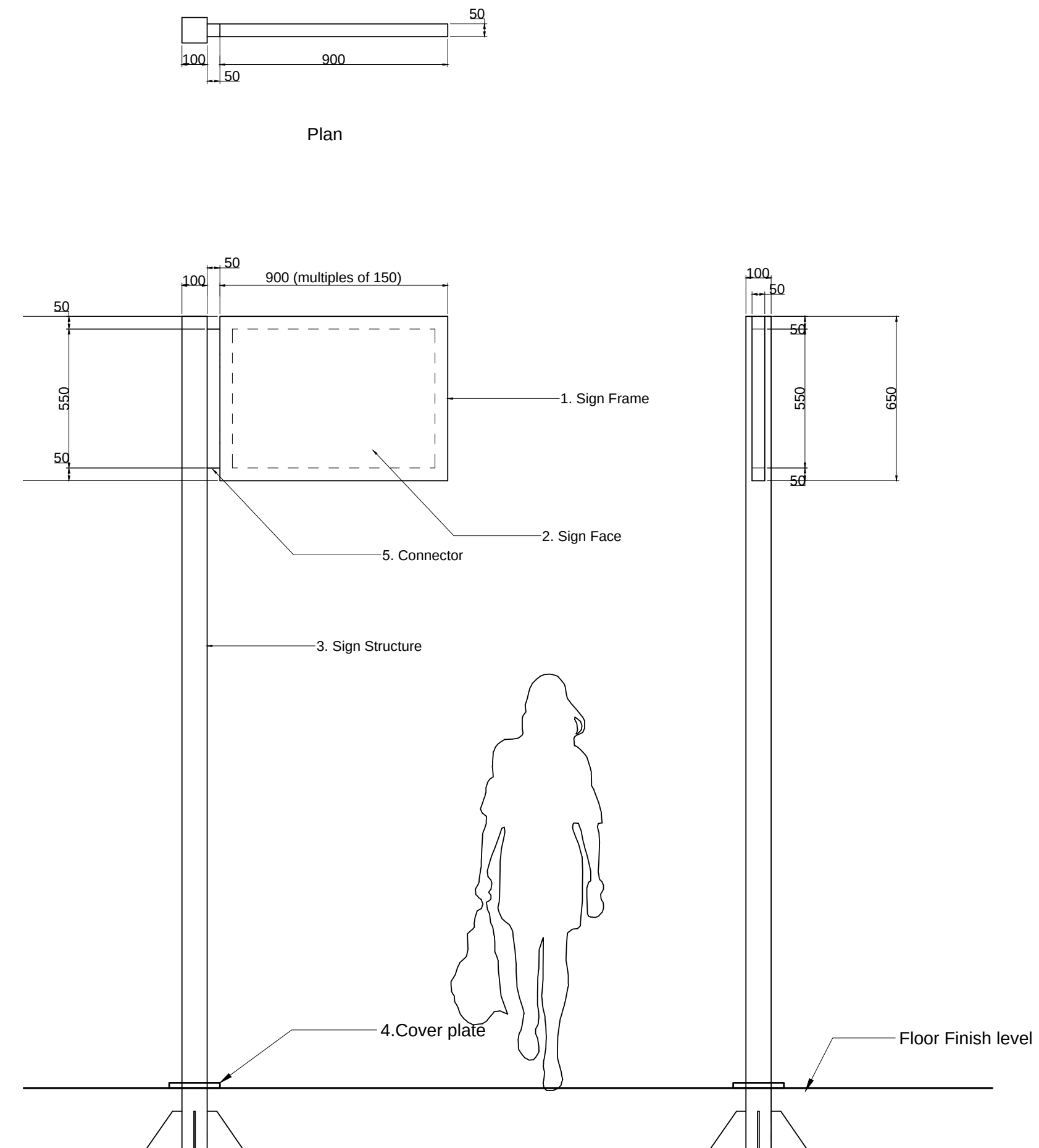
All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED Strip Edge Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

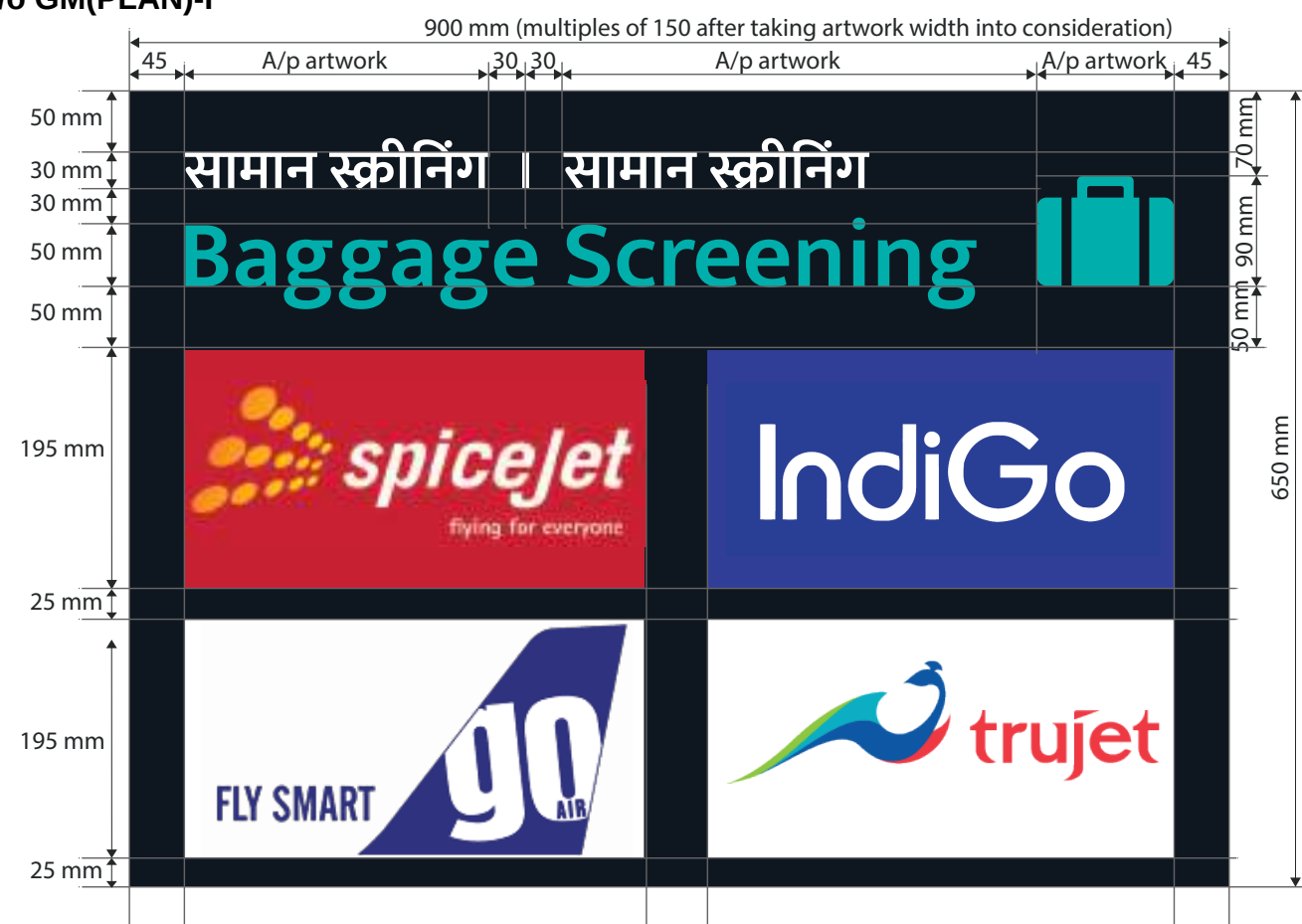
Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

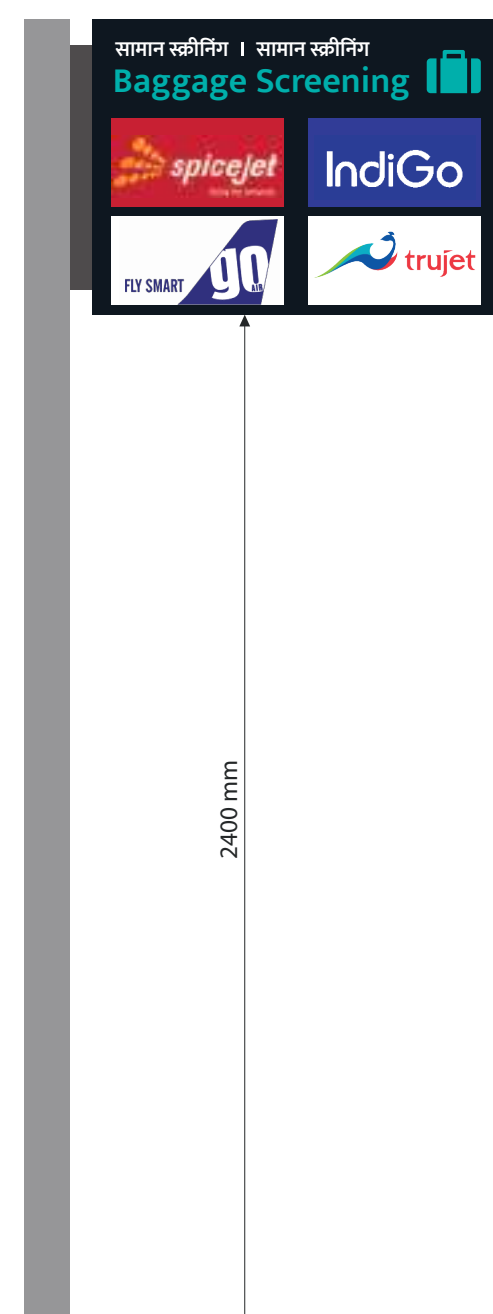


Perspective



Sign Face Artwork ▲

Sign Front Elevation ►



Baggage Screening - Pole

Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Baggage Screening - Box

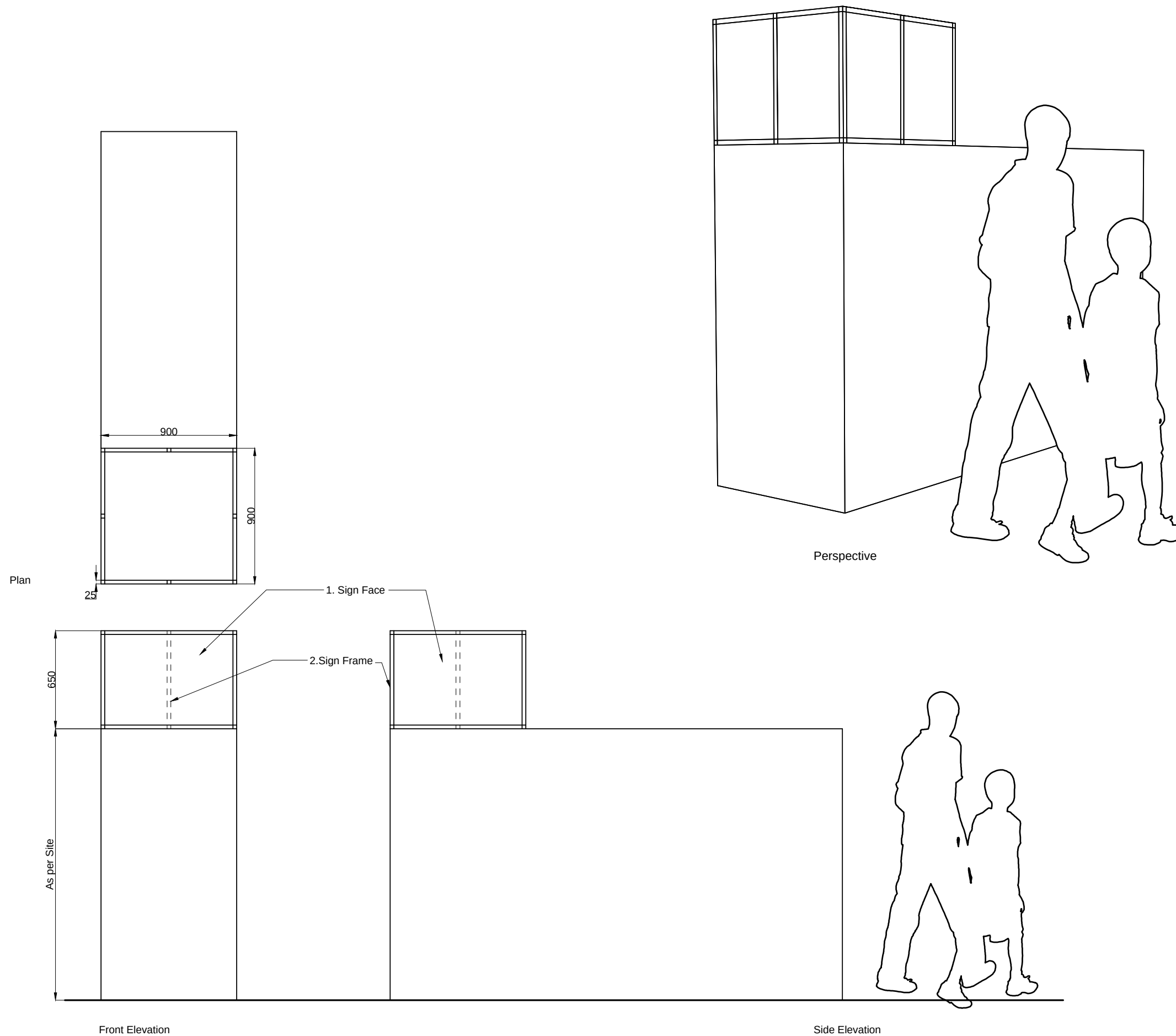
Principle

These sign help identify the baggage screening machines in the check in areas. It also announce the airline carrier. The Baggage Screening Box Signage can be of illuminated type for better aesthetic look. As seen on various airports, dynamic signs/FIDS have already been incorporated. The same is recommended instead of static sign proposed earlier, wherever illuminated sign is required.

Material Specification

1. Sign face -Graphics - Plotter cut Blockout vinyl matching Pantone Black 6C, vinyl for text matching Pantone Cyan 311C and printed vinyl media for airline logos as per graphics, pasted over 3 mm aluminium sheet.
2. Sign frame – MS frame made out of MS box sections 25x25, hot dipped galvanized.

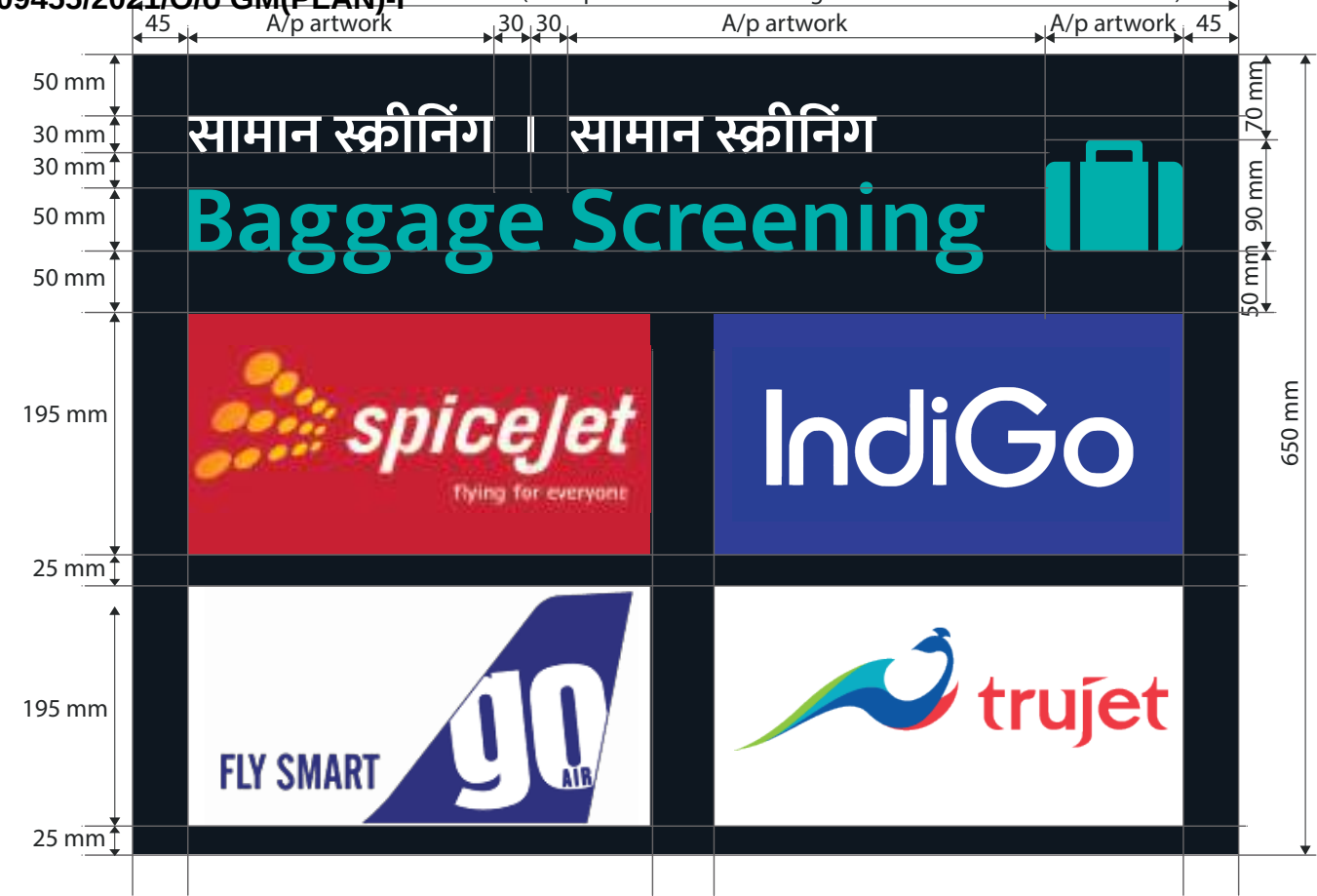
Fixed to top of baggage machine with bottom weights/mounting brackets.



Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Sign Face Artwork ▲

Baggage Screening - Box

Note:
Artworks to be taken from the open file provided by the signage consultant.



Sign Front Elevation ►

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



2.3

Information

Signs

2.3a	(Airport) Zonal Route Map
2.3b	Lift Directory

Principle

The sign can be considered double sided if it is centrally located and single sided if located in front of wall / structure.

Material Specification

1. Sign face - Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C and printed vinyl media as per graphics, pasted over 8mm thick White translucent 040 acrylic.
 2. Sign frame - Aluminium frame 50mm wide, openable on one side for maintenance, powder coated, colour RAL 9006.
 3. Sign structure - All structural members in Stainless steel 75x75mm Hollow box section brush finish, base plate embedded below the floor finish and provided with a cover plate .
 4. Connector - 50 x 50 M.S. hollow section hot dipped galvanized and PU painted to match RAL 9006 All hardware used for fixing of sign shall be Stainless steel.
- Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Side Elevation

Note:
Artworks to be taken from the open file provided by the signage consultant.



Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Lift Directory

Principle

This is the sign explaining the visual cue for the facilities coming ahead while accessing the floors through lift. It is located near the lift while taking the upcoming navigational decision.

Material Specification

1. Sign Face: Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thick 040 acrylic.

2. Sign Frame - 50mm wide aluminium extrusion with inbuilt frame to receive the sign face. The panel should be made easily openable for maintainance.

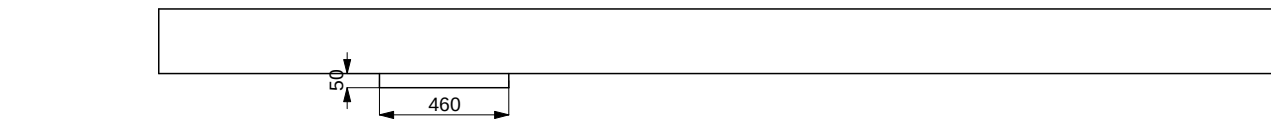
Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

The actual structural design of the sign for its stability shall be responsibility of the EPC contractor and shall be designed with due consultation and approval from structural designer.

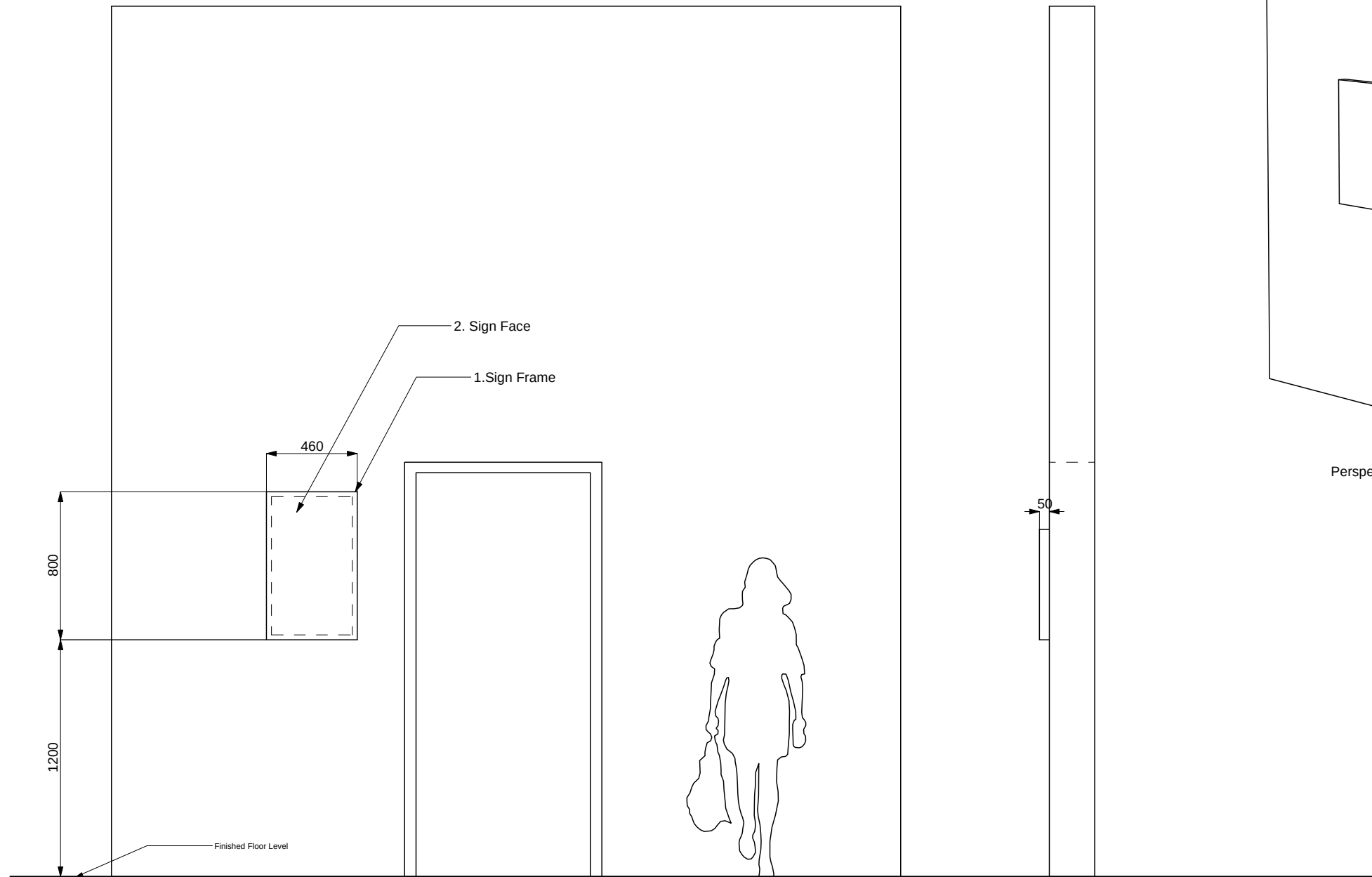
Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

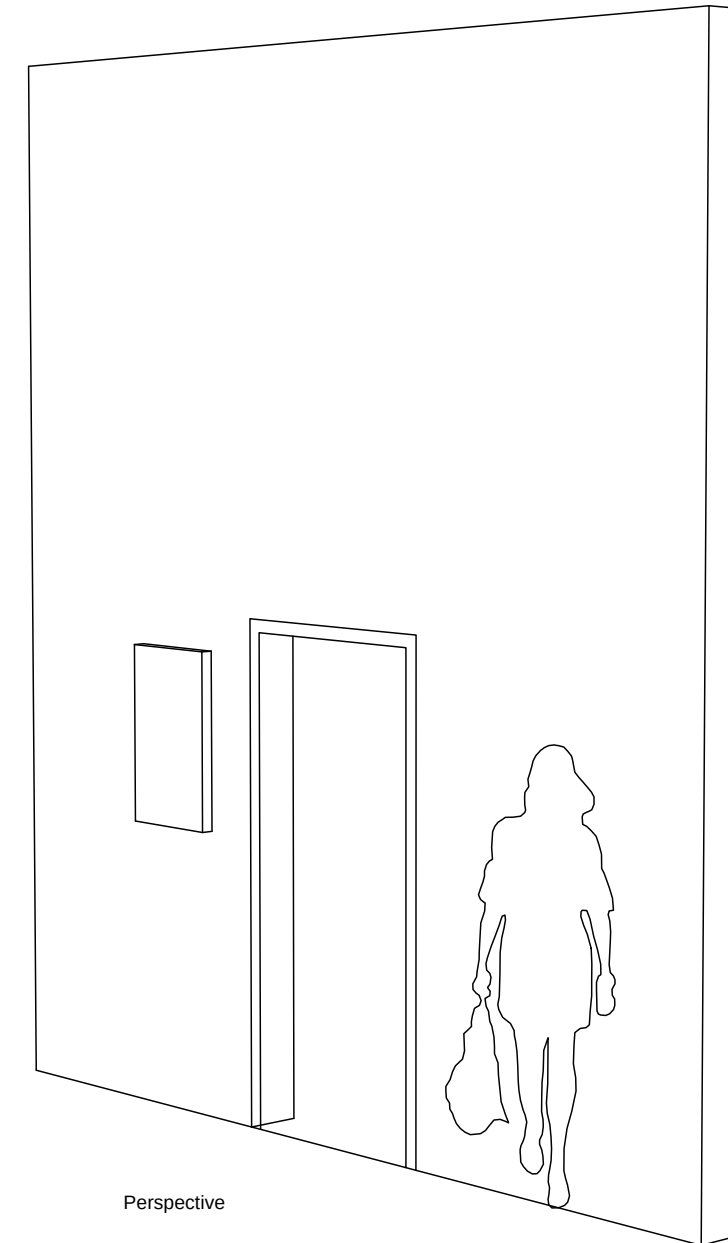


Plan



Front Elevation

Side Elevation



Perspective



2.4

Utility Signs

2.4a	Washroom / Drinking Water/ Baby Care
2.4b	Service Areas
2.4c	Lift Number sign

Washroom/Drinking Water/Baby Care

Principle

These signs identify the key facilities essential to the passengers.

Material Specification

Type 1 - Wall Projected

1. Sign Frame -50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.

2. Sign face : Two Sided : Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thk 040 acrylic.

3. Connector - Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

All hardware used for fixing of sign shall be Stainless steel. Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Type 2 - Wall Mounted

1. Sign Frame - 50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.

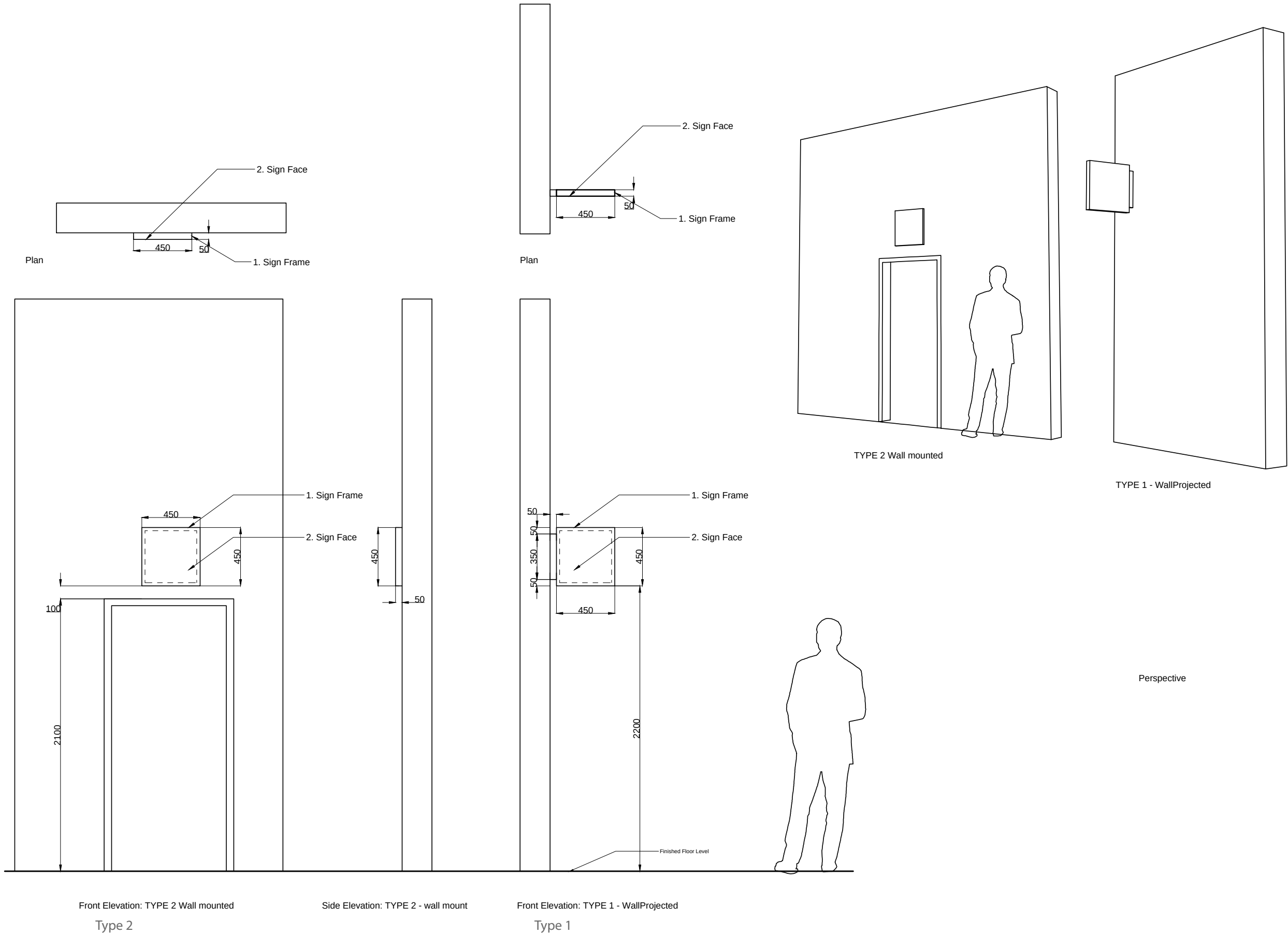
2. Sign Face: Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thk 040 acrylic.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

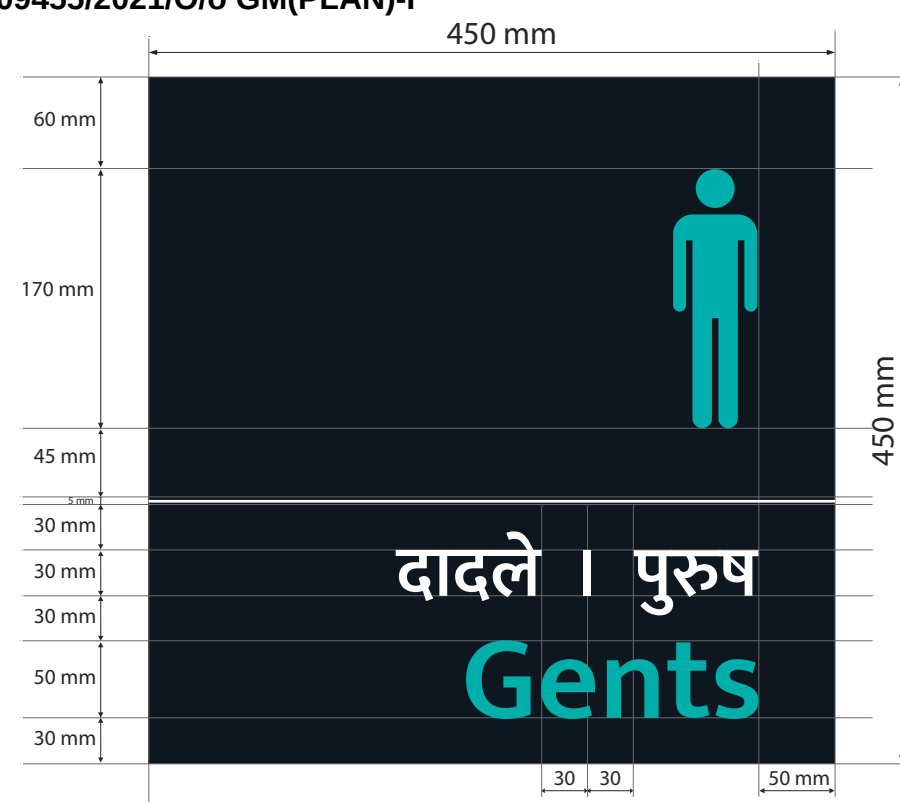
Sign Adaptability as per Site Conditions:

Keynotes:

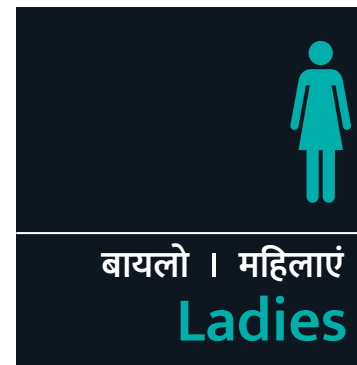
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



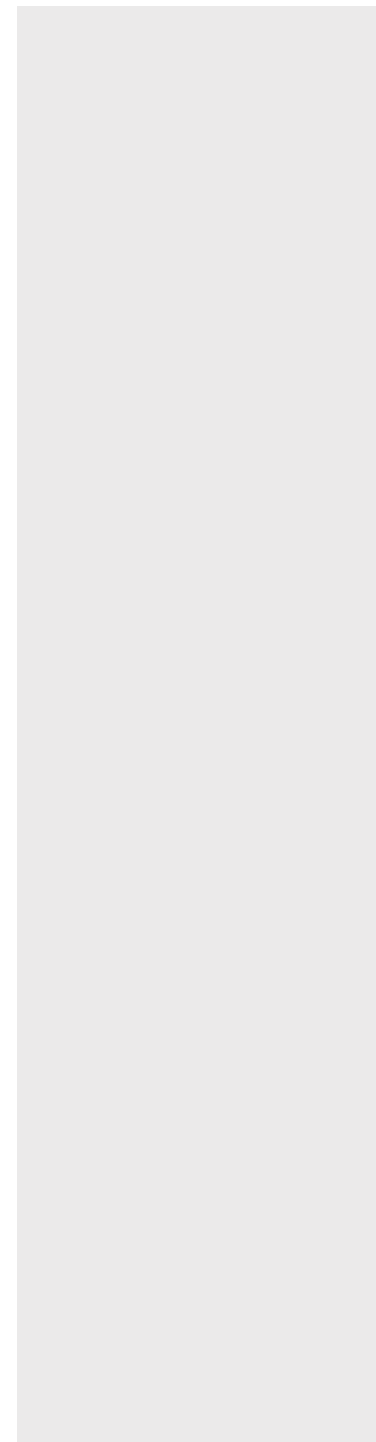
Note:
Artworks to be taken from the open file provided by the signage consultant.



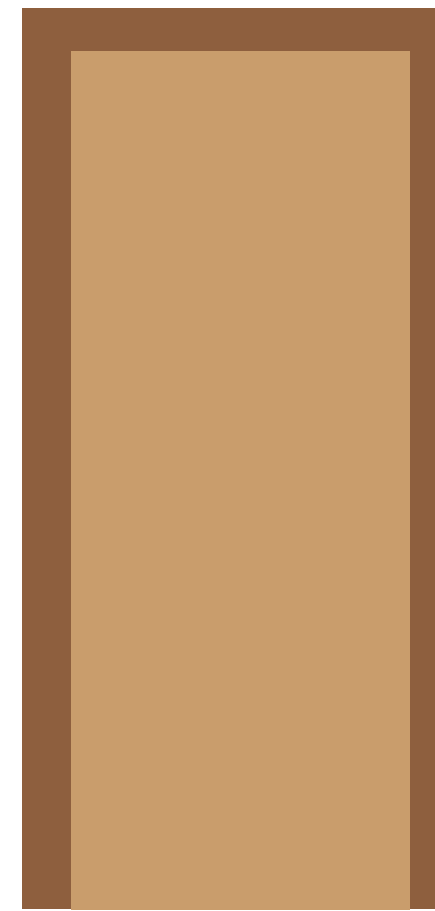
▲ Sign Face Artwork



Sign Front Elevation ►



Type 1



Type -2

Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

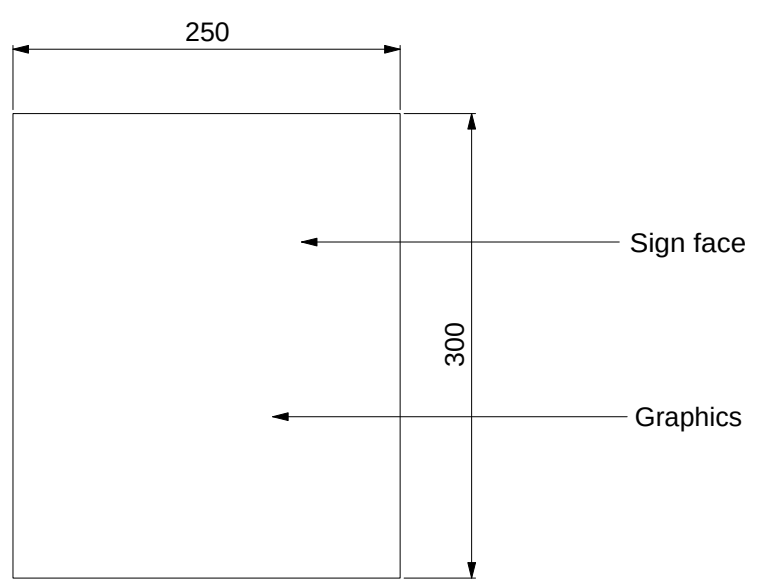
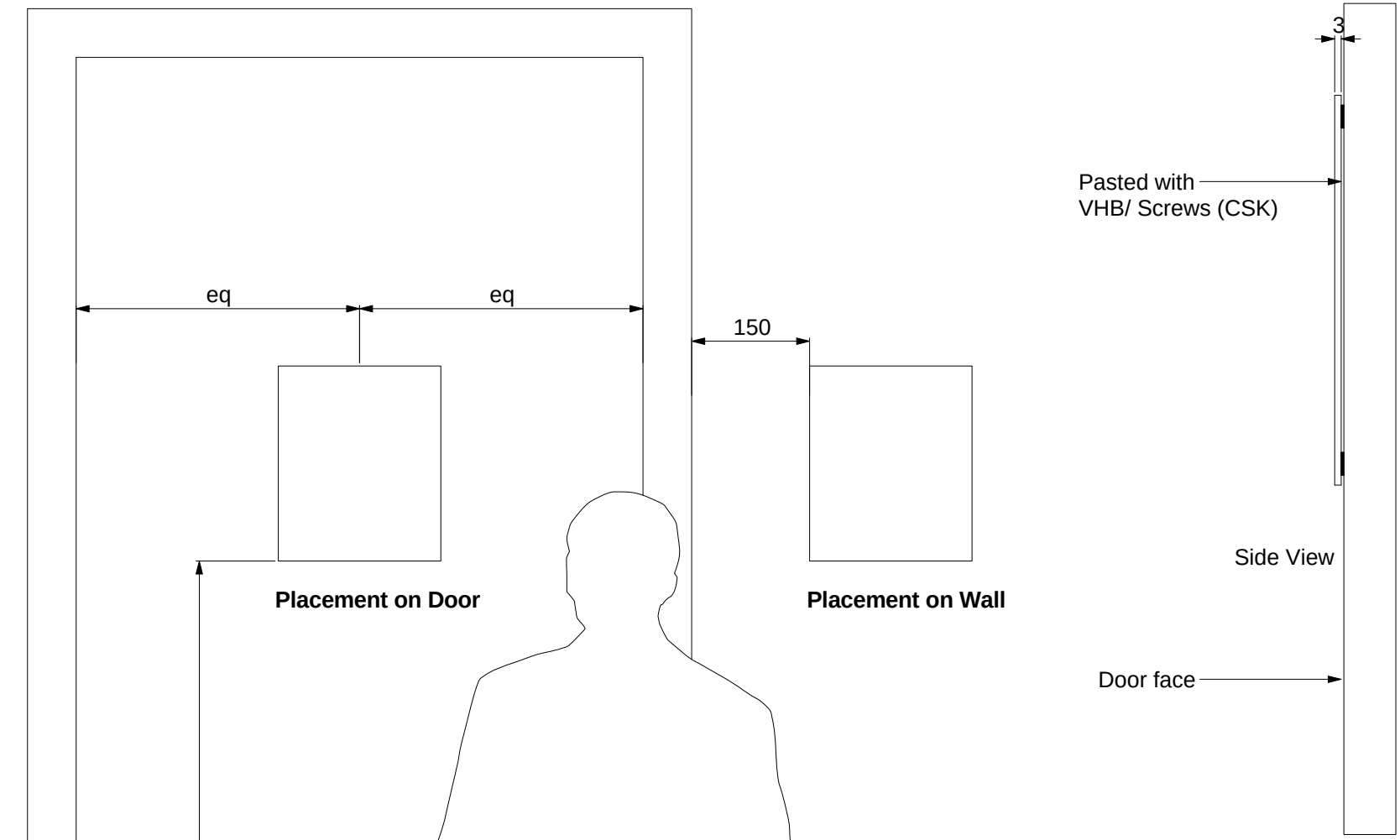
Service Areas

Principle

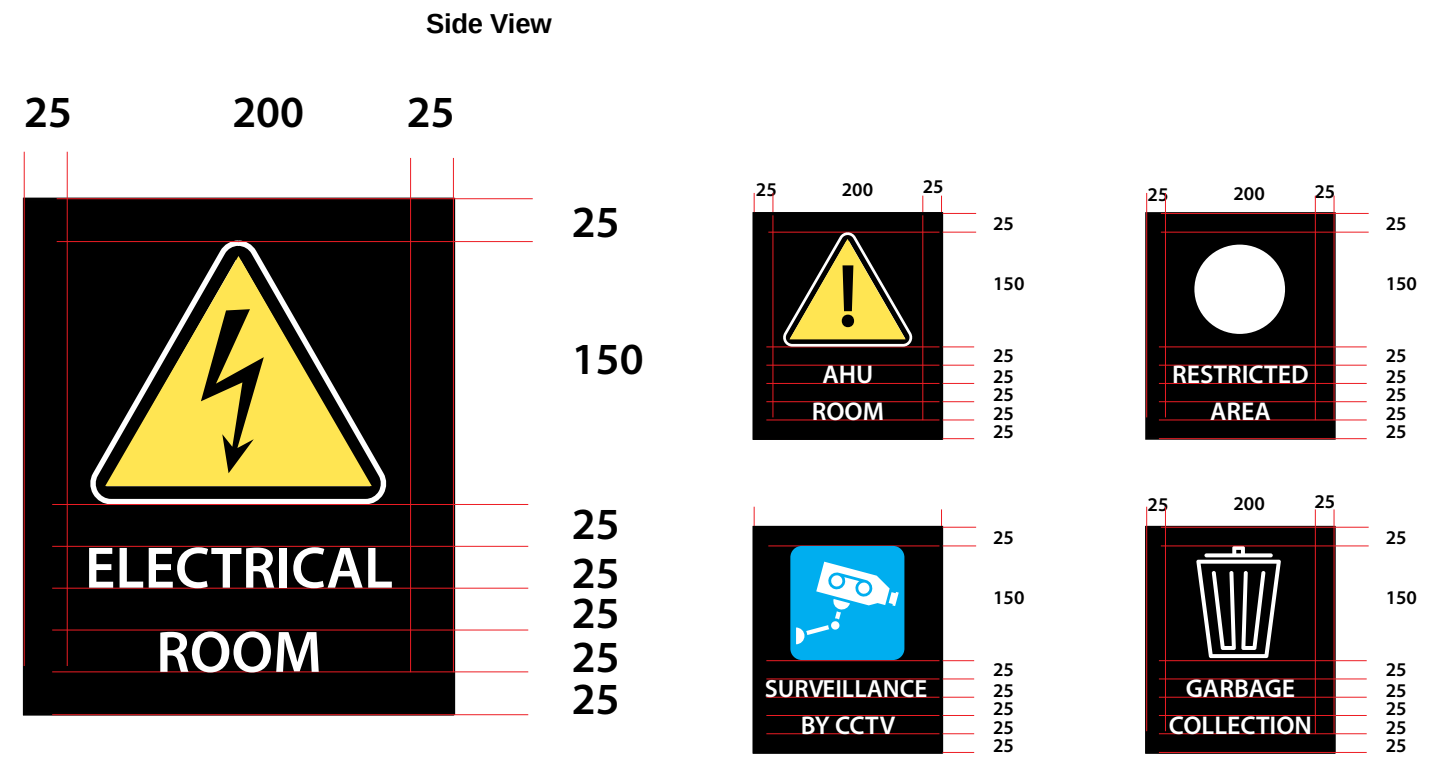
These are regulatory signs which the AAI administration would like to communicate and keep the passengers and staff informed.

Material Specification

- 1. Sign Face: Digitally printed Graphics pasted on 3mm thick black acrylic mounted on walls/ calddings/ panellings using VHB Tape



Front View



Sign face artwork

Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

Lift No. Sign

Principle

These signs identify the lift numbers for easy identification.

Material Specification

Type 1 - Wall Projected

1. Sign Frame -50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.

2. Sign face : Two Sided : Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mm thk 040 acrylic.

3. Connector - Stainless Steel hollow box section 50 x 50 mm brush finished; capped from top and bottom and acting as a conduit to hide electrical cables.

All hardware used for fixing of sign shall be Stainless steel.Secret fixing methods should be used to fix parts together.

Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Type 2 - Wall Mounted

1. Sign Frame - 50mm wide aluminium extrusion with inbuilt frame to recieve the sign face. The panel should be made easily openable for maintainance.

2. Sign Face:Graphics - Plotter cut Blockout vinyl Pantone Black 6C, vinyl for text Pantone Yellow C or Cyan 311C as per graphics, pasted over 5mmthk 040 acrylic.

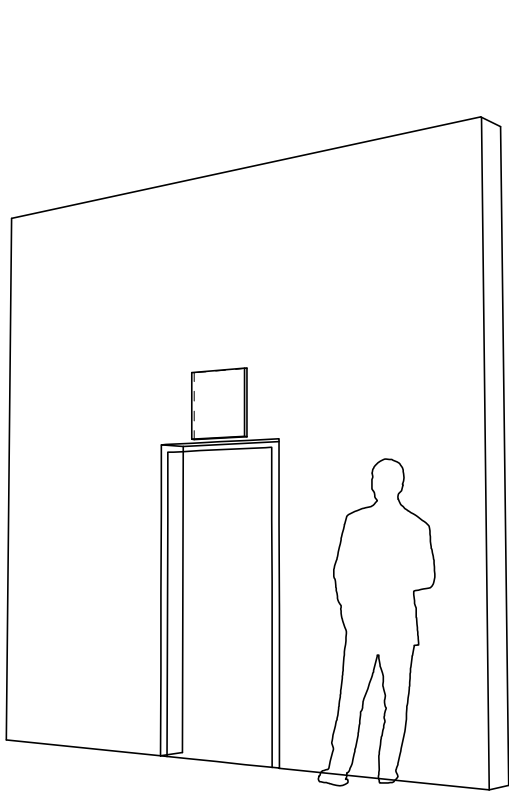
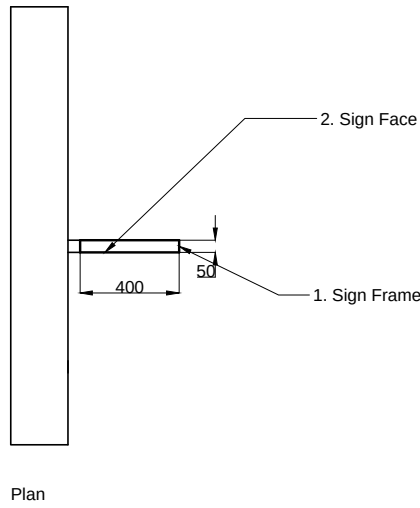
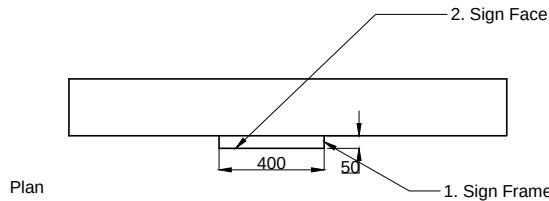
Lighting : All internal illumination shall be using Power LED Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

Sign Adaptability as per Site Conditions:

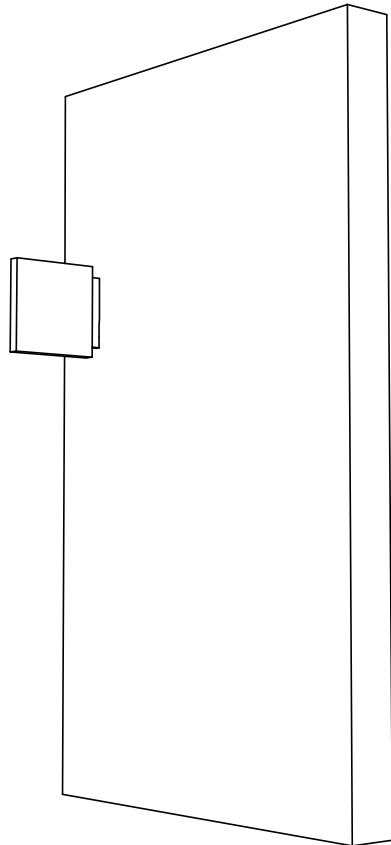
- Alternative fixing shall be a ceiling hung sign

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

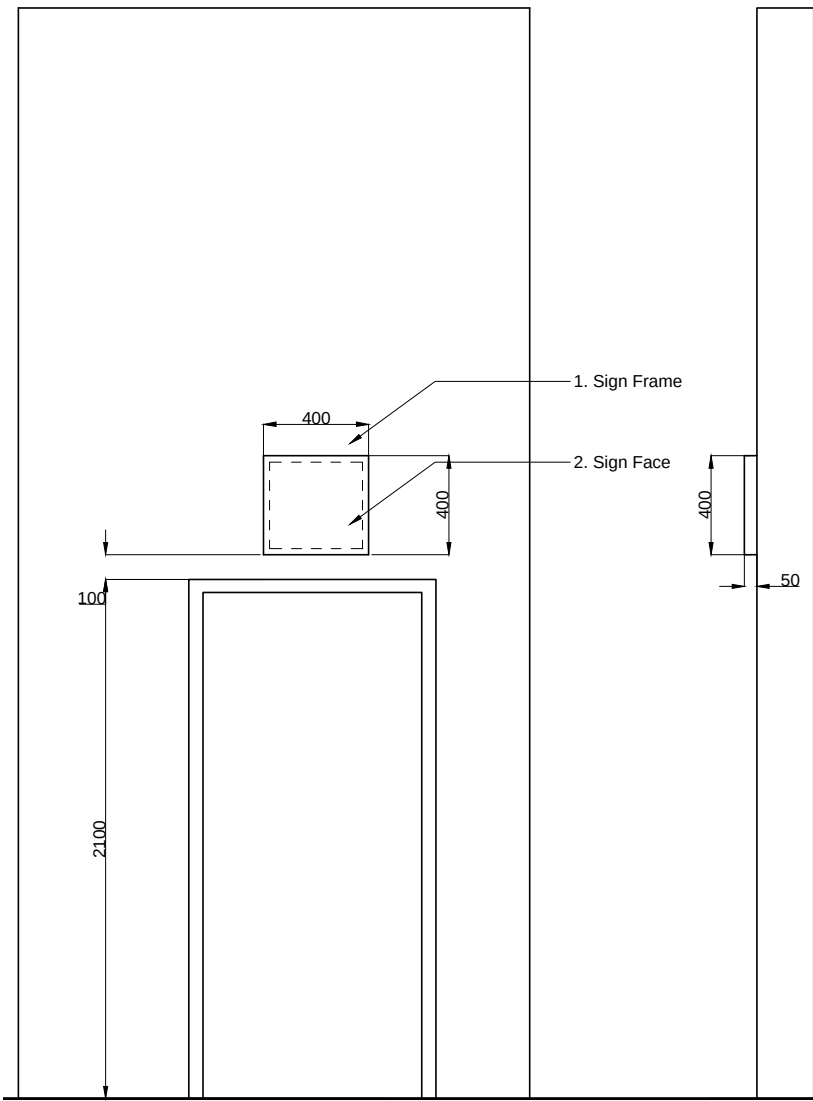


TYPE 2 Wall mounted

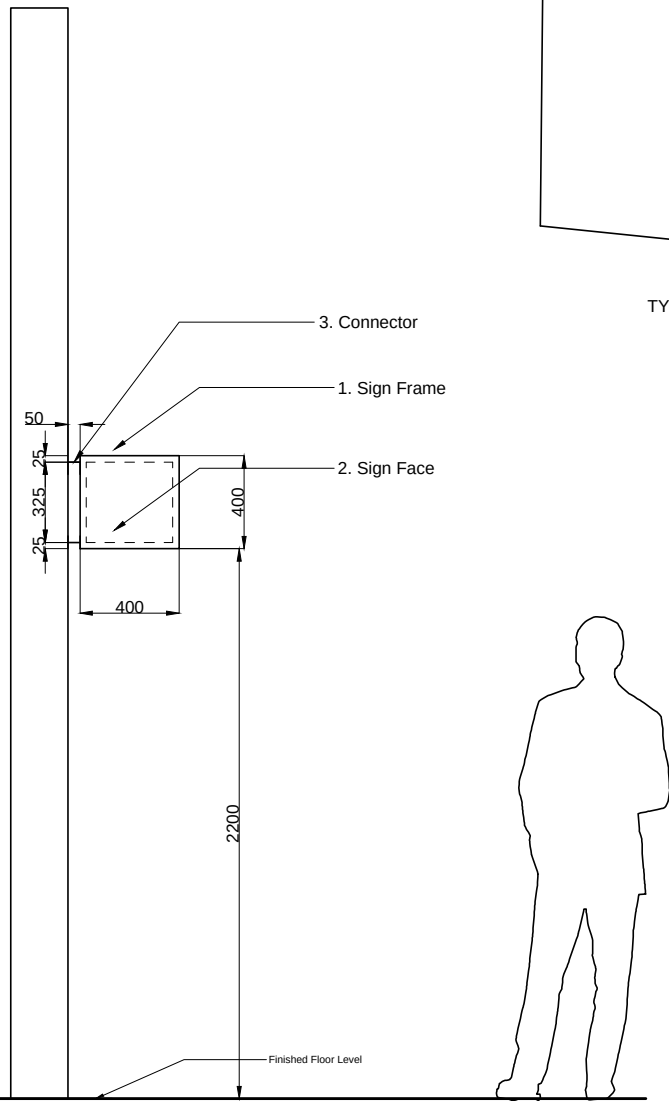


TYPE 1 - WallProjected

Perspective



Side Elevation: TYPE 2 - wall mount



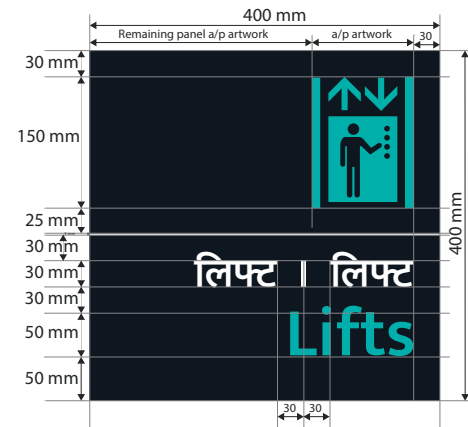
Front Elevation: TYPE 1 - WallProjected

Lift No. Sign

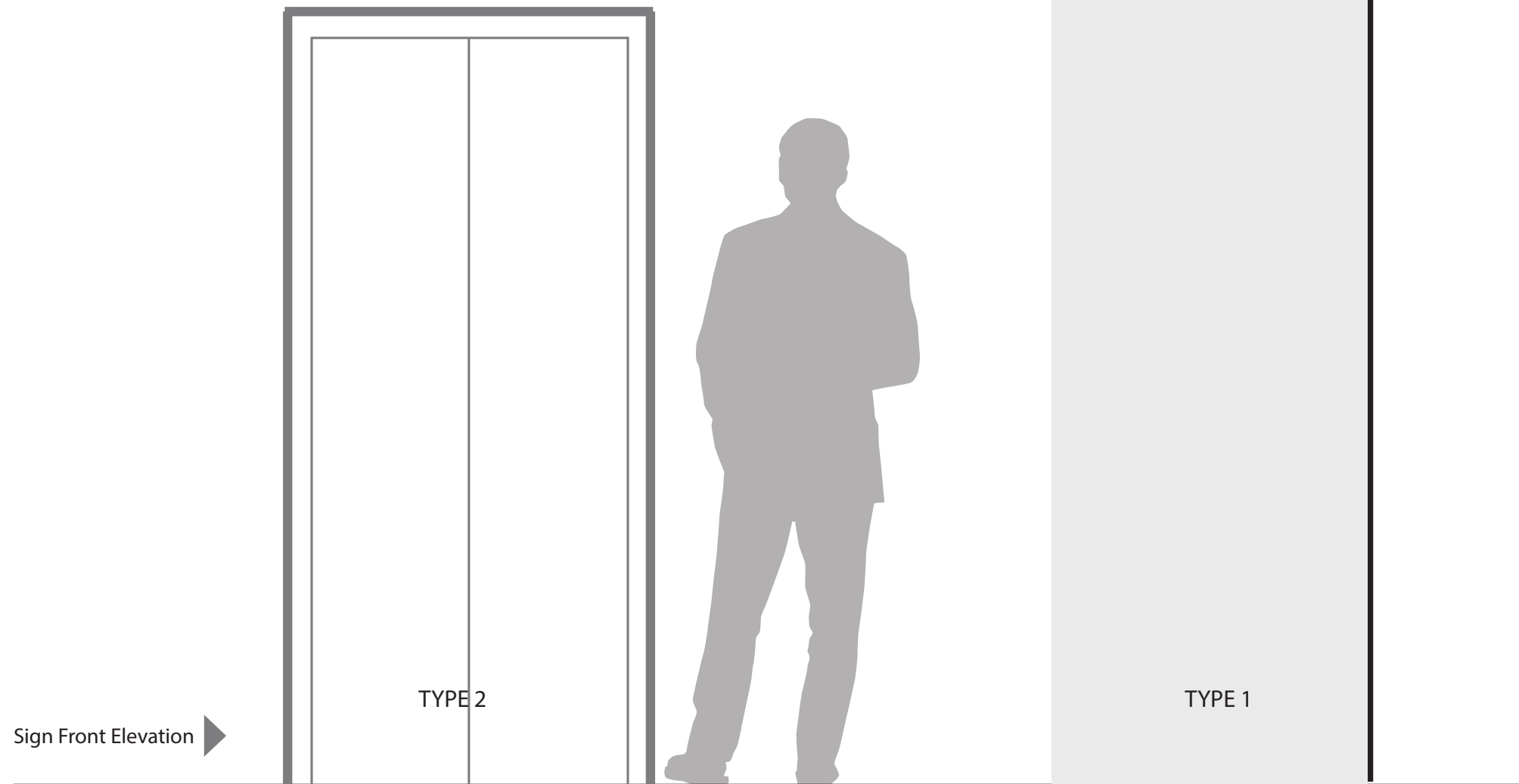
These signs identify the lift numbers for easy identification.

Note:

Artworks to be taken from the open file provided by the signage consultant.



Sign Face Artwork ▲



Sign Front Elevation ►

Sign Adaptability as per Site Conditions:

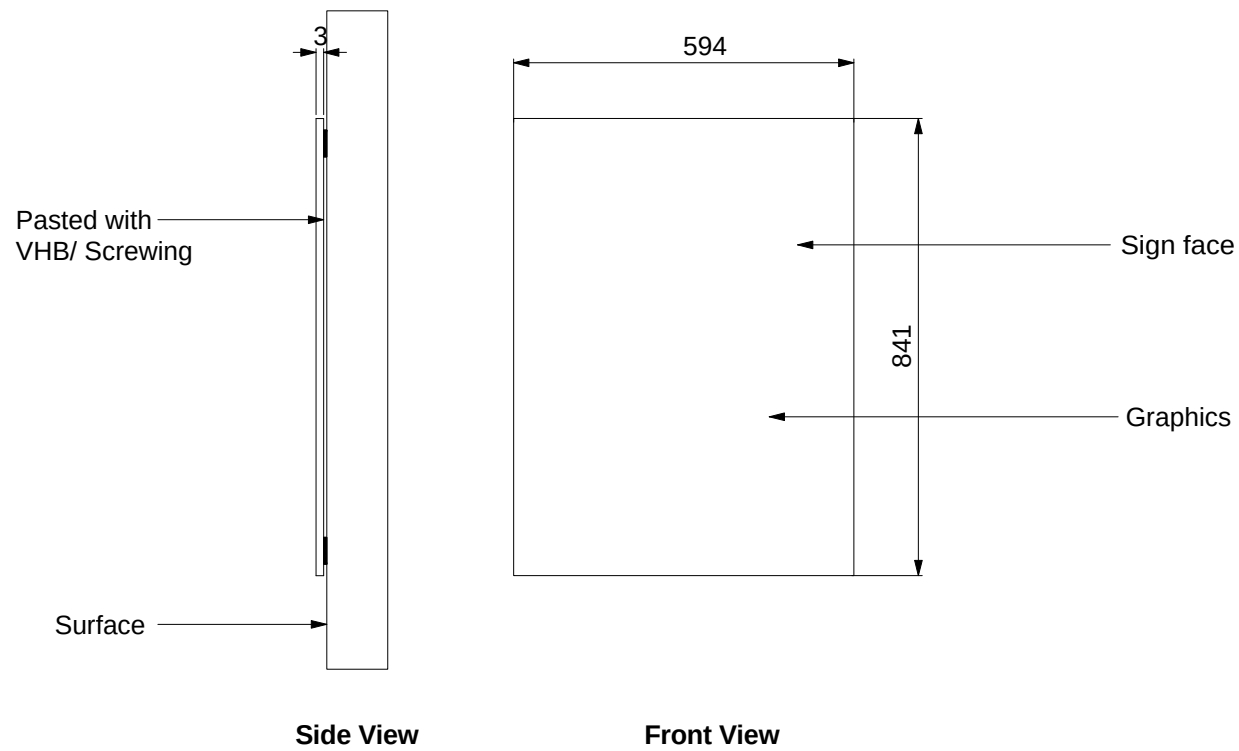
Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



2.5 Statutory Signs

2.5a	Poster Size A0
2.5b	Poster Size A1
2.5c	Poster Size A2
2.5d	Poster Size A3
2.5e	Poster Size A4



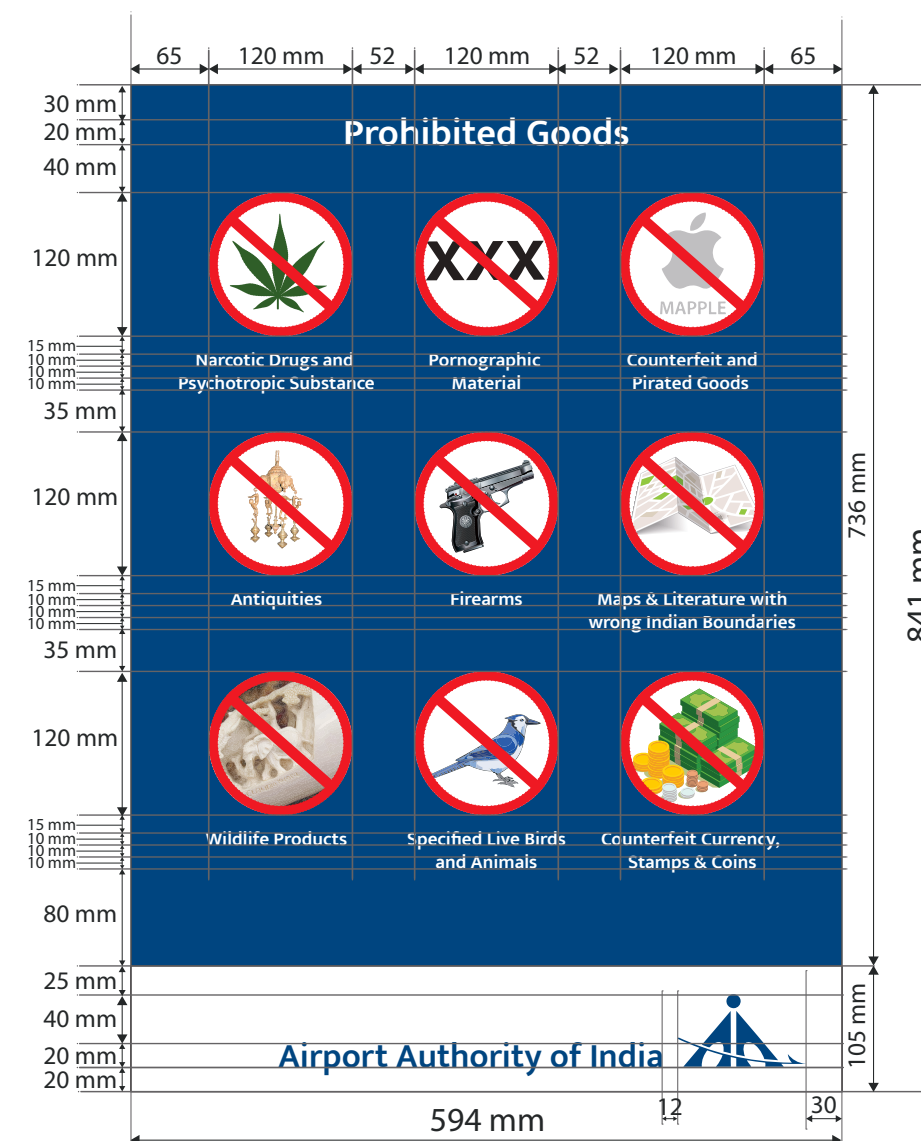
Note:

Artworks to be taken from the open file provided by the signage consultant.

2.5a - Poster A0 size Landscape - Sample Template



2.5b - Poster A1 size Portrait



1. Sign Face: Digitally printed Graphics pasted on 3mm thick acrylic mounted on walls/ calddings/ panellings using VHB Tape

This sign can be made in three languages if required.

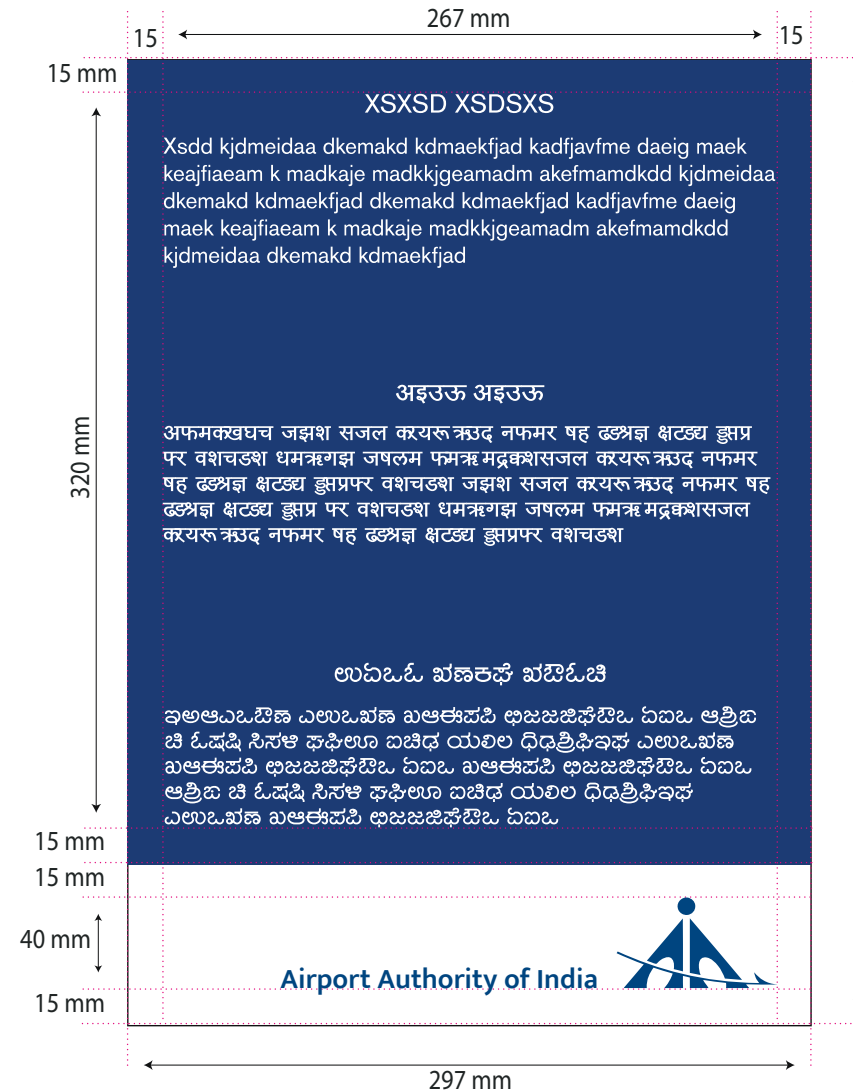
- Hindi
- English
- nd regional language

Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

2.5e - Poster A4size Portrait



1. Sign Face: Digitally printed Graphics pasted on 3mm thick acrylic mounted on walls/ calddings/ panellings using VHB Tape

Sign Adaptability as per Site Conditions:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.



2.6 Emergency Signs

2.6a	Emergency Direction Signs - Illuminated
2.6b	Emergency Signs - Photoluminiscent
2.6c	Emergency Signs - Assembly Points
2.6d	Emergency Signs - Fire Life Safety Layout

Emergency Direction Signs
Illuminated

Principle

Internally illuminated signs for making the emergency escape routes

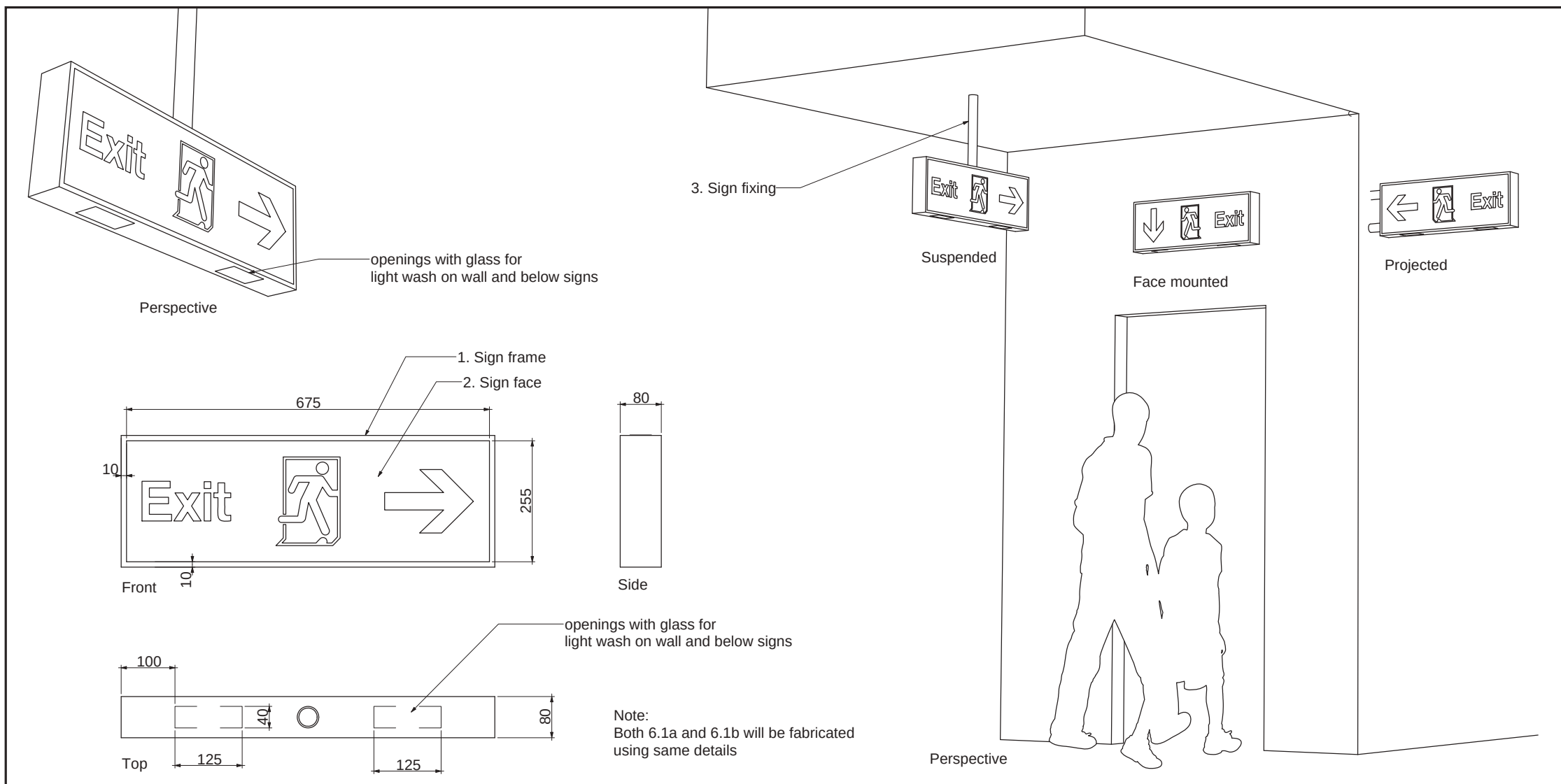
Material Specification

1. Sign Frame - 1.5mm MS powder coated white
2. Sign Face - Laminated acrylic 5mm thick with graphics in white and green translucent vinyl on the inside face of the glass
3. Illumination : All Internal illumination using LED lamps connected to a UPS with a min 1.5hr backup
4. Sign Fixing - Suspenders and projecting pipes shall be stainless steel to match other similar hardware 35mm dia. The actual structural design of the sign for its stability shall be responsibility of the EPC contractor and shall be designed with due consultation and approval from structural designer.

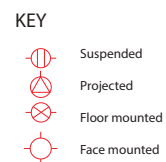
Sign Adaptability as per Site Conditions:

Keynotes:

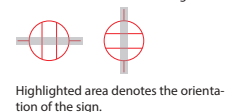
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



2.6a-1



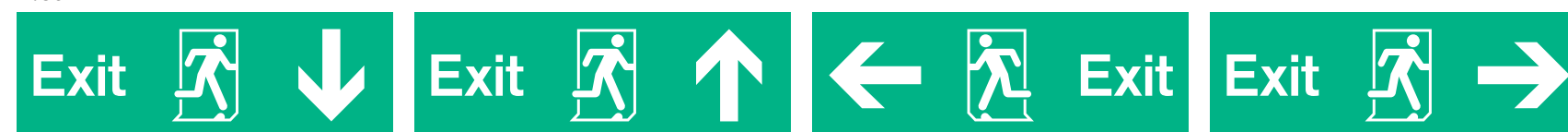
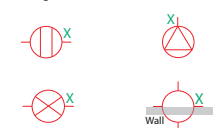
Orientation of the sign
Protuding line out of the circle indicates the orientation of the sign.



Double sided sign:
Represented by a sign symbol with 2 alphabets (denoting the artwork from ones given below) on either side



Single sided sign:
Represented by a sign symbol with 1 alphabet (denoting the artwork from ones given below)



c
Size : 675 x 255mm

d
Size : 675 x 255mm

e
Size : 675 x 255mm

f
Size : 675 x 255mm



aS
Size : 530 x 255mm

bS
Size : 530x 255mm

gS
Size : 530 x 255mm

hS
Size : 530 x 255mm

2.6a-2



EE
Size : 900 x 225mm

Notes :
1. All the signs coming in retail area should not be blocked. They can be moved within the vicinity of 1m - 2 m as per the correct escape route.

Emergency Signs -
Photoluminiscent Signs

Principle

These signs glow in dark in case of no lights in case of power failure. 2.6b-5 and 6 shall be printed with all arrows directions and placed walls along the escape route

Material Specification

All signs are screen printed using artworks provided and with photoluminiscent material as per technical specifications. Screen printing shall be done on self adhesive vinyl and pasted on 2mm thick powdercoated white aluminium plate and fixed at location using screws. At locations with available flat and non-porus surfaces the printed vinyl can be applied directly.

Sign placement
2.6b-1 at 1.5m above finished floor near equipment at visible place
2.6b-2 On door just above the push bar
2.6b-3 On the door centrally at 1.2m / below glass window
2.6b-4 On side walls of lifts above call button panel at 1.5m above Finished floor
2.6b-5 Along long corridors spaced 3m and straggered on opposite walls. 1.2m above finished floor
Fire plans- End long corridors and every change in direction on wall 1.2m above finished floor on either side

Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

Principles for fire signing - 2.6b

1. Signs not shown on GA drawing

2.6b-1 Fire equipment signs


Fire
extingusiher
A4P


Fire hose
A4P


Fire alarm
A4P


Fire call
point
A4P


Fire call
point
A4P

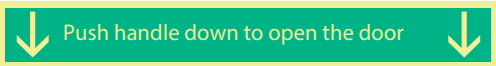

Ladder
A4P

All sizes are graphic sizes excluding sign frame

All 2.6b-1 signs shall be placed next to the respective equipment at a prominently visible location at 1.5m form the Finished floor level

2. Signs not shown on GA drawing

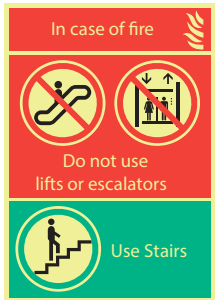
2.6b-2 Fire doors inside


700 x 95

2.6b-3 Fire doors outside


A4P

2.6b-4 At lifts


A3P

All sizes are graphic sizes excluding sign frame

2.6b-2 shall be pasted on all the emergency escape doors with the Push bar activating the alarm system, 75mm above the push bar installation.

2.6b-3 shall be pasted on outer side of all the emergency doors with push bar at an height of 1.5m from finished floor level

2.6b-4 shall be pasted on glass/wall next to elevator on the opposite side of the call button at 1.5m from finished floor level

3. Signs not shown on GA drawing

2.6b-5 Non-illuminated Emergency escape direction sign (Exit)

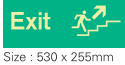

675 x 225
(Reading distance equals more than 25m)

hS

Size : 530 x 255mm

gS

Size : 530 x 255mm

bS

Size : 530 x 255mm

aS

Size : 530 x 255mm

c

Size : 445 x 255mm

d

Size : 445 x 255mm

e

Size : 445 x 255mm

f

Size : 445 x 255mm

All sizes are graphic sizes excluding sign frame

All 2.6b-5 signs will be positioned along the escape routes to ensure that the route is clearly marked. This means - signs placed appropriatly directing the escape path at every junction or change of direction on that route. If a long straight corridor or space is part of an escape route then it is usual to place repeater exit signs, at around 2.0 - 2.5 meter spacing. Signs are placed at a height above head-height so they can be clearly seen and will need to be above the height of doorways (at least 2.1m).

Note: Photoluminiscent signs are not given any unique number and also not shown in the Schedule and marked in GA drawings. These will be provided across the terminal basis using principles as elaborated.

Annex-1 Pg 139

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Emergency Signs - Assembly Point Signs
These signs are placed on outside to direct and identify people in emergency to the safe assembly area.

Note:
Artworks to be taken from the open file provided by the signage consultant.

2.6c-1 Assembly area direction (Graphic + text)

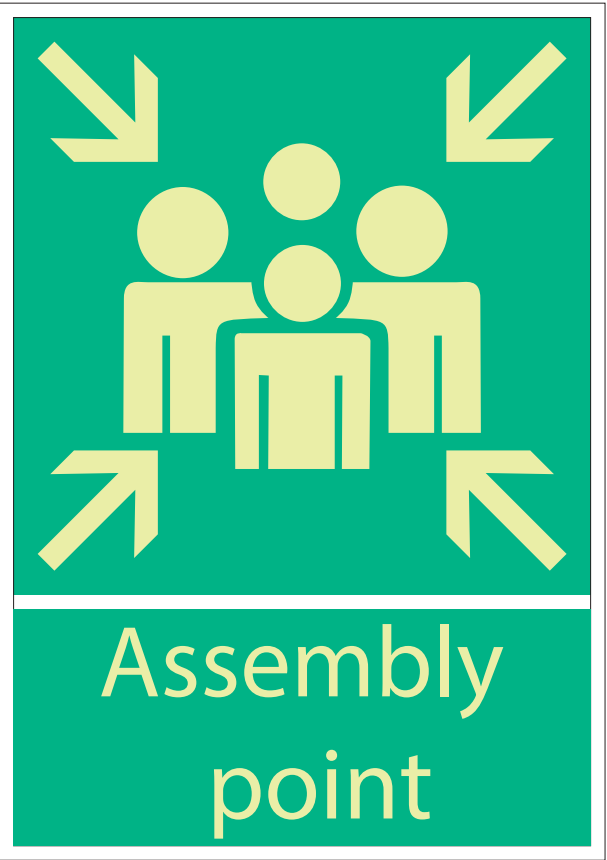
2.6c-2 Assembly area Location (Plate / Post mounted)



k
Size : 225 x 900mm



m
Size : 225 x 900mm



j
Size : 420mm x 594mm

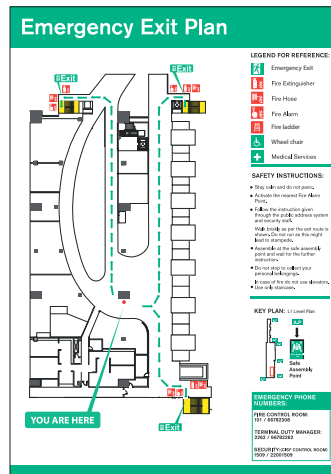
All sizes are graphic sizes excluding sign frame

All sizes are graphic sizes excluding sign frame

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Fire plans



Fire safety plans : Recommended for the awareness of passengers and airport staff by informing the fire policy, locations of fire fighting equipments, alarms and access to nearest escape staircase.

Placement

In passenger areas : Near frequently visited areas like toilets and prominently visible in large areas with seating or waiting and at high movement areas like escalators and staircases. On Level 1 and 2 these are also placed near the access to the fire escape staircases.

In Staff areas : Near toilets and at the access doors in long corridors.

In Fire escape staircase : At Level L0 before exiting as reference for path to assembly areas

Emergency Signs - Fire Life Safety Layout

Principle

Printed layouts placed at prominent locations across all the levels of airport.

Material Specification

All signs are digitally printed using artworks made specific to each locatino. Laminated Digital prints on photoluminiscent self adhesive film mounted on 3mm thick white Aluminium plate.

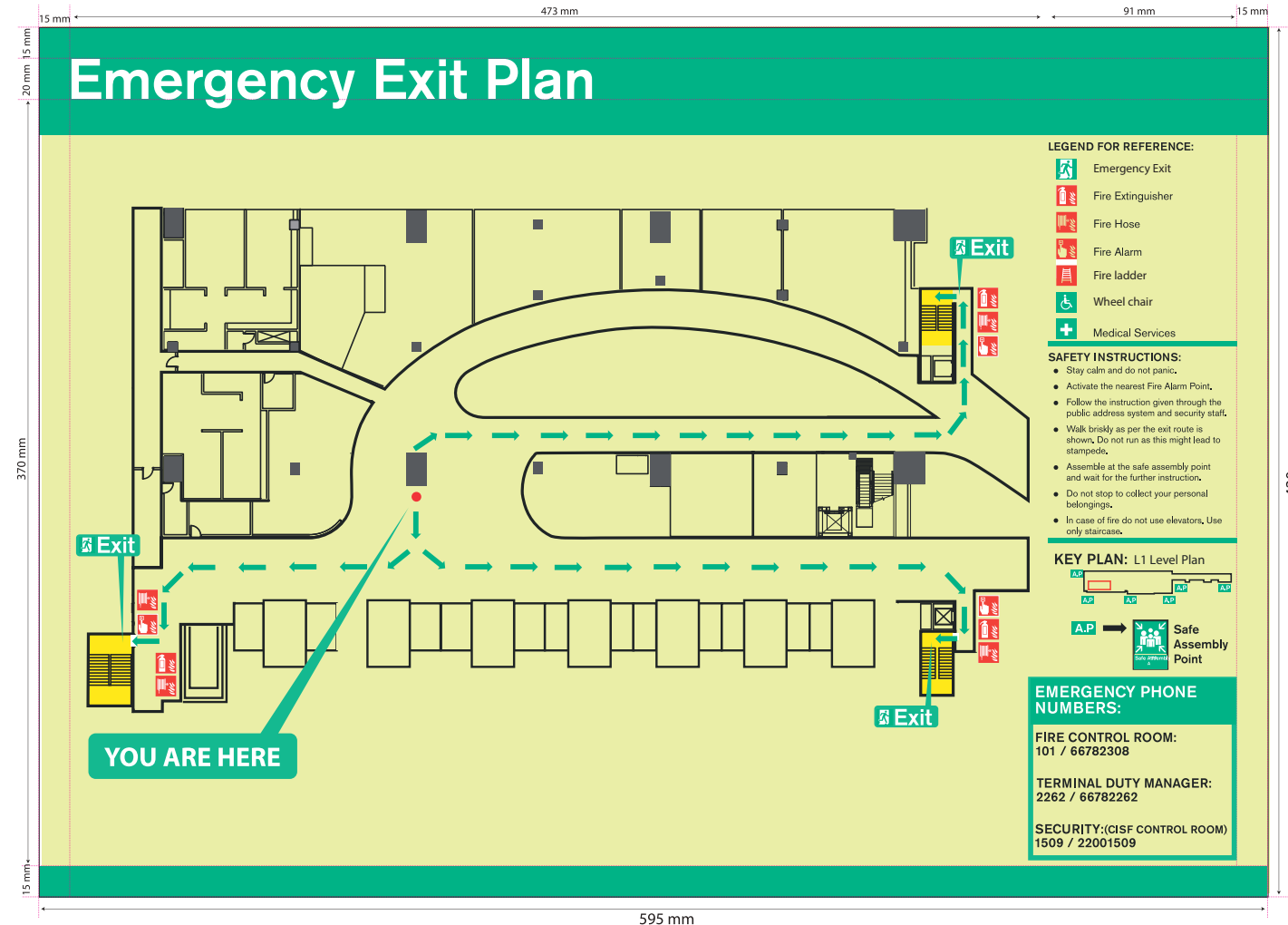
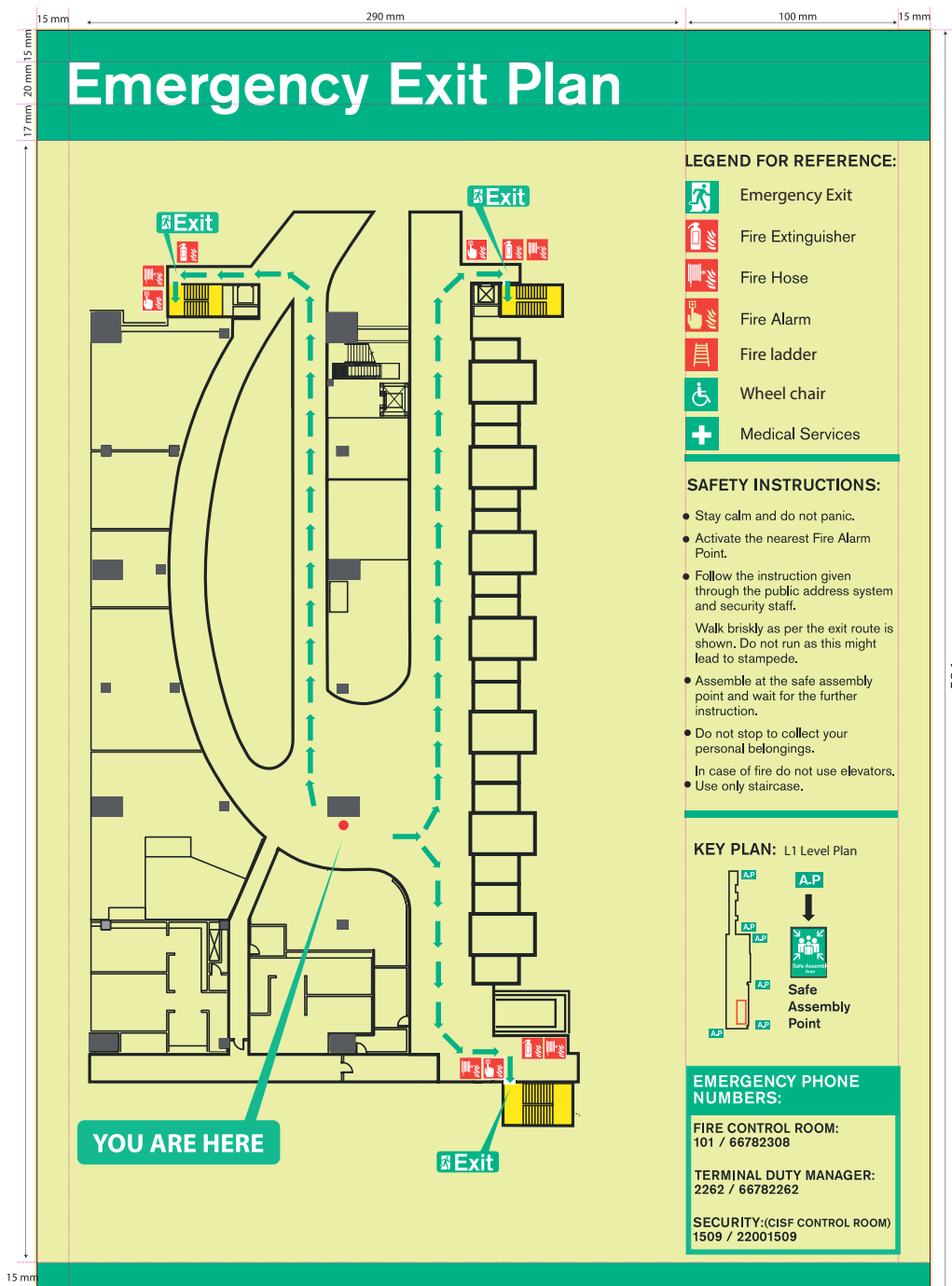
At location with available flat and non-porous surfaces like glass laminate panels, cladding- the printed vinyl can be applied directly

Artworks : The artworks will have to be made by the execution agency using inputs from consultants who have designed the emergency evacuation routs & firefighting equipment location.

Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Artwork : Procedure to prepare Fire plans

As built architectural drawings should be used as background.

The Drawings should show all the doors and the furniture layout and should not have any text.

Identify the location of the plan in the map.

Rotate the drawing in the fire plan in such a way that the orientation in the drawing matches to that of the location where it is placed.

Mark out the two nearest fire exists from that plan location using Green arrows.

Show the fire exit stairs and all fire fighting equipment on the floor.

Ensure updating the phone numbers and details after taking the details from the Airport Team.



2.7 Temporary Signs

2.7a	Queue manager Sign
2.7b	Information Sign

Principle

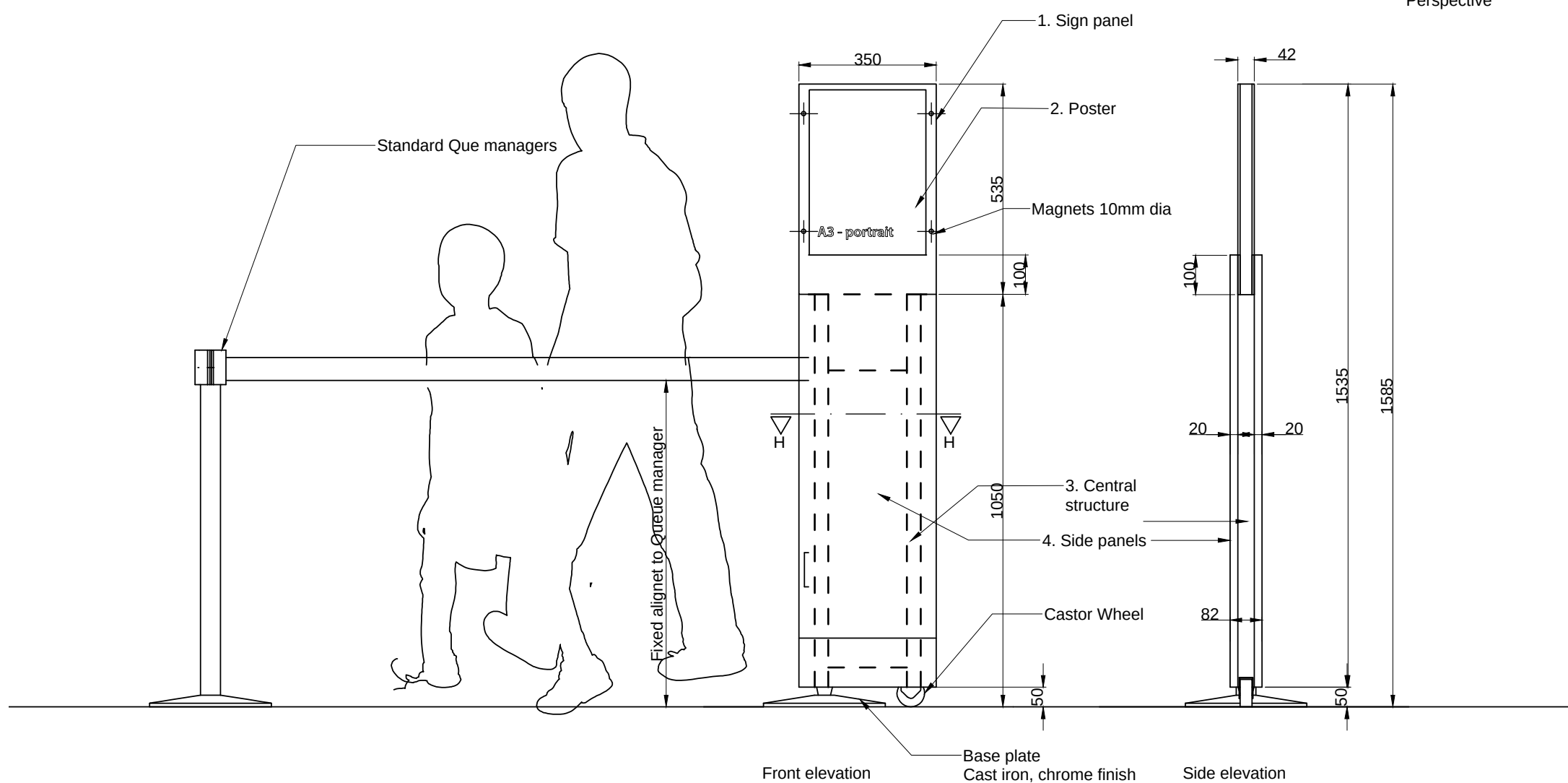
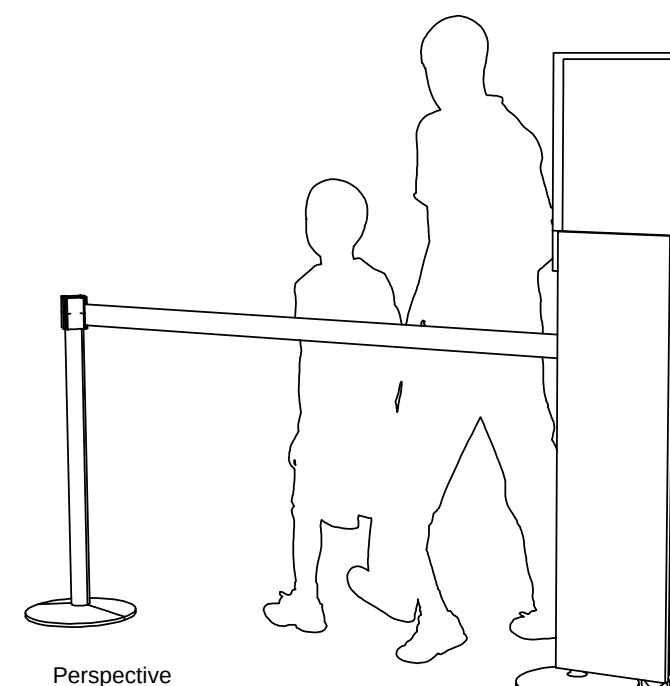
Material Specification

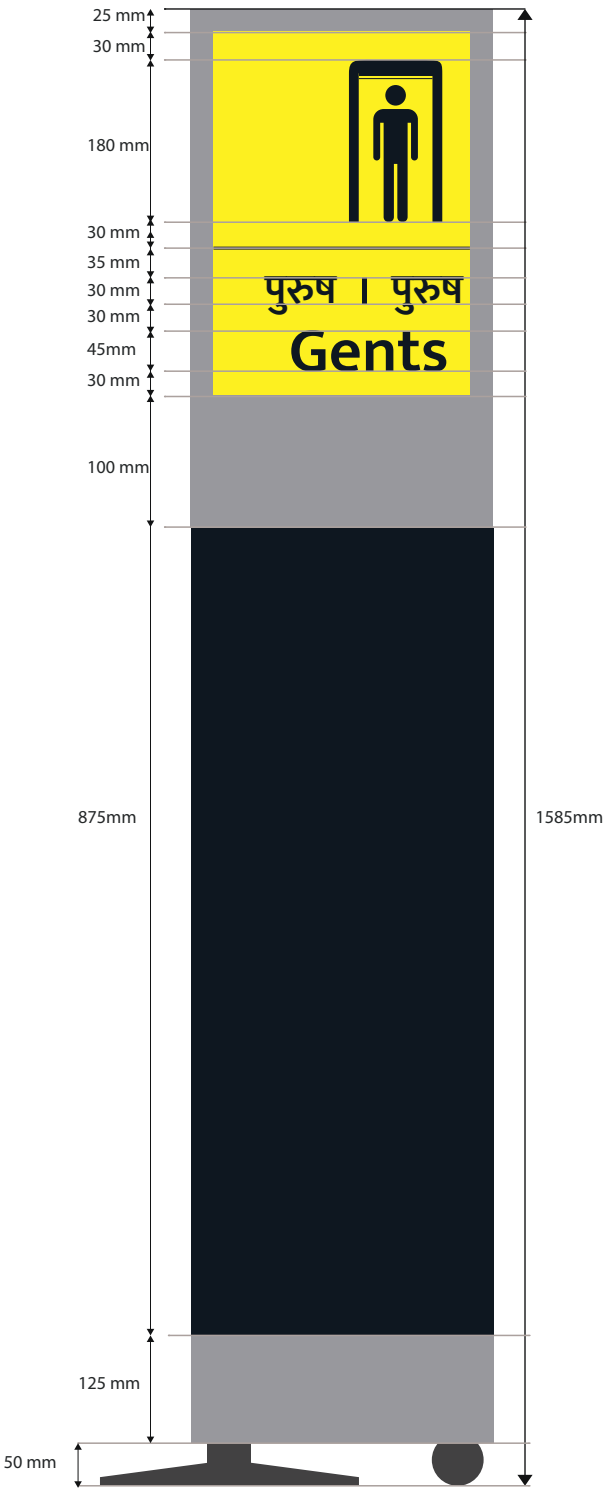
- Base to have heavy cast iron plate chrome finish and castor for easy movement and provided with attachment to receive the retractable band.

Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





▲ Sign Face Artwork

Sign Front Elevation ▶



Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Information Signs

Principle

Stands for displaying A1-Portrait size posters
Positioned as required. Structure made
compact for mobility as per requirement and
changing the message.

Material Specification

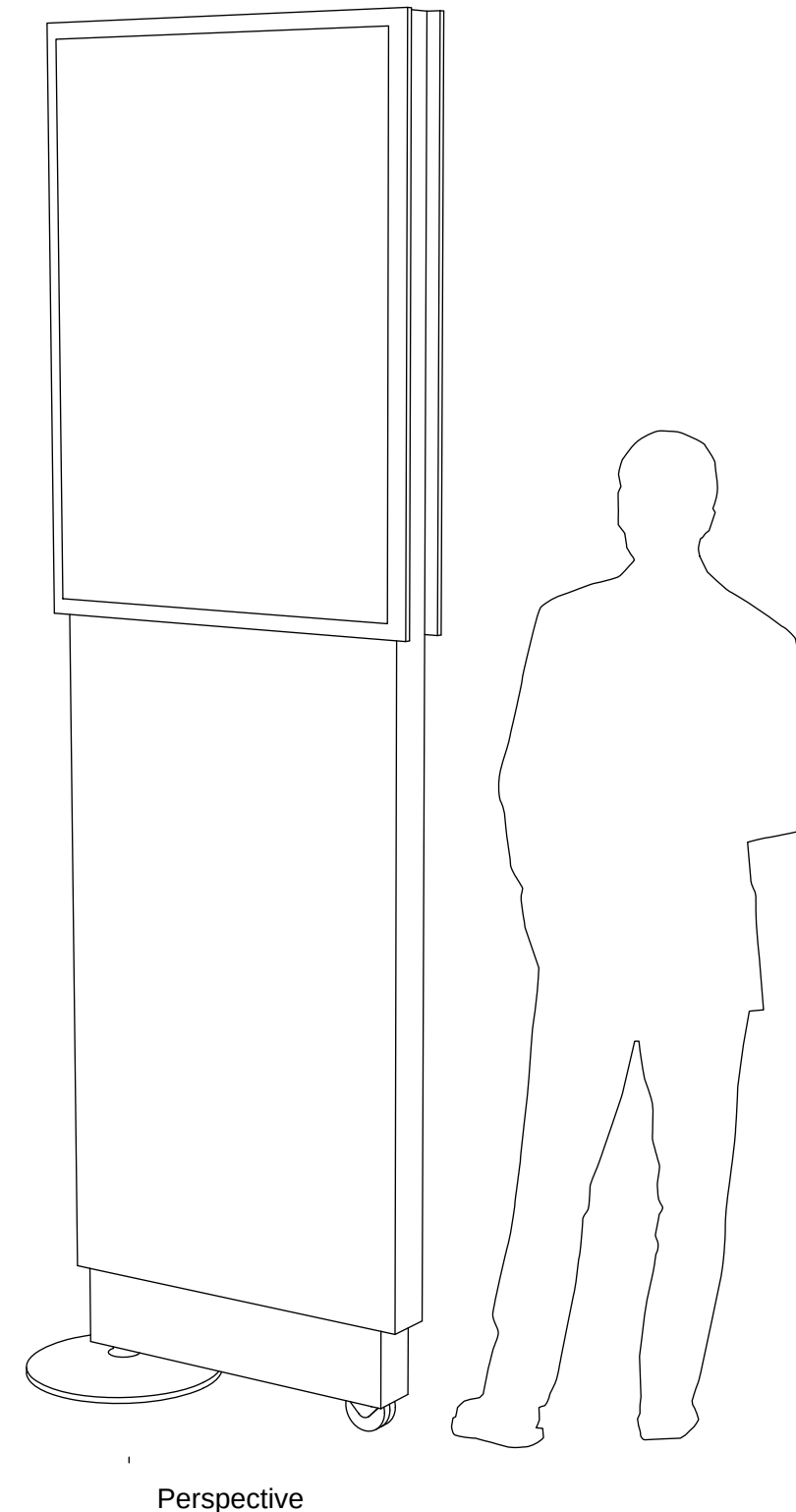
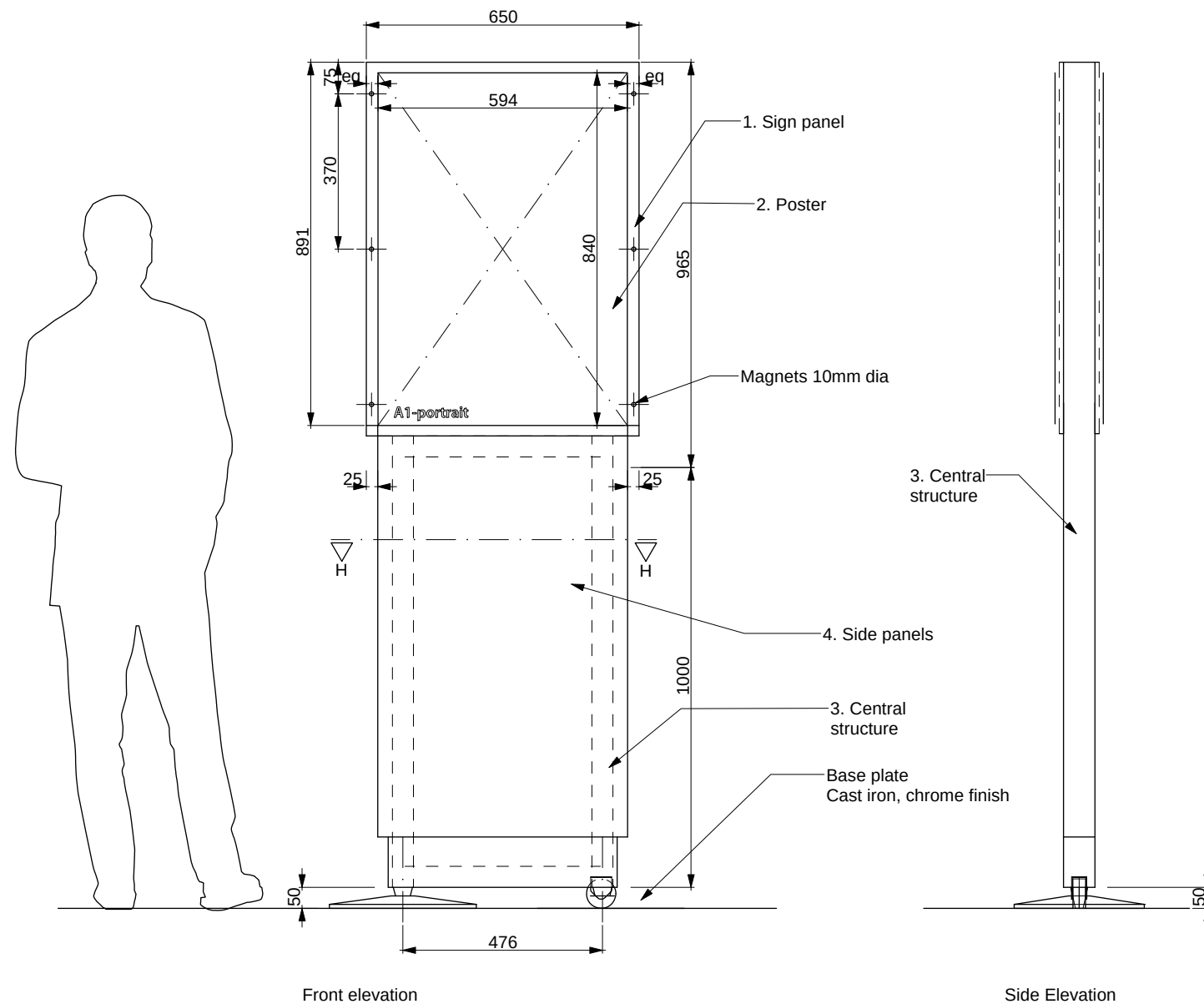
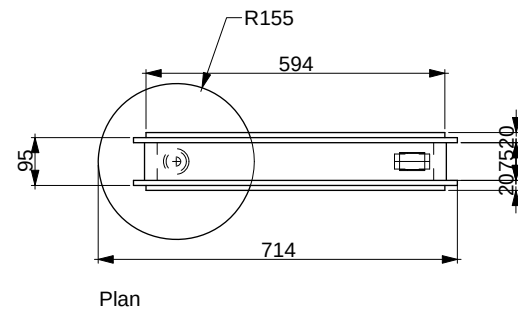
1. Sign panel - MS CRCA Powdercoated Black RAL 9011 fabricated as complete box mounted on structure. Face to receive 6mm thick clear Polycarbonate positioned using magnets to sandwich printed graphic
2. Poster - Printed paper inserted between Clear polycarbonate and back panel
3. Central structure - Cladding in powdercoated RAL 9006 MS panels fixed over MS internal structure. All internal structure to be Hot-dipped galvanised after fabrication.
4. Side panels - Stainless steel panels with 35mm return fixed on either side of sign mounted on central structure. Thickness of face polycarbonate shall be selected for the rigidity as per size and to retain flatness.

Base to have heavy cast iron plate chrome finish and castor for easy movement and provided with attachment to receive the retractable band.

Sign Adaptability as per Site Conditions:

Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.





2.9 Parking Signs

2.9a	Parking Directional Sign
2.9b	Parking Announcer Sign - Portal
2.9c	Parking Statutory Sign
2.9d	Parking Information Sign

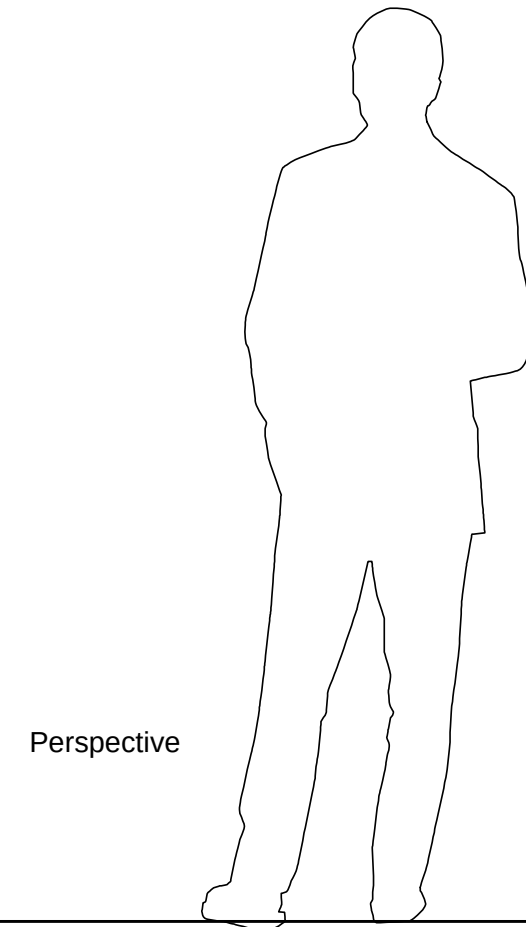
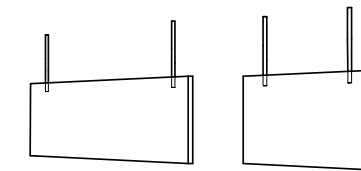
Principle

Type 1 : Directional Content
Type 2 : Only Pictos/Statutory

Lighting : All internal illumination shall be using Power LED Strip Edge Lights with electronic controllers, having even spread and overlaps to avoid banding and dark spots.

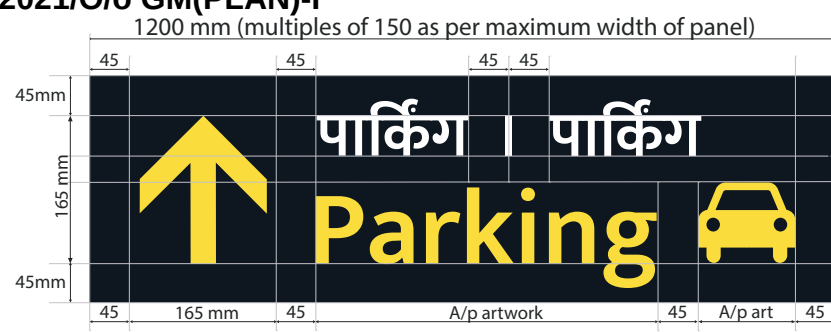
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

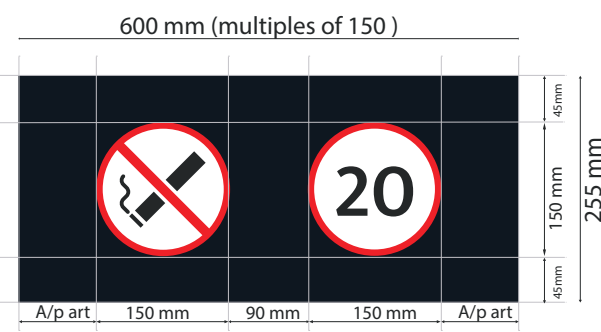


Annex-1 Pg 148

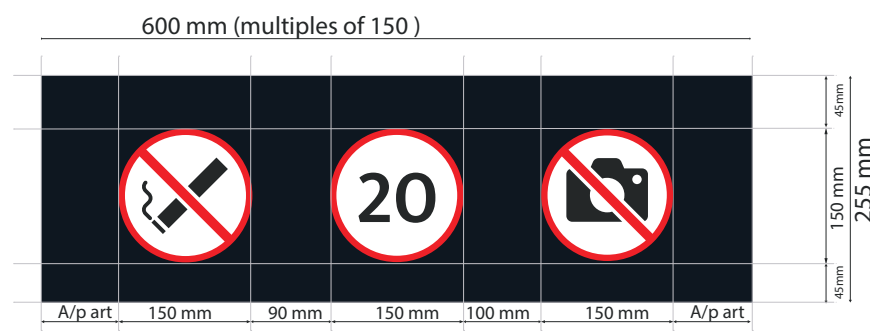
Parking Direction Sign



Type 1



Type 2



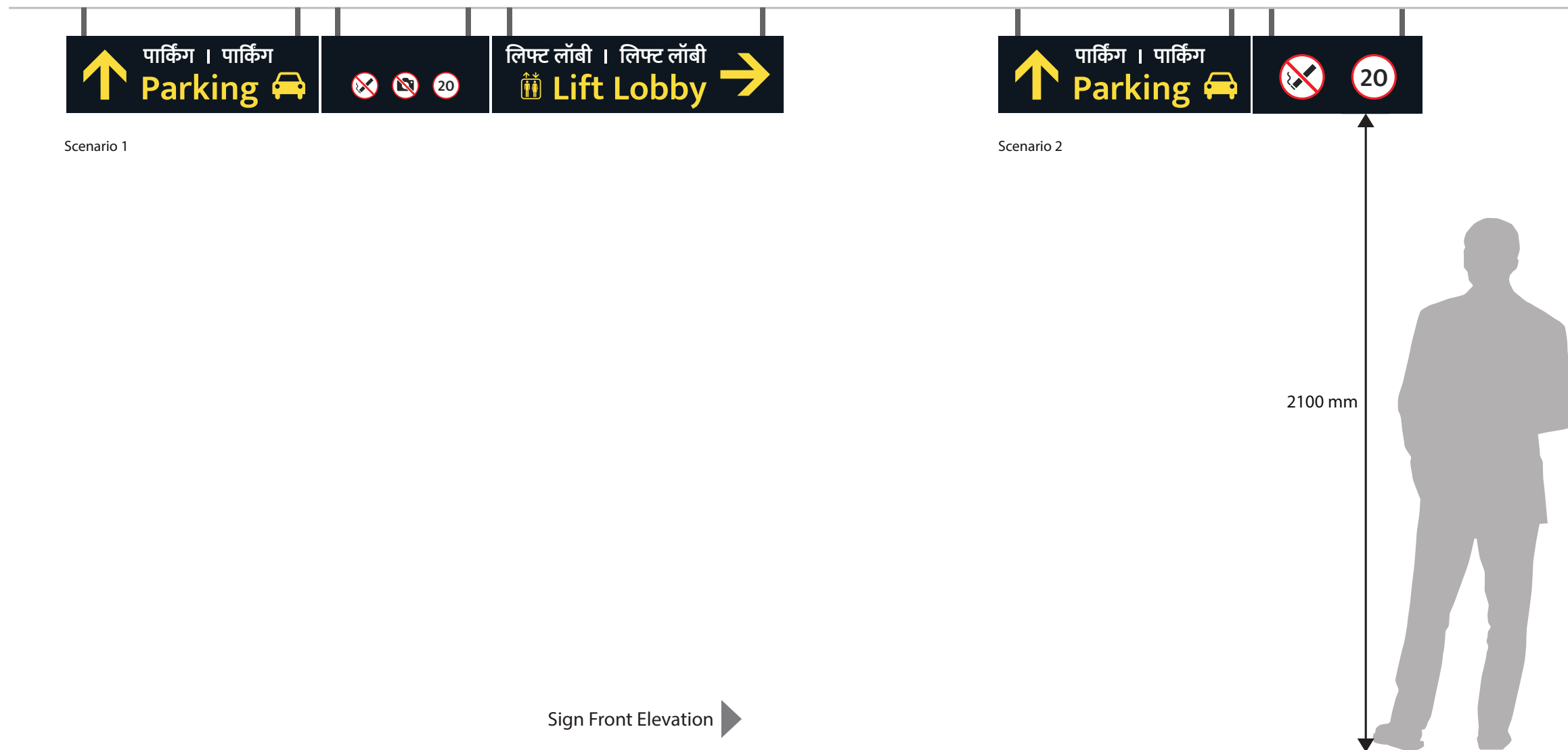
Type 2 : Variation

Note:

Artworks to be taken from the open file provided by the signage consultant.

Sign Face Artwork ▲

Type 2



Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Parking Announcer Sign - Portal

Principle

Principle: Sign placed on the approach road marking entry into the Airport parking area. The sign is located on a gantry. The length of the signage should be decided as per site and the structural stability shall also be finalized accordingly. The sign bottom is 4500 mm from the road top finish level.

Material Specification

1. Sign face - 3mm thick Aluminium sheet fabricated and fixed to both sides of horizontal structural as well PU painted to match with RAL 5013. Graphics in plotter cut exterior grade opaque vinyl matching Pantone 541c pasted over white retro reflective vinyl.
2. Sign structure - MS square post 200x200 or as per the structural design and mounting square sections, hotdipped galvanised and PU Painted to match RAL 9006 grouted in ground.
3. Sign Frame -Spanning truss shall be designed for the entire span considering the wind loads.

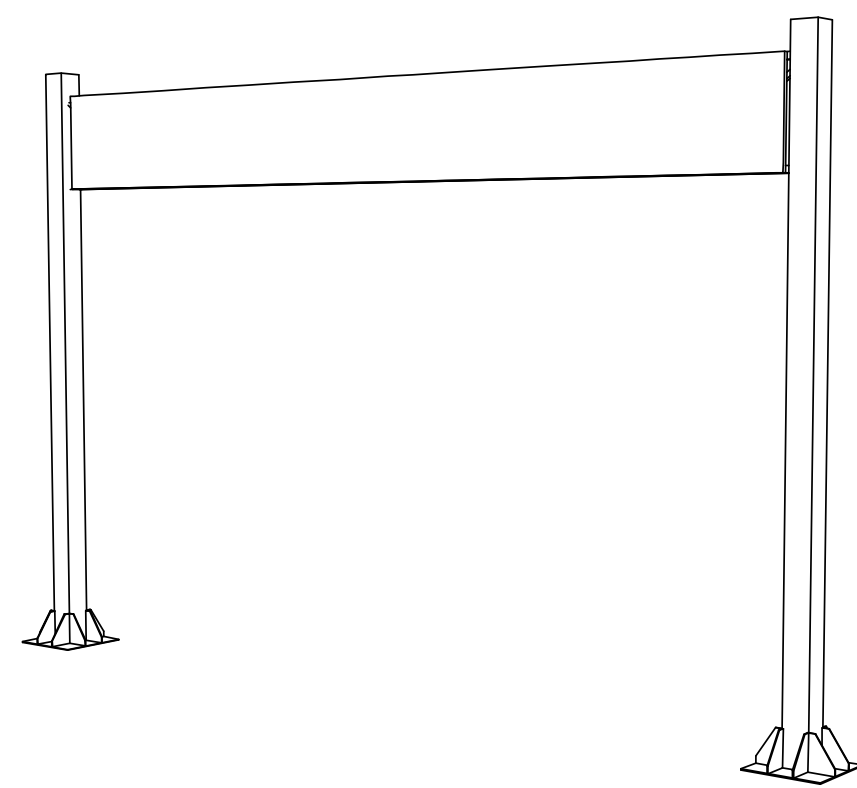
Bird Spikes - UV stabilized ,extreme temperature proof transparent 75 mm high Polycarbonate bird spikes mounted above the sign as required.

Sign Adaptability as per Site Conditions:

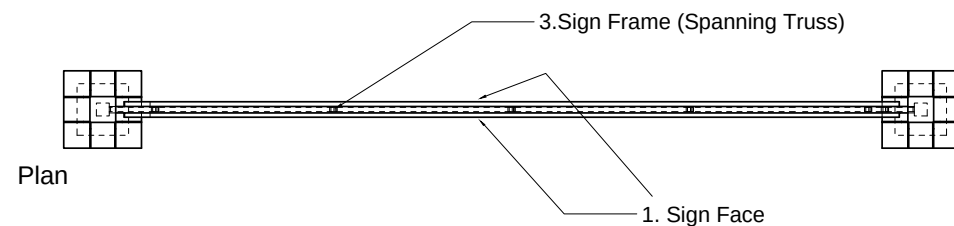
- Minimum ground clearance should be 4500 mm, should not exceed 6000 mm.

Keynotes:

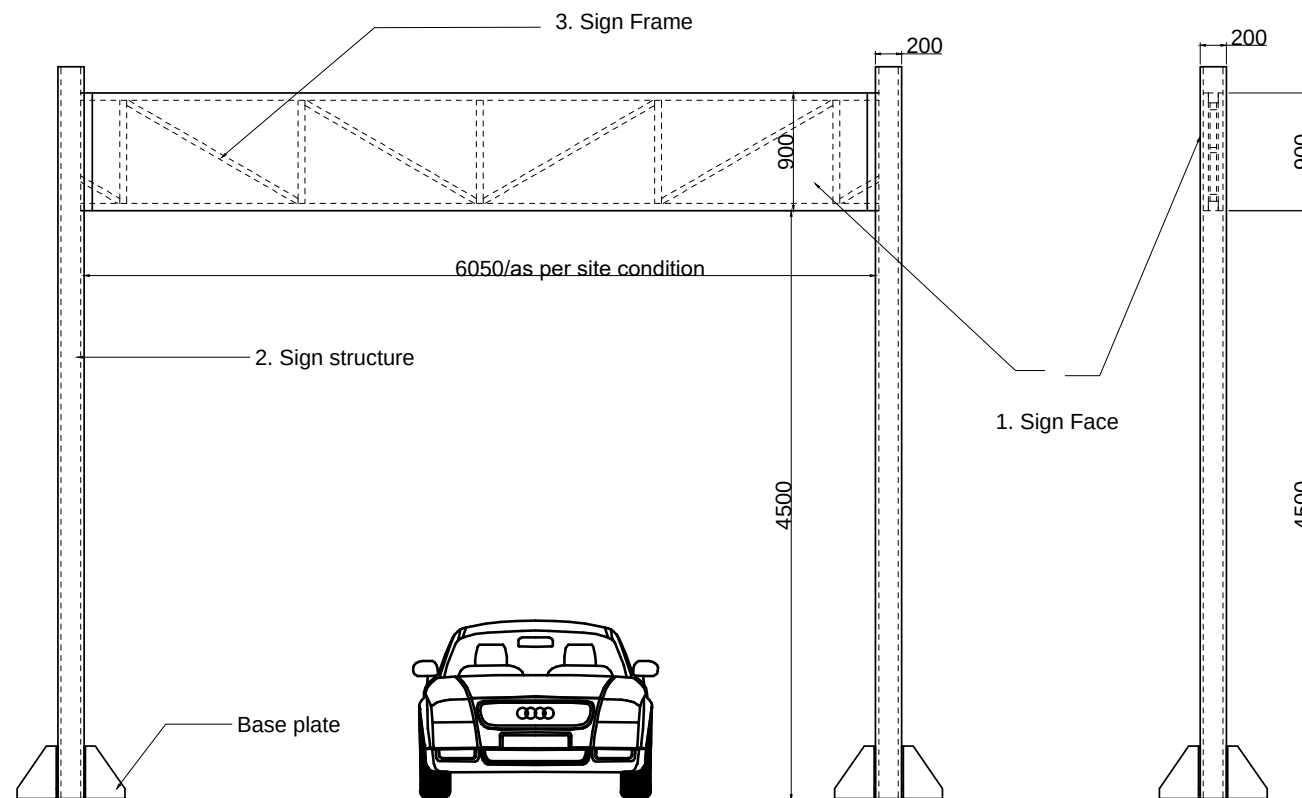
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



Perspective

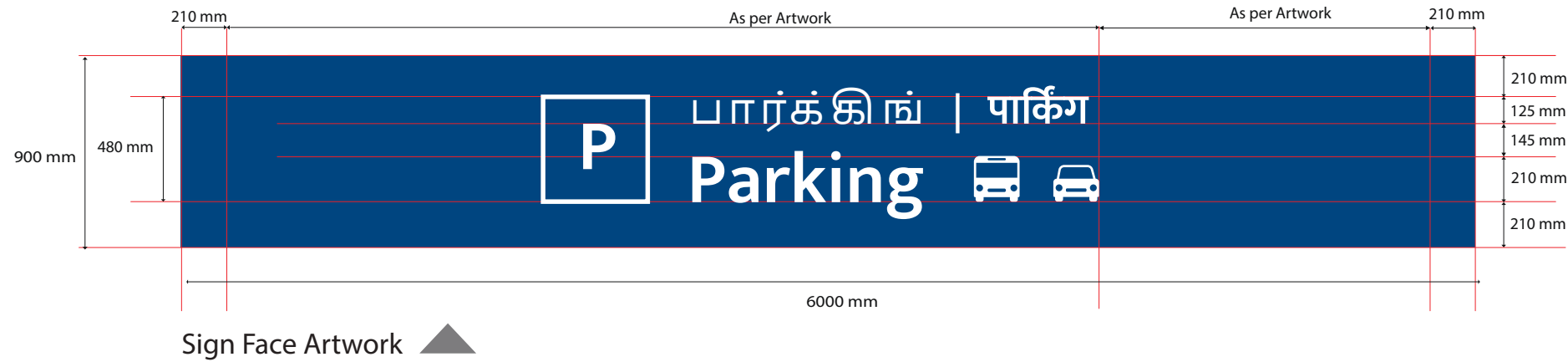


Plan



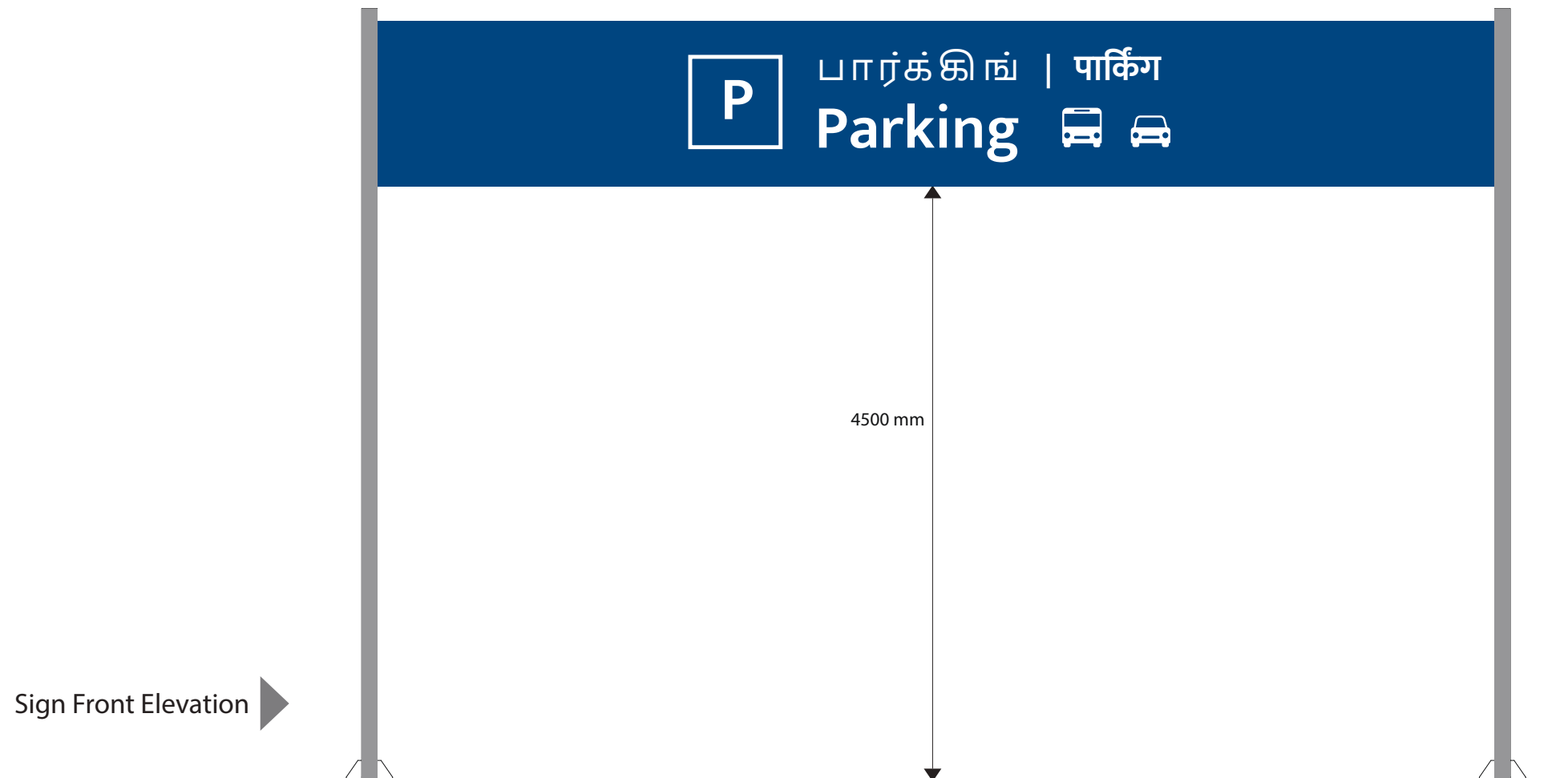
Front Elevation

Side elevation



Note:

Artworks to be taken from the open file provided by the signage consultant.



Sign Adaptability as per Site Conditions:

Keynotes:

The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Parking Statutory Sign

Principle

Parking statutory Sign:These are used in parking areas to show statutory pictograms and other parking zone related statutory information.

Material Specification

1. Sign Structure: Fabricated out of M.S. Frame and 25mm wide with inbuilt frame to receive digitally printed vinyl.

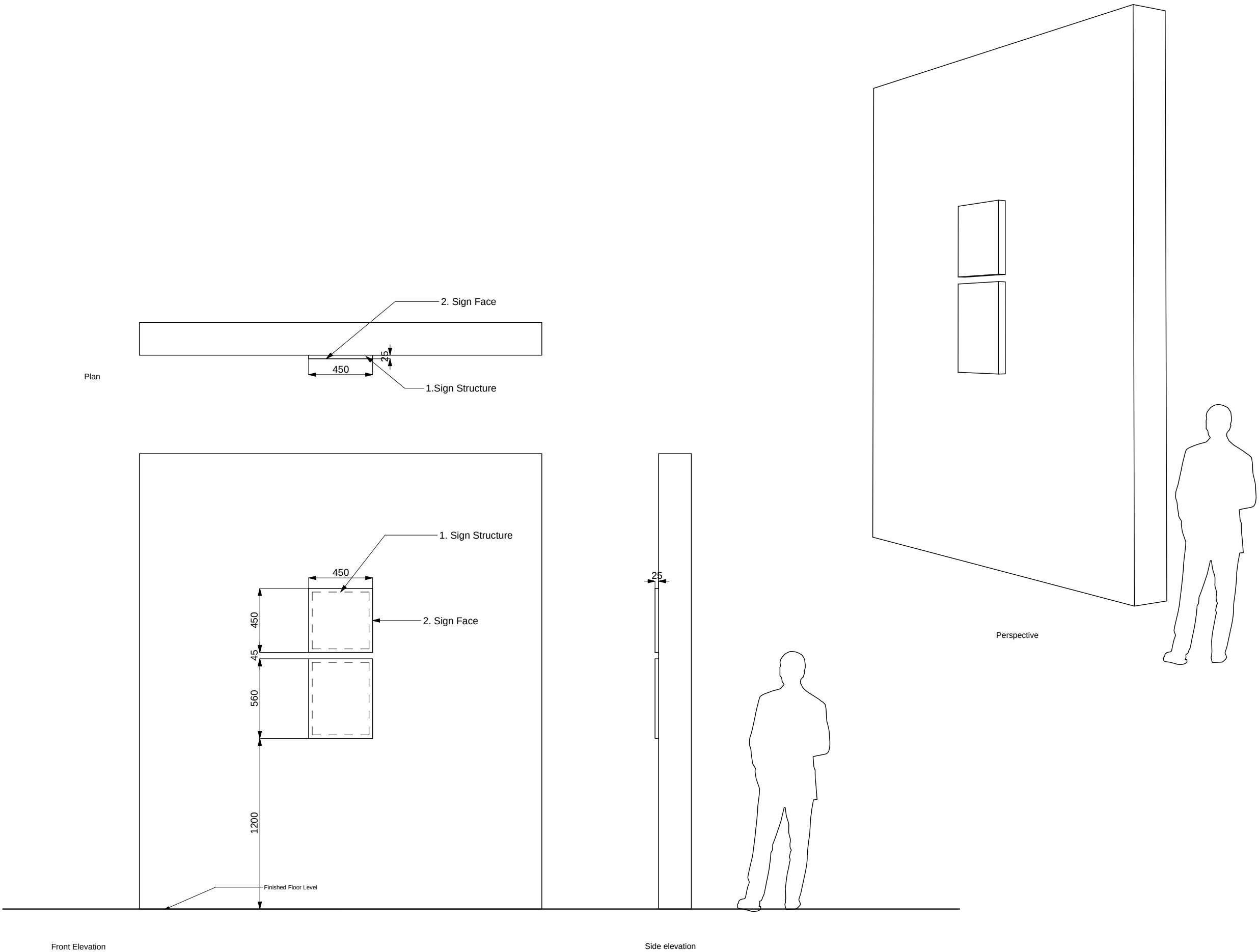
2.Sign Face:Plotter cut vinyl graphics in specified colours for sign background and graphics. pasted directly on the surface.

The actual structural design of the sign for its stability shall be responsibility of the EPC contractor and shall be designed with due consultation and approval from structural designer.

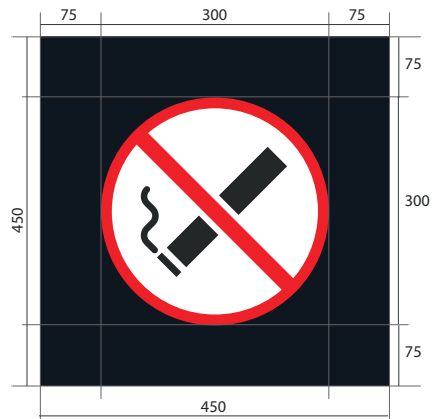
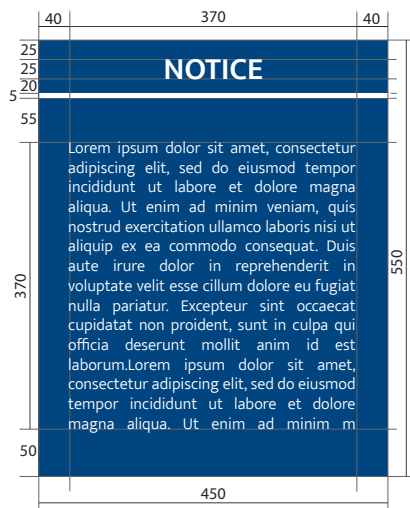
Sign Adaptability as per Site Conditions:

Keynotes:

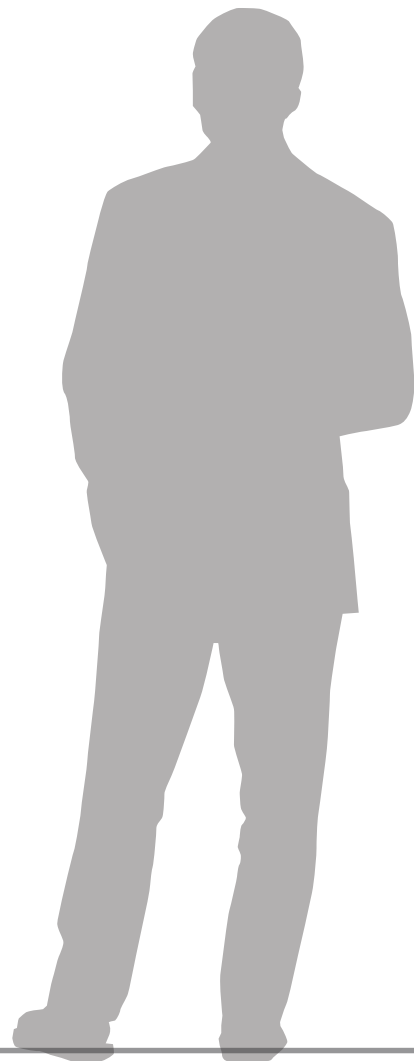
The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.



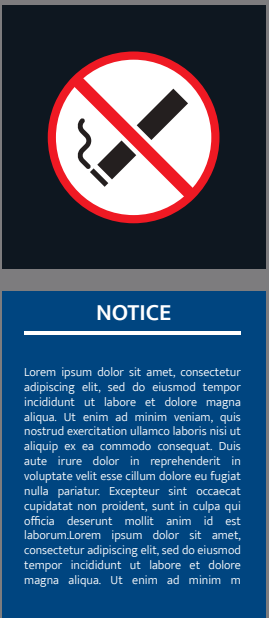
Parking Statutory Sign for covered parking spaces



Sign Face Artwork ▲



Sign Front Elevation ►



Note:
Artworks to be taken from the open file provided by the signage consultant.

Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

Parking information Sign

Principle

Parking Information Sign: This is used in parking areas to declare the information like parking charges as per the type of vehicle and other statutory information.

Material Specification

1. Sign Structure: Fabricated out of M.S. Frame 25mm x 25mm wide to receive digitally printed vinyl.

2. Sign Face: Printed vinyl graphics in specified colours for sign background and graphics, pasted directly on the 1.29 mm thick aluminium sheet.

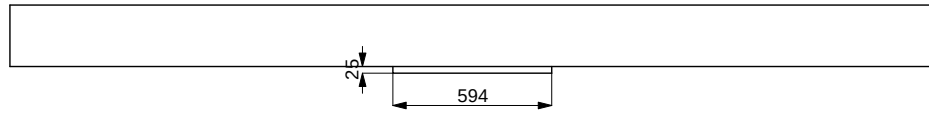
The actual structural design of the sign for its stability shall be responsibility of the EPC contractor and shall be designed with due consultation and approval from structural designer.

Sign Adaptability as per Site Conditions:

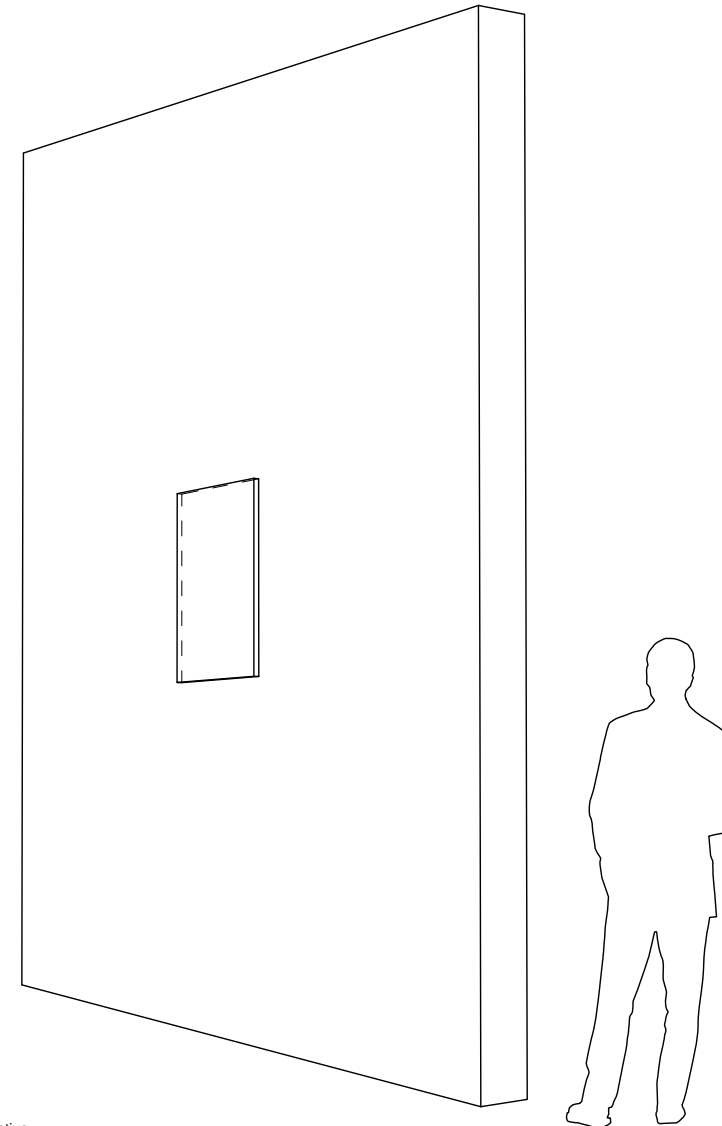
Keynotes:

The final shop drawing for internal structure and sign fabrication shall be created by signage contractor and submitted for approval before production.

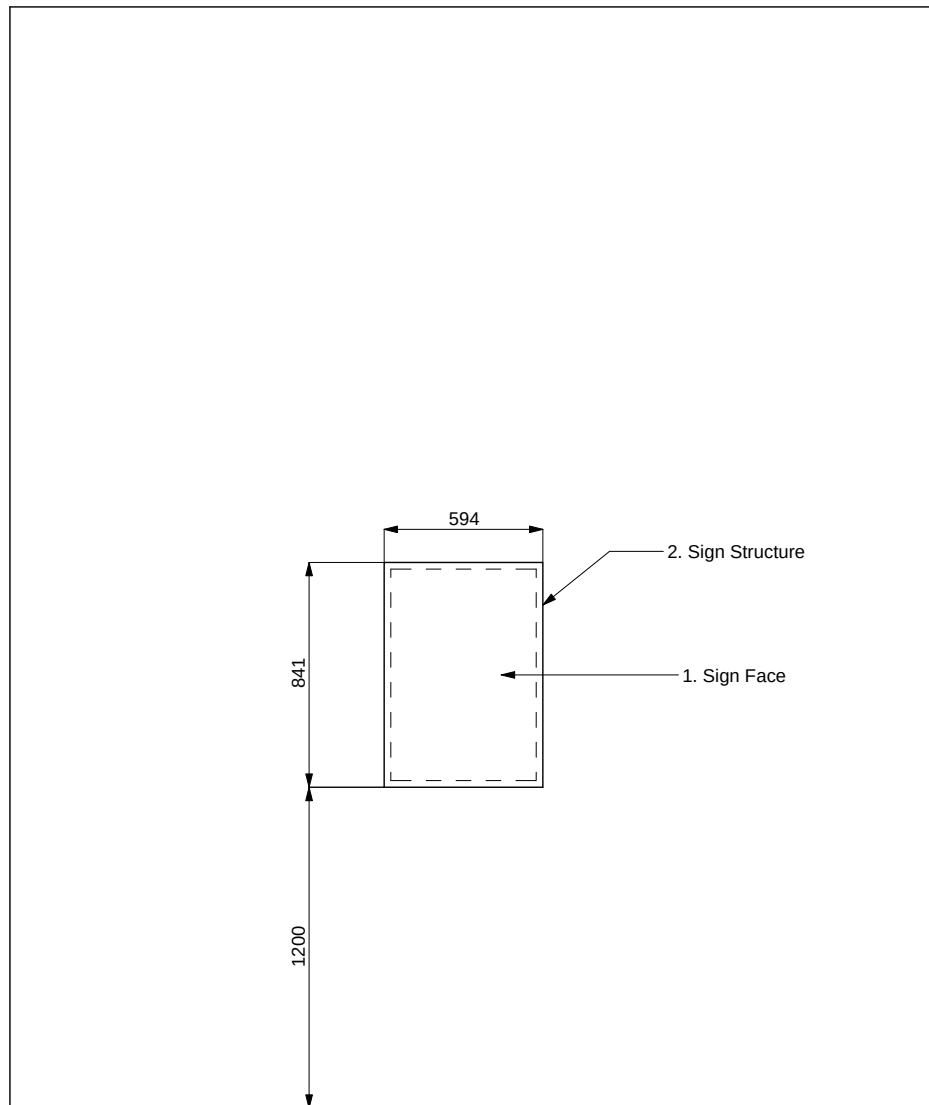
Plan



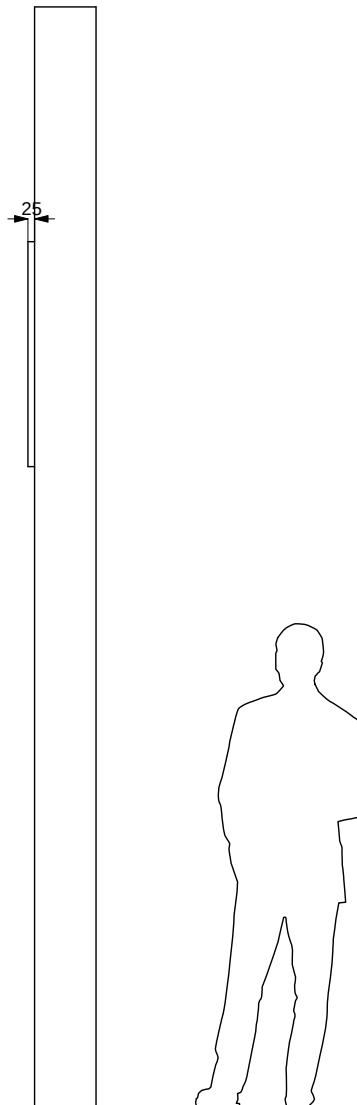
Perspective



Front Elevation

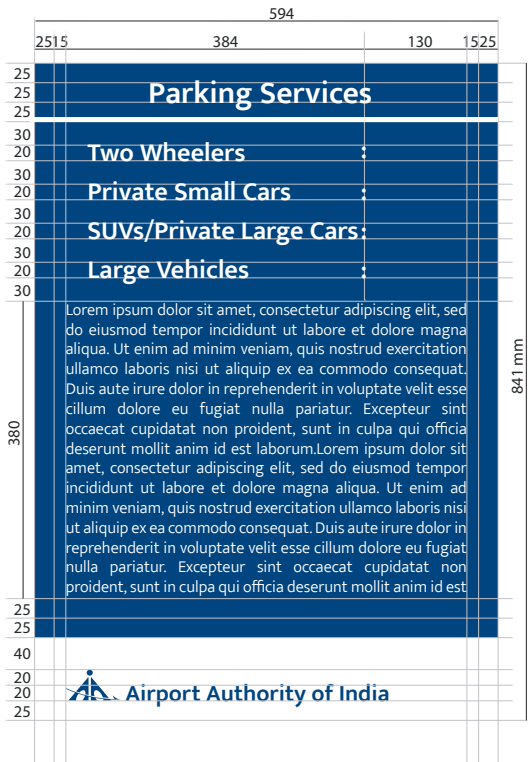


Side elevation

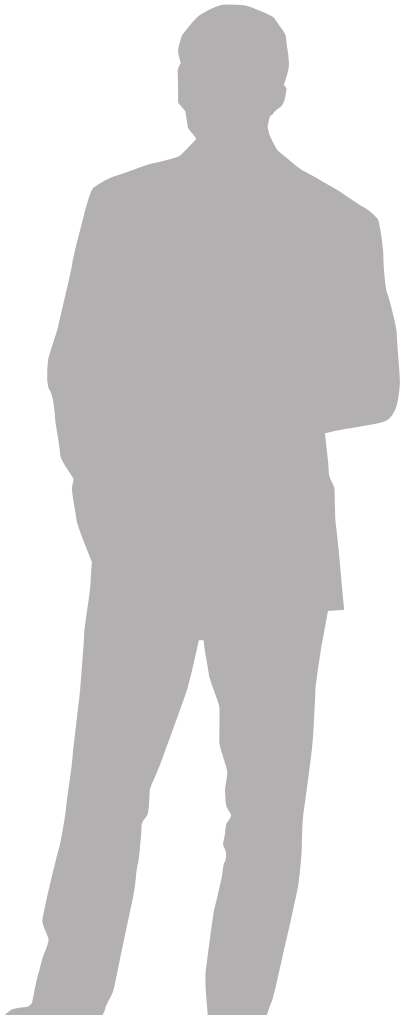
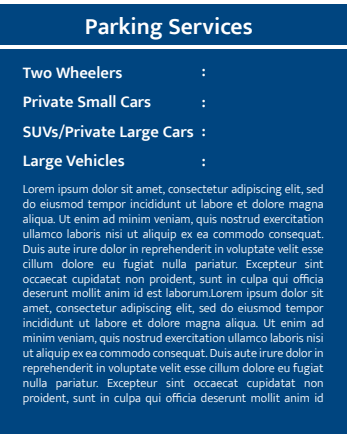


Parking information Sign
For covered parking spaces.

Note:
Artworks to be taken from the open file
provided by the signage consultant.



Sign Face Artwork



Sign Adaptability as per Site Conditions:

Keynotes:
The graphic template here specifies the grid, composition and proportion of the content, as per design intent. Final artworks will be prepared by the Vendor along with shop drawings and vetted structural design.

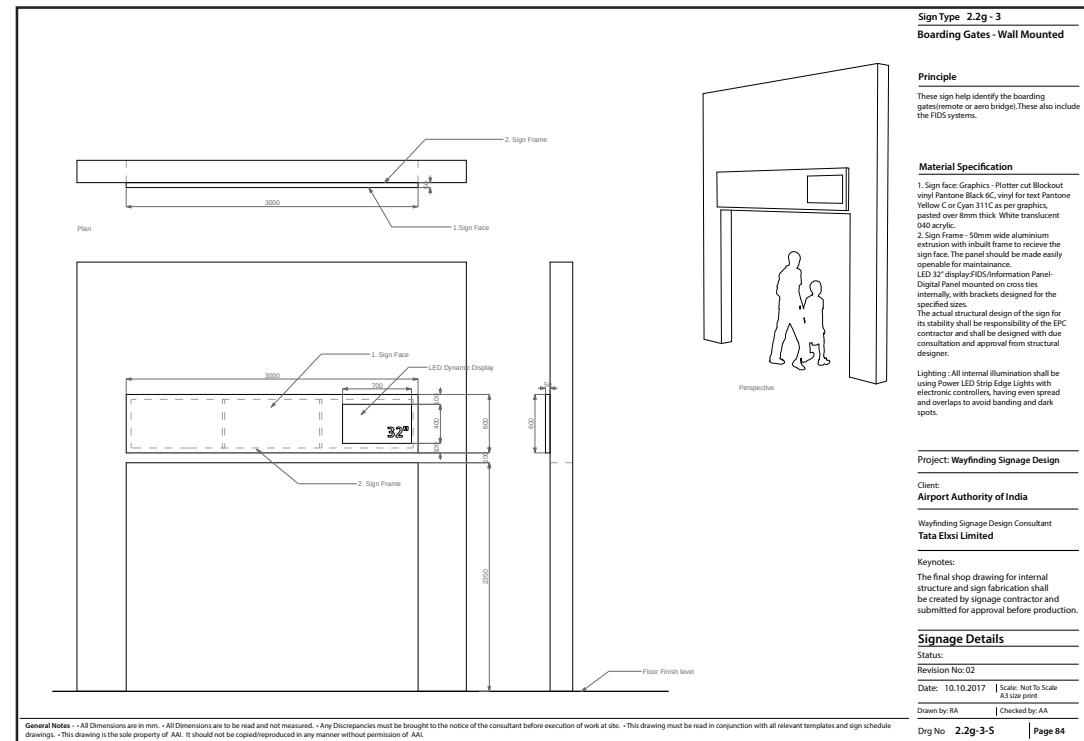
Tender Support Documents

Section

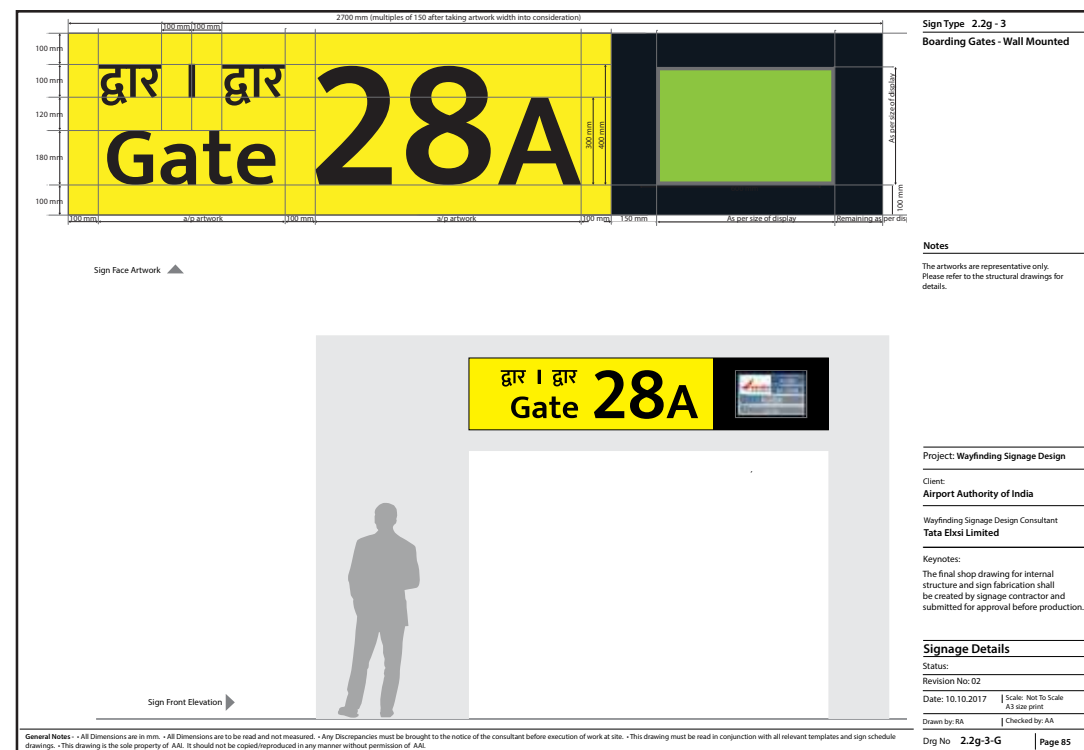
This section introduces the various supportive documents which will be required in the tendering process to ensure that the on board executing agency complies to design intent and is able to effectively implement the Wayfinding strategy on site.

- 1. Sign Design Guideline document**
- 2. Performance specifications**
- 3. Inputs to Special conditions to contract**
- 4. Preamble to BOQ**
- 5. Sign Planning documents**
 - Sign Types, symbols and Codes**
 - a. Sign Application drawings with Legend**
 - b. Sign Schedule & Contents**
 - Linkgaes and How to read documents**
- 6. Cost Estimation**
- 7. Bill of Quantities (BOQ)**

Sign Design Guideline Document



Sign type explained in Part 1- Details of Sign Structural guidelines



Sign type explained in Part 2 - Details of Sign graphic guidelines

Sign Design Guideline Document (SDGD) (Section D) gives the design details for the form, dimensions, material specifications and graphic templates for all the sign types designed for AAI Airports. Each sign type is explained in two parts; one being sign structure details and other sign graphic guidelines.

It is required to work out the shop drawings using these drawings for final production on the basis of fabrication facilities/ techniques adhering to the design intent and performance specifications.

Way finding strategy and the required elements are explained in detail for the ease of all executing stakeholders, in section B and Section C.

Dimensions of the sign types are suitable for implementation across airports of various scale and styles. However, these need to be verified as per the site conditions and may be modified, as necessary, with a caution that the overall design language remains intact post modification.

Special conditions where sign types could be modified, basis specific challenges are mentioned on sign structure pages in SDGD under 'sign adaptability as per site conditions'.

Sections to be referred with the current section:

MODULE 1

Design for Wayfinding in Airports

Section D: Sign Design Guidelines

1. Introduction

This document outlines the material specifications and performance requirements for execution and installation of signage for Airports by AAI. The material specifications are given for the key materials used in manufacture of the signage and performance criteria serves as a guideline for the detailing and implementation of the various details of the signage. This document shall be the key reference to be read in conjunction with the sign design document, sign schedules, general arrangement drawings and bill of quantities.

Outline scope of the contract

It is to be noted that the various sign types are specified and agreed for their design, visual appearance, dimensions, orientations, form, colour, suggestive fixing and placements at the airport and will be binding on to the contractor. However, the actual detailing at times material specification, detailing for fixing, joineries, integration with the built architectural elements, connection and coordination with electrical and data cabling, installation, stability, accuracy and correctness of design implementation as per the performance criteria is the responsibility of the contractor.

Contractor is provided with design specifications for each sign type indicating overall dimensions, material specification, suggestive fixing, artworks, location of fixing, quantities, through the sign drawings, general arrangement drawings, schedules and bill of quantities.

This document gives the technical specification for the specified materials and notes on best practice, workmanship which shall be guideline for the contractor to accomplish the job. It is contractors responsibility to detail for fabrication shall be presented to the airport core team for approval. The integration and coordination of the signage for their fixing with architectural element like walls, floor, ceiling and structural member shall be detailed and worked out by contractor based on performance and design criteria given in the document.

List of materials

Following materials are mentioned in the document which cover the majority of the work for sign fabrication but is not limited and newer options/advanced materials can be explored basis their meeting the performance criteria of signing. Components and accessories like hardware shall be procured of the best quality confirming to the Indian standards for matching life expectancy to the materials they are used in combination with.

No	Material	Format
1.	Acrylic	Sheets
2.	Polycarbonate	Sheets
3.	Vinyl films	Films and laminates
4.	Aluminium	Extrusions, Profiles, sheets
5.	Stainless steel	Sheets, Rolled sections
6.	Mild Steel	Sheets, Rolled sections
7.	Illumination and electrical	Lamps and electronics (LED)
8.	Powder coating	
9.	Polyurethane painting	
10.	Photoluminiscent signs	
11.	Retro-Reflective Vinyl	
12.	Printed Flex	

2. Common Notes

Sign detailing and construction

Fabrication quality must be of a high standard and all illuminated signs will need to meet general electrical safety standards as determined by Indian Standards. It is envisaged that all illuminated signs will also need to offer an IP-54 rating for internal applications & IP-65 for external applications to prevent water and dust ingress. There should be no dangerously sharp corners or raw edges and all burrs must be removed. All graphics must be sealed to resist the abrasive action of weather or washing. All graphics and construction materials must be able to withstand the effects of heat and cold within the range of -5°C and 65°C.

Phase wise removal and installation of the sign would be done where new sign proposed are at same location of old. Sign faces must be fairly easy to remove and replace if necessary with hidden/flush screw heads in the top of the frame. The suspenders must allow an adjustment in height and also allow some lateral adjustment. All signs must be able to be cleaned back to a visual standard equal to that when first installed.

In addition to design the sign structure for dead loads and imposed or live loads - structure must be able to withstand accidental damage or knocks without becoming dangerous. Graphic surfaces or panels must be easy to replace in case of damage or change in text. Replacement of complete signs must be straight forward and not need to be achieved by the use of any specialized equipment. Ideally, graphic panels should be removable without any adjustment to any fixing bracket, rod or support.

The sign board should be designed in such a way that it shall accommodate all the accessories in proper manner without congestion inside the box.

The sign board should have proper arrangement for heat dissipation.

The sign board should be compliant with IP-54 for internal applications & IP-65 for external applications.

The signages should be complaint with the requirements of NBC-2016 & other applicable local regulations.

Graphic surface or panels must be easy to replace in case of damage or change in text.

Warranty

All sign structures should be provided with a 10-year warranty for the graphics and sign panels. Vendor will submit an Undertaking by the manufacture(s) for warranty of 10 years.

Typical sign details: Illuminated signs

The majority of the sign structures are illuminated signs. Some of the directional signs are in matched pairs with information where information signs aligned at bottom of directions signs panel on the same structure.

The illuminated sign units have been designed so that only the text and graphics illuminate.

The Illumination levels in the signs shall give uniform spread and brightness to stand out in the ambient lighting conditions during day and night of Terminal interior. Burning out due to placement of lamps close to the sign face and dark spots shall be avoided but carefully fixing the LED inside the sign frame. A light diffuser film shall be used on the inside of white acrylic for even light distribution and achieving the desired results.

All internal illumination shall be using Power LED Lights with electronic controllers.

Adequate ventilation to dissipate the heat from inside the sign shall be provided in not visible areas and locations and detail to ensure meeting the IP rating requirements.

Illumination level of signages should be uniform throughout to ensure that there should not be any dark spot.

Typical sign details: Non-illuminated signs

Some location signs are non-illuminated. They shall manufacture to look identical to the illuminated signs but with vinyl graphics sign faces. They do not need to be as deep as the illuminated sign units but fixing requirements and details will remain the same.

Some signs in the schedule may require only graphics to be changed on the faces of existing signs. These signs have been manufactured using vinyl graphics which can be removed and replaced with new vinyl where the type, thickness and colour of vinyl must be as per the new artwork provided.

Information, prohibition and some safety signs faces can be manufactured as acrylic panels. Sign fixing brackets and hinges can be the same as used earlier but allowance must be made for height adjustment and leveling.

Typical sign details: Emergency escape signs

Emergency escape signs shall be executed using all fire resistant materials namely MS CRCA powder coated sheet sign frames and boxes, Aluminium for the sign face with vinyl graphics applied from the inside to protect them against heating in case exposed to fire. The sign shall have internal illumination from a UPS with a min 1.5-hour backup. In general materials shall in Emergency signs comply with flame spread Index of '0'.

All fire life safety plans shall be Powder Coated Aluminum Sheets mounted on wall.

Typical sign details: Vinyl signs/graphics

At some places application of vinyl graphics is required to provide counter numbers, gate numbers, signing text, door signs and statutory signing labels. Full artwork, layout guides and detailed schedule information is available for this vinyl application.

Drawings

The Engineer in charge will supply to the Contractor profile drawings showing sizes of sign face and fixing type. Structural drawing and detail has to be worked out by contractor and get approved by Engineer in charge. Should there be any discrepancy in the drawings the Contractor is to refer the matter to the Engineer. The Contractor shall further provide a drawing showing the accurate setting out to line and level of all the anchor bolts intended for the work in sufficient time for their inclusion in the work so as to maintain the building program.

The contractor is to prepare all the necessary fabrication shop drawings and these shall be submitted to the Engineer in duplicate and be approved by him before fabrication is commenced. All such drawings shall show the dimensions of all parts, method of construction, assembly, installation. A further set of all approved fabrication drawings shall be supplied by the Contractor for use of the Engineer as required.

The drawings for illuminated signs shall cover the placements and layout of luminaires inside the sign panel.

Approval by the Engineer of drawings or any other particulars submitted by the Contractor shall not relieve the Contractor of full responsibility for any discrepancies, errors or omissions therein. The Contractor shall at his own expense supply such additional copies of his working drawings as are required for the use of the interested parties.

The contractor shall also create as built drawings for all the sign types for the documentation requirements for the project management and operations.

Quality check and inspection

Each material to be used in the fabrication of signs shall be approved with AAI / Consultant by presenting 2 copies of samples prior to its purchase and use.

The contractor shall inform the Engineer of the progress in fabrication and as to when individual pieces are ready for inspection. All gauge templates, sample materials, sizing templates, colour swatches, necessary to satisfy the Engineer shall be supplied by the contractor. The Engineer may at his discretion check the results obtained at the contractor's works by independent tests and should the material so tested be found unsatisfactory, the cost of such tests shall be borne by the contractor. During Inspection, the component/member shall not have any load or external restraint.

3. Colours

All the Signage for Airports shall use the following colour specifications.

Sr. no.	Application	Colour	Colour reference
1	Sign Framing		RAL 9006
2	Background (Exterior-Road)	Blue	RAL 5013
3	Primary Message (Exterior-Road)	White	
4	Background (Exterior-Curb Side)	Yellow	PANTONE YELLOW C
5	Primary Message (Exterior-Curb Side)	Black	PANTONE BLACK 6C
6	Background (Interior)	Black	RAL 9011/ PANTONE BLACK 6C
7	Primary Message (Interior)	Yellow	PANTONE YELLOW C
8	Secondary Message (Interior)	Cyan	PANTONE 311C
9	Fire Signs	Green	PANTONE 3405C
10		Red	PANTONE 032C
11	Statutory Signs (Background)	Blue	PANTONE BLUE 541C
12	Statutory Signs (Message)	White	

The Above specified colours will be used through various materials like **Vinyl Films, Powder Coating, Painting, Printing.**

All the above materials shall be presented as samples in multiple copies for approval of engineer-in-charge before commencing any work.

In case of special colour to be developed it will be contractor's responsibility to coordinate with the manufacturer and present the various swatches to the engineer in charge for approval. All materials specific to the colour are important for the visual appearance of signs and execution of these shall confirm to the technical specifications and notes for quality of workmanship given in this document.

005433/2021/010 (Rev. 01)

Performance Specifications

4. Materials

For all other material required for the works, the approval of the Engineer shall be obtained by the Contractor prior to the use of the material in the works.

Contractors are expected to provide the standard warranty and the invoices from the manufacturers covering all the materials used.

a. Acrylic

White Cast acrylic sheets with 40% light transmission shall be used as face of all illuminated signs.

The acrylic should have excellent weather-ability and UV stability for min 10 years.

Acrylics made from virgin polymers shall be used for the sign faces

A 5mm or 8 mm thick Acrylic sheet is proposed for illuminated sign faces with a +/- 0.6mm tolerance for the thickness. For larger sign faces more than 700mm height and 1600mm long shall use a 6mm thick acrylic. The sign face should not bulge or cave in normal conditions.

b. Polycarbonate

All polycarbonate sheets should be UV stabilized outdoor grade

No visual defects are allowed by inspection from a close inspection and the material should offer a min 10years warranty against yellowing and loss of light transmission

c. Workmanship for both Acrylic and Polycarbonate

The surfaces of Acrylic come covered with a masking film on both surfaces for protection during transport, storage and fabrication. The masking film should be left in place during fabrication work and all marking-out drawn on the film. It is recommended not to remove the marking film until necessary to prevent dust collection and accidental surface scoring or scratching. However, care should be taken not to have the surface scratched during handling.

Before pasting the vinyl graphics, it is advised to wash the sheet surfaces to be decorated with clean, fresh water using a soft cloth. This has the advantage of removing all traces of static charge from the sheet after removal of the film which might otherwise attract dust. For all general purpose cleaning operations, acrylic should be washed simply with clean cold water to which a little detergent has been added. The use of any solvents such as methylated spirits, turpentine, white spirit or proprietary window cleaning products is neither necessary nor recommended.

Flatness of the sheets is very important for the signs to appear neat.

The cutting shall be done using powered saw to a tolerance of +/- 1mm. The edges shall be cleaned of any bur and chamfered to make the acrylic comfortably sit inside the frame.

d. Vinyl Films

Block out vinyl films

Cast films should to provide complete light blocking characteristics with less than 0.001% light transmission.

A luster/matt finish colour matching to specified Pantone colours on the outside and uniformly white on the adhesive side.

A cast vinyl face film of thickness between 0.1mm to 0.13mm, with clear acrylic based permanent pressure sensitive adhesive.

The film shall provide strong adhesion to a wide variety of substrates with perfect dimensional stability and perform well as second surface media.

The films should have self-extinguishable property and have a performance guarantee against colour fading, peeling, cracking.

Opaque vinyl films

Cast opaque films of thickness between .063mm to .09mm, with clear acrylic based permanent pressure sensitive adhesive.

The film shall provide strong adhesion to a wide variety of substrates with perfect dimensional stability and perform well as second surface media.

The films should have self-extinguishable property and have a performance guarantee against colour fading, peeling, cracking.

Translucent Vinyl film

Translucent Graphic Film to allow light transmission

Cast vinyl film of thickness (0.05 mm) with clear pressure sensitive adhesive

A cast vinyl film with a clear, permanent, pressure-sensitive adhesive and a translucent synthetic liner that does not split if wet

The films should have self-extinguishable property.

Should have a performance guarantee against colour fading, peeling, cracking

Should be able to withstand temperatures in the range -45° to +77°C

Printable vinyl/ Opaque vinyl/ Printable floor application/ Floor laminate

e. Workmanship for Vinyl pasting (Plotter cut Vinyl sheet graphics/text)

Proper preparation of application surface is essential to obtain high quality and long lasting markings.

Clean the substrate as per recommendation of vinyl manufacturer.

Remove entire liner from adhesive side of film.

Align the film and press one edge to surface with finger.

With a squeeze, apply remaining film using overlapping strokes. Hold the film away from surface to avoid pre adhesion.

The plotted vinyl sheet should be applied to the substrates with the use of approved application tape to insure correct placement and accuracy. Vinyl application should be done in a dust free environment.

Remove pre-mask:

Remove application film from the face of the film by pulling tape back upon itself at a 180-degree angle. Application film should be removed after 24 hours of application.

Re-squeeze all edges to prevent edge lifting. This must be done after application of film removal. Use firm even pressure. If not thoroughly re squeezed after pre mask removal, the adhesion at edges of film loosened by pre mask removal may start peeling off due to dirt or moisture and subsequently lift or be susceptible to damage from pressure washing.

Remove entrapped air:

All film pasting on the surface including the over laminate should be free from air bubbles. Inspect the film in flat areas for bubbles. To eliminate the bubbles, puncture the film at one

Self-matching and complementing films should be used for all situations involving layers of films laminated in a single sign.

The graphics for the Block out vinyl sheet should be plotted in accordance with specified artwork accurately on a computerized plotter cutter. The edges of the plotter cut vinyl sheet should be clean and smooth. Vinyl sheet should be plotted in a dust free environment.

The final applied graphics shall be free from any kinds of wrinkles, air bubbles and placement / orientation problems.

Contractors are expected to provide the standard warranty and the invoices from the vinyl manufacturers covering all the vinyl used.

f. Printing

The graphics and text of the signage system shall be printed with inkjet /Eco solvent printers Ink type: solvent ink, designed for 2 years' outdoor application Provide a hard lamination film to resist scuffing, scratching printing shall be done in cyan, magenta, yellow, black or spot color as specified.

Same colours of the signages shall be uniform as specified and shall not vary from sign to sign. Printer has to get approval on all printed colours in graphics matching to specified PANTONE colours and submit 3 copies of each swatch 100mm X 100mm

Facility of printing directly onto a variety of specially treated vinyl and other materials.

g. Aluminium Sections:

Aluminium plates and sections shall conform to Aluminium alloy of grade 63400 WP of IS-733.

For all illuminated signs - The sign framing section shall be approved basis a presented sample finished as sign prototype. Aluminum section has to be of minimum dimension not less than 50 mm in width and 8 mm of face holding. Section shall be strong enough to take load of the signage and shall not distort on application of dead or live load.

Section shall be easily openable for maintenance/cleaning/changing laminate.

All sections shall be perfectly straight free from surface damages, bends and twists. Bent profiles shall not be forcefully straightened. Straightness tolerance shall not exceed of 1.5mm per 1000 mm.

h. Stainless steel

Stainless steel types 304 shall be used for sheets for paneling and cladding while 304L shall be used in heavy gauge components for example pipe, plate and fixing to improve weld ability.

Performance Specifications

Tools to be used only for fabrication of stainless steel and components shall be stored separately to avoid accidental switching with tools previously used on carbon steel fabrication work. For stainless steel pipe, plasma cutting and grinding back to bright sound metal is required if the pipe ends cannot be machined. Flame cutting is not allowed. All weld end preparations and adjacent Single continuous straight lengths of pipe should be used instead of joints. Use of hot or cold hammering as a means for repair is prohibited.

Misalignment Tolerance -

All piping fit-ups shall be subjected to the following bore misalignment tolerance. Components with Equal and Unequal inside Dimensions

Nominal Pipe Size	Misalignment
DN 150 and smaller	1mm
DN 200-300	2mm
DN 350 and larger	2.5mm

NOTE: Misalignment should be minimized wherever possible by rotating the pipe/fitting for best fit and/or by grinding the bore as required
All fabrication/joint should be at true rite angle or mentioned otherwise.
Surfaces of piping components/fabricated units/signs shall be kept free of foreign materials such as grease, paint, oil and the like. Steel wire slings shall not be used for handling and transportation of stainless steel pipes. Canvas or nylon slings shall be used.

All parts assembled for bolting shall be in close contact over the whole surface and all bearing stiffeners shall bear tightly at top and bottom without being drawn or caulked. The component parts shall be so assembled that they are neither twisted nor otherwise damaged as specified cambers if any shall be provided. Drilling done during assembling shall not distort the metal or enlarge holes. The butting surfaces at all joints shall be so cut and milled so as to butt in close contact throughout the finished joints.

The edges and ends of all cut/sheared flange plates, web plates of plate girders, and all cover plates shall be planed/grind to make it free from any burr. Final finish has to be done in the workshop itself after fabrication is complete. Sign has to be bubble wrapped/packed safe to transport is to the site without any distortion/damage.

Standard Brush Finishing practices shall be used. Brush finishing shall have uniform application throughout the sign in linear direction. Patch finishing to be avoided.

i. CRCA M.S. Sheets

The CRCA mild M.S sheets to be used in the work shall conform to IS 513 - normal D-grade type mild steel.

j. Sheet Metal fabrication

The Metal handling and Fabrication work for CRCA Mild Steel sheets shall be got executed from a specialized agency.
CRCA mild Steel Sheets Fabrication shall be executed with CNC bending, CNC Laser and punching machines with precise work control and quality generation. Besides the specified machines, the Metal handling and Fabrication must have in-house CO2 welding and skilled CAD/CAM facilities, engineers and skilled and trained personnel and adequate storage facilities.
Sheet metal blanking shall be preferably done using laser cutting to save on material, reduce wastage, have less burr on cut blanks, speed of execution and achieve accuracy
All surfaces exposed to view shall be clean and free from dirt, stains, grease, scratches, distortion, waves, dents, buckles, tool marks, burrs and other defects which mark the appearance of finished work. Cutting edges shall be smooth and free from all defects.
All surfaces exposed to view shall be straight and true to lines or curves. Arises and angles shall be as sharp as practicable. Miter joints shall be formed in true alignment with profiles accurately intersecting and all joints carefully eased to a radius of approximately 1 mm unless otherwise shown. Metal corners shall be bent to the smallest radius possible without causing grain separation or otherwise impairing the work.
All exposed connections shall be formed with hairline joints flush and smooth. All face panels must be flat, true and free from weld stud witness or other surface imperfections/blemishes. Edges shall be machined and finished free from cutter marks (not guillotined). All fabrication should have dressed welds, bend radii, finish, permitted texture levels, squareness of construction, no twist or warp or sagging of shape.

The Tolerances in the fabrication work shall be as under :

Linear dimensions	:	+/- 0.5 mm
Hole and Slot Punches	:	0.3 mm
Finished edge radius	:	0.3 mm – 0.5 mm

Finish for sheet metal 0.062" (1.6 mm) CRCA

j. Structural Steel Fabrication

The Contractor shall supply to the Engineer copies of the manufacturer certificate that the steel brought to the site for incorporation in the works is of a quality fully complyin with the specification. If required by the Engineer, the Contractor shall arrange for testing of the steel samples.

j1. Workmanship and Fabrication for metal work:

For all the works, workmanship shall be of first class quality, throughout, and true to line, level and dimension as shown in the drawings or instructed by the Engineer.

All parts assembled for bolting shall be in close contact over the whole surface and all bearing stiffeners shall bear tightly at top and bottom without being drawn or caulked. The component parts shall be so assembled that they are neither twisted nor otherwise damaged as specified cambers if any shall be provided. Drilling done during assembling shall not distort the metal or enlarge holes. The butting surfaces at all joints shall be so cut and milled so as to butt in close contact throughout the finished joints. Hand flame cutting will not be permitted.

The edges and ends of all cut/sheared flange plates, web plates of plate girders, and all cover plates, and the ends of all angles, tees, channels and other sections forming the flanges of plate girders, shall be planed/ground.

Punching of holes will not be permitted. All drilling shall be free from burrs.

No holes shall be made by gas cutting process.

The Engineer in charge may at his discretion order periodic tests of the welder and/or of the welds produced by them. All such tests shall be carried out by the Contractor at his cost. All the welding shall be done as possible shops except some site work. The pieces shall be manipulated to ensure down hand welding for all shop joints as far as possible. All parts to be welded shall be arranged so as to fit properly on assembly. After assembly and before the general welding is to commence the parts are to be tack welded with small fillet or butt welds as the case may be. The welding procedure shall be so arranged that the distortion and shrinkage stresses are reduce to a minimum.

All joints required in structure to facilitate transport or erection shall be shown on the drawings or as specified by the Engineer. Should the Contractor need to provide joints in locations other than those specified by the Engineer he shall submit his proposals and obtain the prior sanction of the Engineer for such joints.

Each piece of steel work shall be marked distinctly before delivery, indicating the position and direction in which it is to be fixed. Three copies of a complete marking plan are to be supplied to the Engineer before erection commences.

In the case of welded fabrication any distortion remaining in the member after welding operations are completed shall be rectified by and/or at the expense of the Contractor to the approval of the Engineer.

Templates and jigs used throughout the work shall be all steel. In cases where actual materials have been used as templates for drilling similar pieces, the Engineer shall decide whether they are fit to be used as parts of the finished structure.

Apart from the requirements of welding specified under the above sub clauses, sections above, the Contractor shall ensure the following requirements in the welded joints.

- Strength-quality with parent metal.
- Absence of defects
- Corrosion resistance of the weld shall not be less than that of parent material in an aggressive environment.

No gasket or other flexible material shall be placed between the holes. The holes in parts to be joined shall be sufficiently well aligned to permit bolts to be freely placed in position. Driving of bolts is not permitted. The nuts shall be placed so that the identification marks are clearly visible after tightening. Nuts and bolts shall always be tightened in a staggered pattern and, where there are more than four bolts in any one joint, they shall be tightened from the center of the joint outwards.

j2. Protection of Steel Works:

Painting shall be applied under the temperature requirement specified by the manufacturer. The steel work, prior to delivery, shall be cleaned form scale, rust, dirt and grease etc., but means of chipping, scraping and wire brushing using skilled operators as described in the painting systems below. The cleaning shall proceed each day over the extent of surfaces which can be painted on that day. The paint shall be applied by brushing or spraying as per approval of the Engineer.

The spraying equipment shall be compatible with the paint material, fitted with necessary gauges and controls and approved by the Engineer.

Site weld locations shall be left free from paint within 50mm of the weld position, and contact surfaces in connection using High Strength Friction Grip Bolts shall not be painted.

Immediately after completion of erection all damaged paint shall be scraped off and made good to the approval of the Engineer.

The Steelwork specialist shall also clean down and apply one coat of primer to all site bolts, site bolted connections and site weld locations and the paint work generally shall be left in sound condition for any subsequent painting.

All paints and primers shall be of best quality and to be stored and applied strictly in accordance with the manufacturer's instructions.

In addition, the following specification shall apply to the shop painting of contact and inaccessible surfaces:

- Surfaces to be painted shall be thoroughly cleaned from scale, rust, dirt, grease etc. by means of sand/grit/shot blasting or other equivalent means.
- Surfaces which are to be brought permanently into close contact or made inaccessible

Performance Specifications

sible either in the shops or upon erection shall, after cleaning, be given two coats of Red Lead Priming Paint. The surfaces shall be brought into contact while the paint is still wet.

- All enclosed surfaces of box members shall be completely sealed by oiling or by coating with approved bitumen paint and all such members and tubes shall have their end-sclosed by suitable plates welded in position. Surfaces in contact during shop assembly shall not be painted. Surfaces which cannot be painted, but require protection, shall be given a rust inhibitive grease. The Contractor shall take all precautions to prevent dust and dirt coming in contact with freshly painted surfaces or with surface being painted. The second coat of paint shall only be applied when the first coat has dried.

Exposed machined surfaces shall be adequately protected.A uniform film thickness of paint is to be ensured throughout the work. Surfaces, which have not been shop coated, but require surface treatment shall be given necessary surface preparation and coats at site as specified in the painting system.

j3. Erection & Site Work:

The Contractor shall be responsible for checking the alignment and level of foundation and correctness of foundation bolt centers, well in advance of starting erection work, and shall be responsible for any consequences for non-compliance thereof. Discrepancies if any shall immediately be brought to the notice of the Engineer for his advice.

Following the completion of the straightening, the surface of the member shall carefully be inspected for damage and got approved by the Engineer before further use. All equipment used by the Contractor shall be sufficient for the purpose and for the erection of the steel work, in the time specified in the contract. Any lifting or erecting machinery shall be to the approval of the Engineer and shall be removed from the site if he considers such appliances dangerous or unsuitable for their functions. Adequate arrangement shall be made to resist wind loads and lateral forces arising at the time of erection.

The Contractor is entirely responsible for the stability of the structure during erection and shall arrange that sufficient tack bolts, braces or guy ropes are used to ensure that work will remain rigid until final bolting, riveting or welding is completed. The Contractor shall supply and fix, without extra charge, any temporary bracing which may be necessary. At stanchion splices and at other positions where concrete cover to the steel is liable to be restricted, bolts will be placed with their heads on the outside of the members.

All field assembly bolting and welding shall be executed in accordance with the requirements for shop fabrication excepting such as manifestly apply to shop conditions only. Where steel has been delivered painted the paint shall be removed before field welding for a distance of at least 50mm on either side of the joints. The number of washers on permanent bolts shall not be more than two for the nut and one for the bolt head.

k. Lamps and fixtures:

Power LEDs shall be used in all the illuminated signs. All lamps shall be supported using clips to ensure no damage and facility to easily replace them when required. Contractors are expected to provide the standard warranty and the invoices from the manufacturers covering all the lights used.

k.1 Recommended contrast between Light output and background.

Types of Areas	Range of Service Illuminance in Lux for signs in given area
Curbside area	700-900
Exterior Area	280-420
Parking Area	180-320
Emergency Sign (Exterior)	180-240
Ticket Counters, Checking Desks, and Information desks	700-1000
Departure Lounges, other waiting areas	350-450
Baggage Reclaim	350-450
Baggage Handling	100-200
Customs and Immigration Halls	700-1000

l. Wiring for Outdoor Signs:

Illuminated signs

The contractor shall also ensure that all the connections inside the sign are made through Bakelite connectors and thimbles & screws are used for end terminations of wires. Thimbles wherever installed shall be properly covered with insulated sleeves and no temporary taping is done at any point. All the connectors shall be ISI marked.

All connectors and joints shall be mounted or fixed to the internal structures of signs with

All wiring within the sign enclosure shall be covered with flexible conduit which shall be properly fixed with clamps, saddles etc. in such a way that no shadow is cast on the illuminated surfaces. In no case any loose wiring shall be left inside the sign enclosure.

Important: All Suitable protecting MCBs are to be provided at the tap off or incoming point of power supply at all signage boards.

All connectors & joints should be mounted or fixed to the internal structures of sign with insulating fixtures.

m. Powder Coating

m.1 Powder coating on Aluminium Plates/sections

The pure polyester powder coating shall be got executed from specialized agency.

The pure polyester powder shall have following properties: -

- Free Flow-ability : Satisfactory
- Particle size: < 50-70 microns suitable for electrostatic spray.
- Specific gravity : 1.1 to 1.5 depending on the colour.

- Self-life : 6 months.
- Stoving Schedule : 2000 C for 10 mins. (metal temp.)
- Test Certificates from approved laboratory for the representative samples shall be submitted by the Contractor. Testing will be done in presence of Employer's representatives at the cost of contractor.

The curing schedule shall be as specified by the manufacturer of pure polyester powder.

- Removal of all foreign matter.
- Chromatisation of aluminum surface as specified by the manufacturer of pure polyester powder by at least a five stage process consisting of alkali degrease, rinse and chromate conversion followed by two rinses.
- Proper curing at required temperature shall be done for specified time period so as to achieve the desired properties. The pure polyester coated surface shall be of uniform texture, colour and gloss and shall be free from cracks, warps and other imperfections.

m.2 Powder coating on Mild Steel

Wherever specified the Aluminium sections, plates M.S and CRCA mild Steel plates and sections shall be powder coated in approved colour and shade with pure polyester powder of Berger/Interpon/Asian Paints/Nero coat to a minimum thickness of 75 microns. The surface of steel shall be prepared and pretreated as follows before powder coating: -

- Removal of all foreign matter.
- Low weight Zinc Phosphate conversion treatment of M.S and CRCA mild Steel surface as specified by the manufacturer of pure polyester powder by at least a seven stage process consisting of oxide and scale removal, alkali degrease, rinse twice and Zinc Phosphate conversion treatment followed by two rinses. Last wash shall be from diluted acid and immediately after that powder coating process shall be started without wasting much time.
- Proper curing at required temperature shall be done for specified time period so as to achieve the desired properties.
- The pure polyester coated surface shall be of uniform texture, colour and gloss and shall be free from cracks, warps and other imperfections.

m.3 Polyurethane Painting

PU paints matched to shades as per colour specifications shall be having good recognize make to ensure the quality and life of the product. PU paint applications shall be done in following steps or as instructed by the each manufacturer.

Performance Specifications

- Surface cleaning: Remove grease, oil and other contaminants by using a degreasing solvent using mechanical tools. Ensure that all the dust particles are removed by suction or air blast and surface is fully dry and cleaned.
- Application of primer: Stir the components thoroughly and then mix base and catalyst in proportions by volume as instructed in the product specifications to uniform consistency. Avoid agitation of mixing. Add 10 % thinner immediately before application. However additional thinner may be added if required to achieve a good workability. For Airless spray use any standard equipment having pump ratio 45:1. This requires an over coating interval of minimum one overnight and a dust free environment.
- Application of the final finish: Stir the base thoroughly and then mix base and catalyst by volume as instructed in the product specifications to uniform consistency. Allow the mixture to mature for 30 minutes and stir again before use and application. Apply using a conventional spray. Add 10 % thinner depending on conditions. Use any standard equipment at an atomizing pressure of 3.5 – 4.9 kg/cmsq. Two coats could be applied for a good result.
- Contractors are expected to provide the standard warranty and the invoices from the manufacturers.

n. Photoluminiscent signs

All Photoluminiscent signs shall be procured from specialized agency providing signs with following specifications but not limited to:

- Water proof Non corrosive
- Withstand temperatures from 300 C up to 650 C.
- Non-reactive to Dilute Alkalis and Acids.
- Glow time in excess of 2 mcd/m2 after 60 minutes
- UV-stable and weather-resistant for outdoor applications.
- Ability to absorb energy from almost any light source (sunlight, fluorescent, incandescent) and then to emit light when ambient darkness occurs.
- The light produced is yellow-green in color and is highly visible, lasting up to 10 hours.

o. Retroreflective signs

High Intensity grade sheeting: A very-high-intensity retroreflective sheeting having highest retro reflectivity characteristics at short road distances should be used. It should be weather resistant and exhibit colourfastness. The sheeting should be of encapsulated lens type consisting of spherical glass lens, elements adhered to a synthetic resin and encapsulated by a flexible, transparent waterproof plastic has a smooth surface. Sheet of good quality manufacturers should be used.

o.1 Acceptable Minimum Co-Efficient of Retro-Reflection for High Intensity Grade Sheet-ing (Candelas per Lux per Square Meter)

Observation angle in degrees	Entrance angle in degrees	White	Yellow
0.2	-4	250	170
0.2	+30	150	100
0.5	-4	95	62
0.5	+30	65	45

When totally wet, the sheeting shall not show less than 90 percent of the value of retro-re-luctance indicated in the table above 16.1. At the end of 7 years, the sheeting shall remain at least 75 percent of its original retro-reflectance.

Adhesives: The sheeting should have two types of adhesives.

1. Pressure sensitive adhesive of the aggressive tack type requiring no heat, solvent or other preparation for adhesive to a smooth clean surface.
2. Tack free Adhesive activated by heat, applied in a heat-vacuum applicator as specified by the sheeting manufacturer.

The adhesive should form a durable bond to smooth, corrosion and weather resistant sur-face of the base plate.

Fabrication: The surface to be reflectorized shall be effectively prepared to receive the retro-reflective sheeting. The alluminium sheet shall be de-greased either by acid or hot al-kaline etching and all scale/dust removed to obtain a smooth plan surface. If surface is not smooth, approved surface primer may be used. Complete sheets of the material shall be used on the sign except where it is unavoidable. At splices, sheeting with pressure-sensitive adhesive shall be overlapped not less than 5mm and sheeting with heat-activated adhesive may be spliced with an overlap not less than 5mm or butted with a gap not exceeding 0.75mm. Where screen printing with transparent colour is proposed, only butt joining shall be used. The material should cover the sign sur-face evenly and shall be free from twists, cracks and folds.



Validate Print Help Item Rate BoQ							
Tender Inviting Authority: AGM (E-E)-I, AAI, Surat Airport, Surat							
Name of Work : "Provision of Shed over Footpath along Approach Roads at Surat Int Airport SH: Provision of Illuminated Outdoor Signage "							
Contract No: Tender ID 2026_AAI_282510_1							
Name of the Bidder/ Bidding Firm / Company :							
PRICE SCHEDULE (This BOQ template must not be modified/replaced by the bidder and the same should be uploaded after filling the relevant columns, else the bidder is liable to be rejected for this tender. Bidders are allowed to enter the Bidder Name and Values only)							
NUMBER #	TEXT #	TEXT #	NUMBER #	TEXT #	NUMBER #	NUMBER #	TEXT #
Sl. No.	Item Description	Item Code / Make	Quantity	Units	BASIC RATE including all taxes, duties, insurance etc. but excluding GST. In Figures To be entered by the Bidder Rs. P	TOTAL AMOUNT in Rs. (excluding GST) in Figures	TOTAL AMOUNT in Rs. (excluding GST) In Words
1	2	3	4	5	6	7	8
1	Design, Fabrication, Supply, Installation, Testing & Commissioning of the Terminal Building announcer sign "SURAT INTERNATIONAL AIRPORT" in trilingual format (Gujarati,Hindi,English) with the AAI logo on either side, complying the following particulars, including all T&P required for installation such as Hydra, crane, scaffolding, etc. of suitable height (approx. 20 m), as per the technical specifications and site requirements, complete in all respects as required and specified: 1. Letter Height - 900mm 2. AAI Logo Height - 1800mm 3.Letter face - White translucent 040 with 5mm thick acrylic face. 4. Back channel - 100mm deep with suitable size and thickness aluminium channel for housing the front acrylic, driver/controller and LEDs as applicable. 5. Mounting Spacer/ Support structure - Suitable mounting structure/spacers/supports shall be provided for mounting the entire text "SURAT INTERNATIONAL AIRPORT" in three languages, along with the AAI Logo on either side of the text, by utilizing the existing mounting structure. Suitable additional structure, wherever required, shall also be provided/installed after designing the same and complete as required. The trilingual signage structure shall be rigidly mounted perpendicular to the existing roof structure and shall be capable of withstanding all time prevailing wind conditions at Surat Airport. 6. Illumination : All internal illumination shall be carried out by Power LED Lights having sufficient number of LED module not less than 1.5W per module including suitable capacity electronic controller/ driver, evenly spreaded to achieve the uniform illumination without hot/dark spots. 7. Bird Spikes - UV Stabilized, extreme temperature proof transparent 75mm high polycarbonate bird spikes mounted above the entire trilingual signboards as required Note: Refer given drawings at page no.198-199 of the tender document	Item 1	1	Job		0.00	INR Zero Only
2	Dismantling and shifting of Existing Fascia signage "SURAT AIRPORT" provided in trilinguals along with Logo on the rooftop structure (approx height of 20m) of existing terminal building by using Hydra/crane/scaffolding of suitable size & capacity, safe for technician working at site etc as required including transporting to AAI store complete all as specified and as required. Note: Refer given drawings at page no.198-199 of the tender document	Item 2	1	Job		0.00	INR Zero Only
Total in Figures						0.00	INR Zero Only
Quoted Rate in Words			INR Zero Only				