

**AD 2. AERODROMES****VABB 2.1 AERODROME LOCATION INDICATOR AND NAME****VABB - MUMBAI / INTERNATIONAL****VABB AD 2.2 AERODROME GEOGRAPHICAL AND ADMINISTRATIVE DATA**

1.	ARP coordinates and site at AD	190529.54N 0725157.53E 326.5°/361M from intersection of RWYs.
2.	Direction and distance from (city)	021.5°, 14Km from Mumbai.
3.	Elevation/Reference temperature	11M (37FT)/33°C
4.	MAG VAR/Annual change	01.5°W(1985)/Nil
5.	AD Administration, AD Address, telephone, Telefax, telex, AFS	Mumbai International Airport Limited, Terminal – 1B Chhatrapati Shivaji Int'l Airport, Mumbai-400099.
		Telephone   022-26156789.
		Fax   022-26156202
		Telex   Nil
		AFS   VABBATYX (APD) VABBYUYU (RED)
6.	Types of traffic permitted (IFR/VFR)	IFR/VFR
7.	Remarks	Due to non-availability of power-in / power-out bays at international apron, non-sked flights operating to CSI airport should ensure availability of tow bar on board or with their ground handling agent.

**VABB AD 2.3 OPERATIONAL HOURS**

1.	AD Administration	MON-FRI: 0400-1200 (0930-1730IST) SAT, SUN+ HOL: NIL
2.	Custom and immigration	H24
3.	Health and sanitation	H24
4.	AIS Briefing office	H24
5.	ATS Reporting Office (ARO)	H24
6.	MET Briefing office	H24
7.	ATS	H24
8.	Fuelling	H24
9.	Handling	H24
10.	Security	H24
11.	De-icing	Nil
12.	Remarks	Btn 0230-0430 and btn 1200-1400UTC daily General Aviation and Military acft including helicopters are not permitted to operate. Only VIP & Sked flights are permitted.

**VABB AD 2.4 HANDLING SERVICES AND FACILITIES**

1.	Cargo-handling facilities	Up to 10 tones handling possible.		
2.	Fuel/oil types	ATF, JETA-1, K-50, AVGAS 100LL, 130, Oil all types normally available.		
3.	Fuelling facilities/capacity	Mode	Capacity (LL)	Discharge Rate (Liters/Second)
		Hydrant	1940,000	67

		Refuellers	45,000	33
			27,000	25
			16,000	17
			10,000	12
			6,000	10
4.	De-icing facilities	Nil		
5.	Hanger space for visiting aircraft	Nil		
6.	Repair facilities for visiting aircraft	Available for all types with Air India and Indian Airlines Ltd.		
7.	Remarks	Nil		

**VABB AD 2.5 PASSENGER FACILITIES**

1.	Hotels	Near the AD and in the city.
2.	Restaurants	At AD and in the city.
3.	Transportation	Buses, taxis and car hire.
4.	Medical Facilities	First aid at AD. Hospital in the city.
5.	Bank and post office	At AD H24
6.	Tourist office	At AD H24
7.	Remarks	Nil

**VABB AD 2.6 RESCUE AND FIRE FIGHTING SERVICES**

1.	AD category for fire fighting	CAT 9
2.	Rescue equipment	Available as per category.
3.	Capability for removal of disabled aircraft	Up to B747 with Air India Ltd.
4.	Remarks	Nil

**VABB AD 2.7 SEASONAL AVAILABILITY – CLEARING**

Nil

**VABB AD 2.8 APRONS, TAXIWAYS AND CHECK LOCATIONS DATA**

1.	Apron surface and strength	Surface	Refer Aerodrome chart.
		Strength	---
2.	Taxiway width, surface and strength	Width	Refer Parking-Docking chart.
		Surface	---
		Strength	---
3.	ACL and elevation	Location	---
		Elevation	---
4.	VOR/INS checkpoints	VOR	Holding point RWY 14 on TWY A2.
		INS	---
5.	Remarks	Nil	

**VABB AD 2.9 SURFACE MOVEMENT GUIDANCE AND CONTROL SYSTEM AND MARKINGS**

1.	Use of aircraft stand ID signs, TWY guidelines and visual docking / parking guidance system of aircraft stands	Provided on rotunda of aero link at in contact bays and on ground and remote bays. Mandatory information and Sign. Position Sign. Provided. VDGS provided on all nose-in bays with aerobridge facility.
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2.	RWY and TWY markings and LGT	RWY	Marked	Designation, THR, TDZ, Centerline, Fixed Distance, Side Strips, Aiming Point, Turn Pad.
			Lighted	THR, Centerline, Edge, End, TDZ, THR, Turn Pad, Stop way.
		TWY	Marked	Centerline, Holding Position, Edge Intermediate holding position.
			Lighted	Edge.
3.	Stop bars	Nil		
4.	Remarks	Nil		

**VABB AD 2.10 AERODROME OBSTACLES**

In approach /TKOF areas			In circling area and at AD		Remarks
1.			2.		
RWY/Area affected	Obstacle type Elevation Marking/LGT	Coordinates	Obstacle type Elevation Marking/LGT	Coordinates	
a	b	c	a	b	
1. APCH09 TKOF27	ELECT. POLE 13.3M/44FT	190525.7N 0725037.4E			
2.	ELECT. POLE 13.1M/43FT	190523.3N 0725036.7E			
3.	HOARDING 17.0M/56FT	190524.8N 0725034.7E			
4.	ELECT. POLE 12.3M/40FT	190520.9N 0725036.6E			
5.	ELECT. POLE 13.2M/43FT	190518.6N 0725037.1E			
6.	ELECT. POLE 13.1M/43FT	190516.3N 0725038.1E			
7.	ANTENNA 12.6M/41FT	190516.4N 0725041.8E			
8.	HOARDING 16.1M/53FT	190514.6N 0725037.8E			
9.	TREE 17.3M/57FT	190515.8N 0725037.6E			
10.	TREE 21.7M/71FT	190516.0N 0725036.3E			
11.	HOARD. ON BLDG. 22.0M/72FT	190517.3N 0725035.3E			
12.	HOARDING 20.9M/69FT	190518.3 N 0725033.5E			
13.	HOARDING 24.8M/81FT	190517.1 N 0725034.0E			
14.	MOBILE RAIL TFC 14.7M/48FT	190526.5 N 0725034.6E			
15.	HOARDING	190521.8N			

	18.3M/60FT	0725034.0E		
16.	GP OF TREES 21.3M/70FT	190523.6N 0725032.6E		
17.	BUILDING 17.2/56FT	190525.0N 0725027.6E		
18.	GP OF TREES 24.6M/81FT	190521.3N 0725032.2E		
19.	BUILDING 16.8M/55FT	190522.5N 0725031.6E		
20.	ANTENNA 17.9M.59FT	190521.1N 0725031.5E		
21.	BUILDING 16.8M/55FT	190520.5N 0725031.4E		
22.	BUILDING 17.5M/57FT	190519.6N 0725031.3E		
23.	BUILDING 16.6M/54FT	190520.7N 0725029.2E		
24.	BUILDING 16.6M/54FT	190519.5N 0725028.8E		
25.	BUILDING 17.2M/56FT	190519.1N 0725029.5E		
26.	BUILDING 17.0M/56FT	190517.8N 0725029.4E		
27.	BUILDING 18.4M/60FT	190518.8N 0725031.1E		
28.	GP OF TREES 19.3M/63FT	190522.0N 0725025.2E		
29.	BUILDING 23.4M/77FT	190525.0N 0725022.4E		
30.	ANTENNA 28.3M/93FT	190522.9N 0725019.8E		
31.	BUILDING 25.5M/84FT	190520.9N 0725015.5E		
32.	BUILDING 26.4M/87FT	190522.5N 0725016.6E		
33.	TREE 26.4M/87FT	190512.9N 0725017.7E		
34.	BUILDING 28.3M/93FT	190512.5N 0725020.1E		
35.	REGAL BLDG. 24.1M/79FT	190512.6N 0725016.4E		
36.	BUILDING 27.6M/91FT	190511.0N 0725016.0E		
37.	ELECT. POLE 16.8M/55FT	190524.5N 0725034.4E		
38.	HOARDING 19.7M/65FT	190519.2N 0725033.8E		

39.	ELECT. POLE 15.6M/51FT	190519.5N 0725033.4E	
40.APCH27 TKOF09	LLZ HUT 13.9M/46FT	190522.2N 0725253.0E	
41.	WALL FENCE 12.6M/41FT	190520.1N 0725253.0E	
42.	LLZ ANTENNA 14.8M/46FT	190520.1N 0725253.0E	
43.	MOB. RD. TFC. 15.6M/51FT	190520.1N 0725253.4E	
44.	HUT 14.5M/48FT	190521.7N 0725254.6E	
45.	TREE 18.8M/62FT	190520.9N 0725254.6E	
46.	HUT 13.0M/43FT	190518.9N 0725253.6E	
47.	GP OF TREES 18.7M/61FT	190517.7N 0725252.9E	
48.	SEC. HUT 13.4M/44FT	190517.2N 0725251.6E	
49.	SHED 21.1M/69FT	190515.4N 0725303.9E	
50.	GP OF TREES 20.6M/68FT	190517.6N 0725306.7E	
51.	TREE 25.3M/83FT	190520.1N 0725311.7E	
52.	FACTORY 22.3M/73FT	190519.8N 0725312.4E	
53.	BUILDING 23.6M/77FT	190513.9N 0725314.9E	
54.	BUILDING 23.7M/78FT	190515.7N 0725314.8E	
55.	TREE 29.9M/98FT	190516.1N 0725312.8E	
56.	ELECT. POLE 30.5M/100FT	190520.2N 0725318.2E	
57.	ELECT. POLE 27.5M/90FT	190521.2N 0725318.1E	
58.	TREE 37.9M/124FT	190523.3N 0725318.7E	
59.	BUILDING 27.8M/91FT	190520.7N 0725320.5E	
60.	BUILDING 31.2M/102FT	190520.3N 0725320.3E	
61.	TREE ON HILL 48.3M/158FT	190527.5N 0725318.6E	
62.	TREE ON HILL	190525.9N	

	42.3M/139FT	0725318.9E		
63.	HOUSE ON HILL 35.3M/116FT	190517.2N 0725320.8E		
64.	HOUSE ON HILL 36.2M/119FT	190514.8N 0725322.9E		
65.	TEMPLE 31.9M/105FT	190517.6N 0725321.0E		
66.	HUT 36.7M/120FT	190526.6N 0725326.8E		
67.	GP OF TREES 41.2M/135FT	190525.9N 0725326.6E		
68.	MOSQUE 38.5M/126FT	190521.6N 0725328.1E		
69.	GP OF TREES 41.6M/136FT	190522.4N 0725330.9E		
70.	BUILDING 36.0M/118FT	190519.0N 0725330.6E		
71.	ELECT. POLE 37.7M/124FT	190518.2N 0725330.5E		
72.	BUILDING 37.9M/124FT	190517.9N 0725330.0E		
73.	BUILDING 39.3M/129FT	190517.2N 0725330.9E		
74.	TREE 45.8M/150FT	190516.2N 0725331.2E		
75.	TREE ON HILL 48.9M/160FT	190514.8N 0725334.3E		
76.	BUILDING 37.9M/124FT	190519.8N 0725332.5E		
77.	BUILDING 43.6M/143FT	190517.4N 0725333.0E		
78.	TREE 45.6M/150FT	195320.1N 0725335.5E		
79.	VENT PIPE 39.0M/128FT	190520.7N 0725337.6E		
80.	VENT PIPE 39.0M/128FT	190523.5N 0725338.5E		
81.	HOUSE ON HILL 42.0M/138FT	190515.2N 0725334.2E		
82.	HUT 39.5M/130FT	190515.7N 0725336.0E		
83.	HUT ON HILL 41.0M/134FT	190530.3N 0725340.8E		
84.	TREE ON HILL 55.8M/183FT	190530.3N 0725341.9E		
85.	HOUSE ON HILL 52.3M/172FT	190530.7N 0725343.6E		
86.	TOILET BLDG. 66.8M/219FT	190532.9N 0725353.1E		

87.	OBST. LIGHT 69.4M/228FT	190532.4N 0725353.4E		
88.	TREE ON HILL 78.5M/258FT	190532.2N 0725420.2E		
89.	TREE ON HILL 74.5M/244FT	190532.7N 0725419.0E		
90.	HILL TOP 66.9M/219FT	190531.2N 0725418.5E		
91.	HILL TOP 60.0M/197FT	190532.3N 0725418.5E		
92.	TEMPLE 25.5M/84FT	190526.6N 0725311.8E		
93.	CHIMNEY 24.8M/81FT	190518.8N 0725314.2E		
94.	TEMPLE 25.1M/82FT	190519.2N 0725316.2E		
95.	CHIMNEY 38.8M/127FT	190512.7N 0725328.0E		
96.APCH14 TKOF32	ELECT. POLE 15.6M/51FT	190558.0N 0725118.0E		
97.	ELECT. POLE 16.2M/53FT	190600.6N 0725119.1E		
98.	TREE 20.3M/67FT	190600.5N 0725119.2E		
99.	ELECT. POLE 16.0M/52FT	190559.7N 0725118.7E		
100	TREE 20.7M/68FT	190600.0N 0725118.3E		
101.	MOB. RD. TFC. 16.3M/53FT	190601.3N 0725119.7E		
102.	ELECT. POLE 16.4M/54FT	190601.6N 0725119.6E		
103.	VENT PIPE 15.7M/52FT	190602.6N 0725119.8E		
104.	TREE 19.3M/63FT	190003.7N 0725120.5E		
105.	ELECT. POLE 16.4M/54FT	190604.3N 0725120.8E		
106.	TREE 27.8M/91FT	190602.5N 0725113.4E		
107.	BLDG/ ANTENNA 21.0M/69FT	190604.6N 0725115.3E		
108	ELECT. POLE 20.8M/68FT	190608.6N 0725116.2E		
109.	TREE 23.5M/77FT	190554.2N 0725121.2E		
110.	ELECT. POLE 20.8M/68FT	190610.5N 0725115.7E		
111.	GP OF TREES	190610.3N		

	25.8M/85FT	0725114.6E		
112.	COCONUT TREE 20.4M/67FT	190602.1N 0725117.7E		
113.	ONGC BLDG 20.2M/66FT	190603.2N 0725114.4E		
114.	BUILDING 19.8M/65FT	190605.7N 0725114.6E		
115.	TREE 24.9M/88FT	190607.3N 0725115.4E		
116.	BUILDING 23.4M/77FT	190612.9N 0725113.4E		
117.	BUILDING 23.0M/75FT	190612.3N 0725117.4E		
118.	BUILDING 25.6M/84FT	190613.7N 0725111.9E		
119.	BUILDING 25.3M/83FT	190614.5N 0725110.4E		
120.	BUILDING 26.9M/88FT	190615.1N 0725111.1E		
121.	BUILDING 23.3M/76FT	190604.4N 0725110.2E		
122.	CHIMNEY 26.6M/87FT	190613.2N 0725108.4E		
123.	BLDG/ ANTENNA 27.6M/91FT	190613.5N 0725103.7E		
124.	BUILDING 30.6M/100FT	190614.8N 0725106.5E		
125.	BUILDING 32.5M/107FT	190614.1N 0725059.0E		
126.	BUILDING 29.9M/98FT	190614.8N 0725101.3E		
127.	GP OF TREES 34.4M/113FT	190615.3N 0725101.5E		
128.	COCONUT TREE 27.9M/92FT	190618.8N 0725107.8E		
129.	BUILDING 32.9M/108FT	190622.4N 0725103.7E		
130.	BUILDING 34.1M/112FT	190619.0N 0725104.0E		
131.	GP OF TREES 37.6M/123FT	190624.2N 0725059.6E		
132.	BUILDING 35.0M/115FT	190626.6N 0725059.4E		
133.	BUILDING 36.1M/118FT	190623.4N 0725056.6E		
134.	BUILDING 35.0M/115FT	190620.6N 0725053.8E		
135.	BUILDING	190631.8N		

	41.5M/136FT	0725049.0E		
136.	TEMPLE 74.9M/246FT	190715.7N 0725023.2E		
137. APCH32 TKOF14	BUILDING 18.7M/61FT	190440.2N 0725247.8E		
138.	TREE 24.5M/80FT	190442.1N 0725249.1E		
139.	KALPANA TH. 21.1M/69FT	190438.9N 0725243.8E		
140.	KALPANA TH. 22.0M/72FT	190438.7N 0725244.3E		
141.	PYLON MAST 25.1M/83FT	190427.2N 0725252.9 E		
142.	CHIMNEY 26.0M/85FT	190429.2 N 0725254.6 E		
143.	PYLON MAST 23.5M/77FT	190427.6 N 0725254.5 E		
144.	PYLON MAST 25.8M/85FT	190426.8N 0725254.1E		
145.	PYLON MAST 25.1M/82FT	190428.8N 0725256.8E		
146.	PYLON MAST 25.2M/83FT	190431.4N 0725300.4E		
147.	PYLON MAST 63.8M/209FT	190342.3N 0725330.8E		
148.	PYLON MAST 63.5M/208FT	190348.4N 0725338.4E		
149.	PYLON MAST 68.8M/226FT	190355.1N 0725347.3E		
150.	PYLON MAST 63.9M/210FT	190355.2N 0725354.4E		
151.	WATER TANK 30.6M/100FT	190420.1N 0725301.9E		
152.	A P I INDUSTRIES 22.4M/73FT	190432.6N 0725255.4E		
153.	CHIMNEY 24.6M/80FT	190433.1N 0725258.2E		
154.	GP OF TREES 19.4M/63.6FT	190442.1N 0725247.4E		
155.	LIGHT POLE 12.8M/42FT	190439.6N 0725242.8E		
156.	COMM. MASTS 327.3M/1074FT	190149.5N 0725503.3E		
157.	COMM. MASTS	190146.0N		

	327.4M/1074FT	0725503.5E		
158.	LLZ ANTENNA 10.3M/34FT	190447.4N 0725239.3E		
159.	LLZ HUT 10.7M/35FT	190445.9N 0725237.9E		
160	SEC. HUT 10.9M/36FT	190445.8 N 0725238.1E		
161.	SEC HUT 10.7M/35FT	190448.2N 0725241.5E		
162.	LIGHT POLE 11.6M/38FT	190441.3N 0725240.9E		
163.	BUILDING 17.7M/58FT	190441.9N 0725247.8E		
164.	ANTENA/BLDG. 21.3M/70FT	190444.5N 0725251.5E		
165.	BUILDING 19.4M/64FT	190436.1N 0725246.0E		
166.	PYLON MAST 26.2M/86FT	190434.3N 0725306.1E		
167.	TREES 18.8M/62FT	190438.8N 0725241.8E		
168.	ANTENNA 21.5M/70.5FT	190447.6N 0725247.9E		
169.	P.R.MAST 311.6M/1022FT	190148.9N 0725459.9E		
170.	LIGHT POLE 12.7M/42FT	190443.0N 0725237.2E		
171.	LIGHT POLE 10.5M/34FT	190441.9N 0725239.5E		

**VABB AD 2.11 METEOROLOGICAL INFORMATION PROVIDED**

1.	Associated MET office	Mumbai
2.	Hours of service Met office outside hours	H24 ---
3.	Office responsible for TAF preparation Periods of validity	Mumbai 9,24 HR
4.	Types of landing forecast Interval of issuance	Trend 2HR
5.	Briefing / consultation provided	Provided
6.	Flight documentation Language(s) use	Chart form and tabular form English
7.	Charts and other information available For briefing or consultation	S, U85, U70, U50, U30, U25, U20, U15, U10, P <sub>30</sub> , P25, P20 SW (UPTO FL 460)
8.	Supplementary equipment available for Providing information	Telex, Telefax, Satellite Display Work Station.
9.	ATS units provided with information	Mumbai ATC AND ACS
10.	AD Additional information (limitation of service, etc.)	Laser Ceilometer Avbl. Rwy 09 Skopograph Avbl.

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**VABB AD 2.12 RUNWAY PHYSICAL CHARACTERISTICS**

Designations RWY NR	TRUE & MAG BRG	Dimensions of RWY (M)	Strength (PCN) and surface of RWY and SWY	THR coordinates	THR elevations and highest elevation of TDZ of precision APP RWY
1	2	3	4	5	6
09	089°GEO 091°0'MAG	3445X45	101/F/B/W/T Asphalt Concrete	190519.5N 0725056.9E	THR 4.5M/15FT
27	269°GEO 271°0'MAG	3445X45	101/F/B/W/T Asphalt Concrete	190519.9N 0725233.8E	THR 6.5M/22FT
14	134°GEO 136°0'MAG	2925X45	64/F/B/W/T Asphalt	190546.2N 0725136.1E	THR 11.5M/37FT
32	314°GEO 316°0'MAG	2925X45	64/R/B/W/T Rigid	190454.7N 0725231.3E	THR 8.0/26FT
Slope of RWY- SWY	SWY Dimensions (M)	CWY Dimensions (M)	Strip Dimensions (M)	OFZ	Remarks
7	8	9	10	11	12
---	Nil	Nil	3475X213 TO 305	Nil	Paved area south side 09/27 PCN 40/R/C/W/U Abandoned turning pad right side of Rwy 32
---	Nil	Nil	3475X213 TO 305	Nil	
---	----	Nil	3045X152	Nil	
---	Nil	Nil	3045X152	Nil	

**VABB AD 2.13 DECLARED DISTANCES**

RWY Designation	TORA (M)	TODA (M)	ASDA (M)	LDA (M)	Remarks
1	2	3	4	5	6
09	3445	3445	3445	3303	Nil
27	3445	3445	3445	2963	RESA 240X90
14	2925	2925	2925	2517	Nil
32	2925	2925	2925	2665	RESA 90X90

**VABB AD 2.14 APPROACH AND RUNWAY LIGHTING**

RWY Desi	APCH LGT Type	THR LGT Colour	VASIS (MEHT) PAPI	TDZ, LGT LEN	RWY Centre Line LGT	RWY Edge LGT LEN,	RWY End	SWY LGT	Remarks

g-nator	LEN INTST	WBAR			Length, spacing Color, INTST	spacing Color INTST	LGT Color WBAR	LEN (M) Color	
1	2	3	4	5	6	7	8	9	10
09	CAT-I 510M	Green	PAPI LEFT/3° 22M	Nil	3445M, 30M White	3445M, 60M White, LIH	Red	N/A	Nil
27	CAT-II 750M	Green	PAPI LEFT/3.3° 20M	1000M	3445M, 30M White	3445M, 60M White, LIH	Red	N/A	Nil
14	CAT-I 630M	Green	PAPI LEFT/3	Nil	Nil	2925M, 60M	Red	N/A	Nil
32	SALS 360M	Green	PAPI LEFT/3°	Nil	Nil	2925M, 60M	Red	60M Red	Nil

**VABB AD 2.15 OTHER LIGHTING, SECONDARY POWER SUPPLY**

1.	ABN/IBN location, characteristics and Hours of operation	ABN	At Old Atc Tower , Flg W&G Ev 2sec H24
		IBN	Nil
2.	LDI location and LGT Anemometer location and LGT	LDI	Not available.
		Anemometer	South Of Rwy 09.
3.	TWY edge and centre line lighting	Edge	All TWY
		Centre line	---
4.	Secondary power supply/switch-over Time	Secondary Power supply to all lighting at AD. Switch-over time: 15 SEC.	
5.	Remarks	Nil	

**VABB AD 2.16 HELICOPTER LANDING AREA**

Not Established

**VABB AD 2.17 ATS AIRSPACE**

1.	Designation and lateral limits	MUMBAI CTR A Circle, radius 74KM (40NM) centered at 190507.4N 0725231.3E (VOR) "BBB"
2.	Vertical limits	SFC TO FL70
3.	Airspace classification	D
4.	ATS unit call sign Language(s)	Mumbai Approach English
5.	Transition altitude	Nil
6.	Remarks	(i) New ATC Tower coordinates 190542.8N 0725149.3E top elevation 71.9M AMSL located 583M/329° Mag from ARP penetrates Obstacle Limitation Surfaces. (ii) ACC Sector North bounded by 'BBB' VOR R275 to R100 clockwise. ACC Sector South bounded by 'BBB' VOR R100 to R275 clockwise.

**VABB AD 2.18 ATS COMMUNICATION FACILITIES**

Service Designator	Call Sign	Frequency	Hours of operation	Remarks
1	2	3	4	5

ACC (N)	Mumbai Control	132.7MHz	H24	120.5MHz SDBY
ACC (S)	Mumbai Control	125.35MHz	H24	120.5MHz SDBY
APP	Mumbai Approach	127.9MHz 119.3MHz	H24	---- SDBY frequency
TWR	Mumbai Tower	118.1MHz	H24	----
SMC	Mumbai Ground	121.9MHz 121.85/121.75 MHz	H24	----
TAR/MSSR	Mumbai Radar	127.9MHz 119.3MHz	H24 H24	---- SDBY frequency
RSR (N)	Mumbai Radar	132.7 MHz 120.5MHz	H24 H24	---- SDBY frequency
RSR (S)	Mumbai Radar	125.35 MHz 120.5MHz	H24 H24	---- SDBY frequency
ATIS	Mumbai information	126.4MHz	H24	----
RCAG ON ACC (N) AND ACC (S)			---	----
EMERGENCY FREQUENCY		121.5MHz	---	----
CLEARANCE DELIVERY FREQ. 121.85 MHz on H24 basis				

**VABB AD 2.19 RADIO NAVIGATION AND LANDING AIDS**

Type of aid CAT of ILS/MLS (for VOR/ILS/ML S, give VAR)	ID	Frequency	Hours of opera tion	Site of transmitting antenna coordinates	Elevati on of DME transmi tting antenna	Remarks
1	2	3	4	5	6	7
DVOR (0.15°/1985)	BBB	116.6MHz	H-24	190507.4N 0725231.3E	---	Nil
DME	BBB	1200/1137MHz	H-24	---	44FT	Collocated with DVOR BBB
LLZ27 ILS CAT-I	ISCZ	110.3MHz	H-24	190520.2N 0725252.8E	---	NIL
GP27	---	335.0MHz	H-24	190516.2N 0725224.8E	---	3.3°, RDH 50FT
DME (ILS) 27	ISCZ	1001/1064MHz	H-24	190516.2N 0725224.8E	63FT	Collocated with GP27
LM	CZ	201KHz		190521.2N 0725341.8E	---	
MM		75MHz	H-24	190521.2N 0725341.8	---	Collocated with LM27
LO 27	SC	345KHz	H-24	190524.4N 0730103.4E	---	
OM	---	75MHz	H-24	190524.4N 0730103.4E	---	Collocated with LO 27
LLZ14 ILS CAT-I	IBBY	110.1MHz	H-24	190519.2N 0725041.8E	---	Nil
GP14	---	330.3MHz	H-24	190541.6N 0725146.5E	---	3°, RDH 50FT
DME (ILS) 14	BBY	1062/999MHz	H-24	190541.6N 0725146.5E	85FT	Collocated with GP14
LLZ09	IBOM	109.5MHz	H-24	190447.2N 0725239.6E	---	Nil
GP09		332.6MHz	H-24	190516.9N 072 5107.2E	19FT	Nil
DME (ILS) 09	IBOM	1001/1064MHz	H-24	190516.9N 0725107.2E	---	Colocated with LLZ09

NDB	BMB	396KHz	---	190518N 0724945E	---	---
ASDE	---	9375MHz	---	190546N 0725147.5E	---	---

**VABB AD 2.20 LOCAL TRAFFIC REGULATIONS**

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**VABB AD 2.21 NOISE ABATEMENT PROCEDURES**

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**VABB AD 2.22 FLIGHT PROCEDURES**

**I. DEPARTURE PROCEDURE**

- 1.1 All departures should request for start up within five minutes of the field EOBT.  
The aircraft, which failed to request, start up within five minutes of the field EOBT will lose its priority and be considered for start up depending upon the traffic situation and subject to delay.
- 1.2 The aircraft should be in a position to commence its taxi not more than five minutes after the issue of start up clearance failing which the start up clearance will be cancelled and the aircraft will lose its priority and be considered for start up depending upon the traffic situation and subject to delay.
- 1.3 Taxiing aircraft should maintain a minimum taxiing speed of not less than 15 Knots on the straight portion of taxiways and between 8-12Kts during turning Maneuvers.
- 1.4 Any aircraft if observed, by the Controller, to be too slow in taxiing and thereby adversely affecting the efficient aircraft movement shall be taken out of the sequence and will be considered for departure as a last priority depending upon the traffic situation subject to delay.
- 1.5 Based on the aircraft type and its performance characteristics, ATC will issue Taxiing instructions so as to depart from the nearest runway intersection from where adequate take off run is available for departure.  
Pilots unable to accept departure from intersection may request ATC for Alternate take off position or from the beginning of runway at the time of Push back/Startup. However, such request will be considered by ATC subject to Delay.
- 1.6 Procedures for departure from intersections specific to Mumbai are given in para 1.12.
- 1.7 Pilot shall complete all mandatory pre-departure checks before entering the active runway for departure so that the aircraft is in a position to take off immediately upon receipt of take-off clearance.
- 1.8 When the aircraft is issued with a line-up and take-off clearance at the taxi holding position it shall be in a position to line up and effect an immediate take off in one continuous movement.
- 1.9 When the aircraft is issued with a take off clearance after lining up on the runway it shall commence take off roll immediately upon receipt of take off clearance.
- 1.10 If the Controller observes a delay in respect of the departing aircraft in commencing its take off run after issuance of take off clearance, the take off clearance will be cancelled and the aircraft be advised to vacate the runways immediately at the nearest taxiway to make way for the subsequent arrival or departure. Necessary entries in this regard shall be recorded in the Log Book.
- 1.11 No ATC speed restriction will be applicable for departing aircraft except when specifically required by ATC.

**1.12 INTERSECTION DEPARTUES SPECIFIC TO MUMBAI**

Airport (i)	Runway (ii)	Taxiway (iii)	TORA from Taxiway given in column (iii) Metres (iv)	Cat of Acft (v)
MUMBAI	27	H	3175	D
		G	2801	C
		Q	1878	B
	09	D	3260	D
		Q	1567	B
	14	A1	2453	C
A2		2355	C	

NOTE: With the objective of expediting the flow of traffic, ATC may authorize Departure from other intersections also.

**II. SPEED CONTROL PROCEDURES IN THE PROVISION OF RADAR CONTROL SERVICE VOR ARRIVALS**

- 2.1 All arriving aircraft operating below 10000 ft shall maintain IAS not greater than 250 kt.
- 2.2 Arriving acft below 10,000 ft and between 30NM and 15NM from VOR/NDB shall maintain IAS 220 Kt or less.
- 2.3 Arriving aircraft within 15NM of VOR serving the airport or below FL65 shall maintain IAS as per acft category specified below:

Aircraft Cat.	A	B	C	D/E
Within 15NM excluding final App. Track	110Kt	140Kt	170Kt	185Kt
10NM to 4NM on final app. track	90Kt	120Kt	150Kt	160Kt

NOTE1: If required, Radar Controller may suggest a different speed (but not less than the speed specified above) to be maintained for a particular period of time/segment of flight or issue specific instructions as per traffic situation.

NOTE 2: Acft unable to maintain the speed specified above shall advise ATC and request for alternate instructions. Such request will be considered by ATC but may result in re-sequencing and delay.

- 2.4 When traffic condition permit, ATC may suspend speed control by Using the phrase “No ATC Speed Restrictions”.
- 2.5 Non-compliance of above provisions will be treated as violation of ATC instructions and the aircraft will be taken out of sequence for Repositioning.
- 2.6 ATC may advise/suggest the arriving acft, while on final approach, the Requirement to vacate the runway on landing via specific exit taxiway. Acft unable to comply with this requirement shall immediately inform ATC

**III. Radar vectoring areas**

The following Radar vectoring areas along with minimum vectoring altitudes are established within 25NM of Mumbai ASR/MSSR (N190525.2 E0725150.8).

- 1. Area bounded by N193030 E0724954 then clockwise along the shorter arc of the circle of radius 25NM centered on ASR/MSSR (N190525.2 E0725150.8) to N184530

E07308002 N184 840 E0730420 to N185450 E0730900 to N190525 E0730510 to N191450 E0730510 to N191830 E0725400 to N192500 E0724954 to N193030 E0721954. Minimum vectoring altitude 3700ft.

2. Area bounded by N193030 E0724954 then anticlockwise along the larger arc of the circle of radius 25NM centered on ASR/MSSR (N190525.2 E0725150.8) to N184530 E0730800 to N184840 E0730420 to N185450 E0730900 to N190525 E0730510 to N191450 E0730510 to N191830 E0725400 to N192500 E0724954 to N193030 E0724954. Minimum vectoring altitude 2600ft.
3. Radio communication Failure Procedure:  
When radar vectoring is provided for pilot interpreted final approach aids the following radar communication shall applicable
  - (i) If the Radio Communication Failure takes place prior to interception of final approach track acft should maintain the last assigned altitude or 3700ft whichever is higher and proceed to VOR (116.6 BBB) via shortest route to join the holding procedure.
  - (ii) In case radio communication failure takes place after interception of final approach track acft. should continue the approach and land if visual or carry out the missed approach and join the VOR (116.6 BBB) holding at 3700ft.
4. Aircraft experiencing RCF immediately after departure from Rwy 14 shall comply with the following RCF procedures
  - (i) operate the transponder on mode A code 7600 if equipped with transponder
  - (ii) Maintain FL070 or last assigned level whichever is higher and heading , if assigned , until 20NM. Thereafter follow 25DME BBB arc to join flight plan ATS routes and climb to FPL level, when established on the route

After joining the holding procedure acft. shall carry out the instrument approach procedure for which radar vectoring was provided.

#### **IV. MUMBAI AIRPORT - STANDARD INSTRUMENT DEPARTURE PROCEDURES**

1. Factors common to all SIDs are as under :-
  - (i) All radials are those of Mumbai VOR "BBB" unless specified otherwise.
  - (ii) All aircraft will maintain FL070 or below till 15NM, unless specified otherwise in ATC clearance.
  - (iii) ATC at its discretion will specify alternate routings, if necessitated due to traffic.
  - (iv) The departure instructions will specify SIDs but may require an aircraft to climb to a specified altitude on a specified heading and climb when instructed by Radar and follow instructions. If no communication is established with Radar then the aircraft will follow SID specified in the departure instructions.
  - (v) As a measure of noise abatement departure from RWY 09 will climb straight ahead to 1000FT and will commence turn before reaching outer locator and departure from RWY 27 will climb straight ahead to 1700FT and will commence turn after crossing coast (3NM).

- (vi) Departure from RWY 32 will climb straight ahead to 1700FT and will commence turn after crossing "BB" NDB.
- (vii) Aircraft will establish appropriate radial within 10NM of Mumbai VOR "BBB".
- (viii) Take off from RWY 32 at Mumbai shall not be conducted in weather conditions at or below 500FT ceiling.
- (ix) Maintain FL070 or last assigned level, whichever is higher and heading, if given until, 20NM. Thereafter follow 25DME 'BBB' arc to join ATS route and climb to flight plan level when established on route.

**Mumbai Airport****SID's FOR RWY 09**

ROUTE DESIGNATOR	SID DESIGNATOR	ROUTING AFTER TAKE-OFF	REMARKS
W16(NORTH)	APANO 2A	Turn left at 1000ft & intercept BBB VOR R-003 to APANO then to BVR VOR	
A347	APANO 2B	Turn left at 1000ft & intercept BBB VOR R-003 to APANO then to BODAR	
G208	APANO 2C	Turn left at 1000ft & intercept BBB VOR R-003 to APANO then to SASRO	
W13 (NORTH)	APANO 2D	Turn left at 1000ft & intercept BBB VOR R-003 to APANO then to AAE VOR	
W12 (NORTH)	APANO 2E	Turn left at 1000ft & intercept BBB VOR R-003 to APANO then to QQZ VOR	
B211	EPKOS 2A	Turn right at 1000ft & intercept BBB VOR R-152 to EPKOS then to BBI VOR	
W56 (SOUTH)/ R458/ W17 (SOUTH) / P574	EPKOS 2B	Turn right at 1000ft & intercept BBB VOR R-152 to EPKOS then to BBM VOR	
A474	ERVIS 2	Turn right at 1000ft & intercept BBB VOR R-203 to ERVIS then to ENKAR	Avoid prohibited area VAP2".
G450	DARMI 2	Turn right at 1000ft & intercept BBB VOR R-241 to DARMI then to DOMON	---DO---
A451	BISET 2	Turn right at 1000ft & intercept BBB VOR R-260 to BISET then to ALBIS	---DO---
G450	OPAKA 2A	Turn left at 1000ft & intercept BBB VOR R-073 to OPAKA then to AAU VOR	
L301	OPAKA 2B	Turn left at 1000ft and intercept BBB VOR R-073 to OPAKA N193621	

W18	OPAKA 2C	E0743258 (R-073/100D BBB VOR) then MELAX – <b>IBELA</b> and join L301.	
W15(SOUTH)	KABSO 2	Turn left at 1000ft & intercept BBB VOR R-073 to OPAKA then to MELAX – APUSU.	
L505	BIMOT 2A	Turn let at 1000 ft and intercept BBB VOR R-290 to BIMOT N195147.9 E0702113.1 (R-290/ 150D BBB VOR) R-319 <sup>0</sup> /72NM BIDIX N204502.6 E0692959.4 and join L505.	
N571	BIMOT 2B	Turn let at 1000 ft and intercept BBB VOR R-290 to BIMOT N195147.9 E0702113.1 (R-290/ 150D BBB VOR) R-253 <sup>0</sup> /60NM SUGID N193303 E0692054.4 and join N571.	
N571	BIXOR 2	Turn right at 1000 ft and intercept BBB VOR R-152 to BIXOR N172403.7 E0734857.4 (R-152/ 115D BBB VOR) R-118 <sup>0</sup> /106NM AGELA N163624 E0752757 and join N571.	

**Mumbai Airport**

**SID's FOR RWY 27**

ROUTE DESIGNATOR	SID DESIGNATOR	ROUTING AFTER TAKE-OFF	REMARKS
W16(NORTH)	APANO 1A	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to BVR VOR	
A347	APANO 1B	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to BODAR	
G208	APANO 1C	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to SASRO	
W13(NORTH)	APANO 1D	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to AAE VOR	
W12(NORTH)	APANO 1E	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to QQZ VOR	
B211	EPKOS 1A	Turn left at 1700ft & intercept BBB VOR R-152 to EPKOS then to BBI VOR	Avoid "VAP2".
W56 (SOUTH)/ W17 (SOUTH)/ R458/P575	EPKOS 1B	Turn left at 1700ft & intercept BBB VOR R-152 to EPKOS then to BBM VOR	---DO---

A474	ERVIS 1	Turn left at 1700ft & intercept BBB VOR R-203 to ERVIS then to ENKAR	---DO---
G450	DARMI 1	Turn left at 1700ft & intercept BBB VOR R-241 to DARMI then to DOMON	
A451	BISET 1	Turn left at 1700ft & intercept BBB VOR R-260 to BISET then to ALBIS	
G450	OPAKA 1A	Turn right at 1700ft & intercept BBB VOR R-073 to OPAKA then to AAU VOR	
L301	OPAKA 1B	Turn right at 1700ft and intercept BBB VOR R-073 to OPAKA N193621 E0743258 (R-073/100D BBB VOR) then MELAX – IBELA and join L301.	
W18	OPAKA 1C	Turn right at 1700ft & intercept BBB VOR R-073 to OPAKA then to MELAX – APUSU.	
W15(SOUTH)	KABSO 1	Turn left at 1700ft & intercept BBB VOR R-183 to KABSO then to GGO VOR	Avoid "VAP2".
L505	BIMOT 1A	Turn let at 1700 ft and intercept BBB VOR R-290 to BIMOT N195147.9 E0702113.1 (R-290/ 150D BBB VOR) R-319 <sup>0</sup> /72NM BIDIX N204502.6 E0692959.4 and join L505.	
N571	BIMOT 1B	Turn let at 1700 ft and intercept BBB VOR R-290 to BIMOT N195147.9 E0702113.1 (R-290/ 150D BBB VOR), R-253 <sup>0</sup> /60NM SUGID N193303 E0692054.4 and join N571.	
N571	BIXOR 1	Turn right at 1700 ft and intercept BBB VOR R-152 to BIXOR N172403.7 E0734857.4 (R-152/ 115D BBB VOR) R-118 <sup>0</sup> /106NM AGELA N163624 E0752757 and join N571.	

**Mumbai Airport**  
**SID's FOR RWY 32**

ROUTE DESIGNATOR	SID DESIGNATOR	ROUTING AFTER TAKE-OFF	REMARKS
W16(NORTH)	APANO 3A	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to BVR VOR	
A347	APANO 3B	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to BODAR	
G208	APANO 3C	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to SASRO	
W13(NORTH)	APANO 3D	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to AAE VOR	

W12(NORTH)	APANO 3E	Turn right at 1700ft & intercept BBB VOR R-003 to APANO then to QQZ VOR	
B211	EPKOS 3A	Turn left at 1700ft & intercept BBB VOR R-152 to EPKOS then to BBI VOR	Avoid "VAP2".
W56 (SOUTH)/ W17 (SOUTH)/ R458 /P574	EPKOS 3B	Turn left at 1700ft & intercept BBB VOR R-152 to EPKOS then to BBM VOR	Avoid "VAP2".
A474	ERVIS 3	Turn left at 1700ft & intercept BBB VOR R-203 to ERVIS then to ENKAR	---DO---
G450	DARMI 3	Turn left at 1700ft & intercept BBB VOR R-241 to DARMI then to DOMON	
A451	BISET 3	Turn left at 1700ft & intercept BBB VOR R-260 to BISET then to ALBIS	
G450	OPAKA 3A	Turn right at 1700ft & intercept BBB VOR R-073 to OPAKA then to AAU VOR	
L301	OPAKA 3B	Turn right at 1700ft and intercept BBB VOR R-073 to OPAKA N193621 E0743258 (R-073/100D BBB VOR ) then MELAX – IBELA and join L301.	
W18	OPAKA 3C	Turn right at 1700ft & intercept BBB VOR R-073 to OPAKA then to MELAX – APUSU.	
W15(SOUTH)	KABSO 3	Turn left at 1700ft & intercept BBB VOR R-183 to KABSO then to GGO VOR	Avoid "VAP2".
L505	BIMOT 3A	Turn let at 1700 ft and intercept BBB VOR R-290 to BIMOT N195147.9 E0702113.1 (R-290/ 150D BBB VOR) R-319 <sup>0</sup> /72NM BIDIX N204502.6 E0692959.4 and join L505.	
N571	BIMOT 3B	Turn let at 1700 ft and intercept BBB VOR R-290 to BIMOT N195147.9 E0702113.1 (R-290/ 150D BBB VOR) R-253 <sup>0</sup> /60NM SUGID N193303 E0692054.4 and join N571.	
N571	BIXOR 3	Turn right at 1700 ft and intercept BBB VOR R-152 to BIXOR N172403.7 E0734857.4 (R-152/ 115D BBB VOR) R-118 <sup>0</sup> /106NM AGELA N163624 E0752757 and join N571.	

Additional SIDs for Mumbai Airport for RWY 09/27

- FOR EASTBOUND DEPARTURES FROM MUMBAI VIA ATS ROUTES W18/G450. ADDITIONAL STANDARD INSTRUMENT DEPARTURE PROCEDURS ARE ESTABLISHED AS AURANGABAD 1 AND AURANGABAD 2. AURANGABAD 1

AND AURANGABAD 2 SHALL ALSO BE APPLICABLE FOR DEPARTURES JOINING ATS ROUTES L301.

2. FOR EASTBOUND DEPARTURES JOINING ATS ROUTE W75 STANDARD INSTRUMENT DEPARTURE PROCEDURES ARE ESTABLISHED AS POSIN 1 AND POSIN 2.
3. FOR EASTBOUND DEPARTURES VIA ATS ROUTE W28 STANDARD INSTRUMENT DEPARTURE PROCEDURE IS ESTABLISHED AS DOGAP 1 AND DOGAP 2.
4. THE FOLLOWING WAY POINTS (FLY BY) ARE DESIGNATED FOR THE DESCRIPTION OF SIDs.
5. THE SIDs SHALL BE APPLICABLE UNDER RADAR ENVIRONMENT ONLY UNLESS NON-RADAR SEPARATION IS APPLIED W.R.T. TRAFFIC ON G-450
6. THE SIDs TERMINATE AT THE POINT WHERE THE SID DESIGNATOR JOINS THE FIELD FLIGHT PLAN ATS ROUTE. ALL AIRCRAFT ON COMPLETION OF SIDs SHALL JOIN THE FLIGHT PLAN ROUTE.
7. AIRCRAFTS SHALL NOT CLIMB ABOVE FL70 UNLESS CLEARED BY ATC.
8. THE DESCRIPTION OF SIDs IS AS FOLLOWS:-

ATS ROUTES	SID DESIGNATOR	RWY	SID DESCRIPTION	REMARKS
G450/ W18/ L301	AURANGABAD 1	27	CLIMB STRAIGHT AHEAD, AT 1700 FEET TURN RIGHT ON TRACK 061 DEG M TO KAMOL 193803.0N 0733957.4E THEN ON TRACK ON 76 DEG M TO MIMAN 195433.81N 0744429.10E (R-275DEG 037NM AAU). THEN ON TRACK 095 DEG M TO AURANGABAD VOR DME TO JOIN G450/W18 /L301 OUTBOUND.	
W75	POSIN 1	27	CLIMB STRAIGHT AHEAD, AT 1700 FEET TURN RIGHT ON TRACK 061 DEG M TO KAMOL 193803.0N 0733957.4E THEN ON TRACK ON 076 DEG M TO MIMAN 195433.81N 0744429.10E (R-275DEG 037NM AAU). THEN ON TRACK 062 DEG M TO POSIN TO JOIN W75 OUTBOUND.	
W28	DOGAP 1	27	CLIMB STRAIGHT AHEAD, AT 1700 FEET TURN LEFT ON TRACK 100 DEG M TO DOGAP 184832.52N 0732500.0E (R-119 DEG 035NM BBB) TO JOIN W28 OUTBOUND.	
G450/ W18/	AURANGABAD 2	09	CLIMB STRAIGHT AHEAD, AT 1000 FEET TURN LEFT ON	

L301			TRACK 051 DEG M TO KAMOL 193803.0N 0733957.4E THEN ON TRACK ON 076 DEG M TO MIMAN 195433.81N 0744429.10E (R-275DEG 037NM). THEN ON TRACK 095 DEG M TO AURANGABAD VOR DME TO JOIN G450/W18 /L301 OUTBOUND.
W75	POSIN 2	09	CLIMB STRAIGHT AHEAD, AT 1000 FEET TURN LEFT ON TRACK 051 DEG M TO KAMOL 193803.0N 0733957.4E THEN ON TRACK ON 076 DEG M TO MIMAN 195433.81N 0744429.10E (R-275DEG 037NM AAU). THEN ON TRACK 062 DEG M TO POSIN 201642.99N 0752727.54E (R-119DEG 35NM BBB) TO JOIN W75 OUTBOUND.
W28	DOGAP 2	09	CLIMB STRAIGHT AHEAD, AT 1000 FEET TURN RIGHT ON TRACK 124 DEG M TO DOGAP 184832.52N 0732500.0E (R-119 DEG 035NM BBB) TO JOIN W28 OUTBOUND.

Mumbai TMA Routing

Route Designator	Mumbai TMA routing	Remarks
L 301 (From West)	NOBAT (N210902.5E0680000) - EXOLU (N201249.8 E013410.4) - 134°(R-314)/100NM - MUMBAI BBB VOR (N190511.2E0725226.8)	
L 301 (From East)	BUSBO (N191458.2E0780730.3) - OPAKA (N193621E0743258) - 253°(R-073)/100NM MUMBAI BBB VOR (N190511.2E0725226.8)	
N 571 (From West)	SUGID (N193303E0692059.4) - AROTA (N190803E0701259) - 092°(R-272) /151NM MUMBAI BBB VOR (N190511.2E0725226.8).	
N 571 (From East)	AGELA (N163624E0752757)-317°(R137)/210NM - MUMBAI BBB VOR (N190511.2E0725226.8).	
P 574	BBM VOR (N155122.2E0743701) - 319°/106NM MABTA (N170828.8E0732145.6) - 347°(R-167) /120NM MUMBAI BBB VOR (N190511.2 E0725226.8).	

SURVEILLANCE RADAR APPROACH PROCEDURES  
CSI AIRPORT, MUMBAI

(1)

RWY	THR ELEV	Inbound Track	If (Dist. From touch down)	Altitude over IF	FAF (Dis. From touch down)	Altitude over FAF	MAPT (Dist. From touch down)	OCA (Straight- in)
	Ft	Deg	NM	Ft	NM	Ft	NM	Ft
27	22	271	12	2600	7	2500	2	980
09	15	091	11	2600	5.6	1800	2	660
14	37	136	11	2600	5.5	1800	2	680

SRA Rwy 14 not available when ceiling is 500 ft or less.

(2) Missed Approach procedure

Rwy 27: - Climb straight ahead to 2600 ft., then Climbing turn right to join VOR (116.6 BBB) holding at 3700 ft., or as instructed by ATC.

Rwy 09: - Climb straight ahead to 2600ft, then climbing turn left to join VOR (116.6 BBB) holding at 3700ft., or as instructed by ATC.

Rwy 14: - Climb straight ahead to 2600ft, then climbing turn right to join VOR (116.6 BBB) holding at 3700ft., or as instructed by ATC.

(3) Distance from touch down/altitude information

RWY	Distance/Altitude Information							Descent Gradient
	Dist. (NM)	7	6	5	4	3	2.7	
27	Altitude (Ft)	2500	2140	1790	1430	1080	980	5.8% (3.3 Deg)
	Dist. (NM)	5.6	5	4	3	2	-	
09	Altitude (Ft)	1800	1610	1290	970	660	-	5.25% (3 Deg)
	Dist. (NM)	5.5	5	4	3	2	-	
14	Altitude (Ft)	1800	1640	1320	1000	680	-	5.28% (3 Deg)
	Dist. (NM)	5.5	5	4	3	2	-	

- (4) OCA Circling : Cat A/B : 1380 ft.  
Cat C : 1480 ft.  
Cat D : 1700 ft.

Note: - Visual Circling East of Rwy 14 and North of Rwy 27 of the intersecting Rwy 14 & Rwy 27 is not permitted.

- (5) Minimum Sector Altitude: Sector 340°-200°  
2600ft up to 12 NM  
3700ft from 12 to 25 NM.  
Sector 200°-340°  
2600ft up to 25 NM

- (6) Holding procedures  
a) Runway 09 One minute right hand pattern inbound track  
273° (M) R-093. Minimum holding altitude 3700ft.  
b) Runway 14 One minute right hand pattern inbound track  
313° (M) R-133. Minimum holding altitude 3700ft.  
c) Runway 09 One minute left hand pattern inbound track  
086° (M) R-266. Minimum holding altitude 3700ft.

(7) Radio communication failure procedure :

1. (I) In case radio communication failure takes place prior to establishing final approach track, maintain the last assigned altitude or 3700ft whichever is higher and proceed to VOR (116.6 BBB) via the shortest route to join holding procedure (Rwy 09,27 or 14) as specified at Para 6.  
(II) In case radio communication failure takes place after establishing the final approach track, aircraft may continue the approach and land if visual, or carry out the missed approach and join the VOR (116.6 BBB) holding procedure (Rwy 09,27 or 14) as specified at Para 6.
2. After joining the VOR holding procedure aircraft shall carry out the instrument approach procedure applicable to the RWY for which SRA was being provided.

**VABB AD 2.23 ADDITIONAL INFORMATION**

**APRONS**

STAND NO.	WING SPAN (M)	LENGTH (M)	PCN	CO-ORDINATES	REMARKS
1	35.9	40	47R/B/W/T	190541.0N 0725133.3E	
2	35	40	---DO---	190540.0N 0725132.7E	
3	35	40	---DO---	190538.8N 0725131.8E	
4	35	40	---DO---	190537.6N 0725131.1E	
5	35	40	---DO-----	190536.5N 0725130.4E	
6	35	40	---DO---	190535.4N 0725129.7E	
7	35	40	---DO-----	190534.3N 0725129.0E	
8	35	40	---DO---	190533.2N 0725128.3E	

9	35	40	---DO---	190532.1N 0725127.6E
10	35	40	---DO---	190531.0N 0725126.9E
11	35.9	40	---DO---	190529.9N 0725126.2E
12	36	45	---DO---	190528.2N 0725125.3E
13	36	40	---DO---	190528.6N 0725124.1E
14	36	45	33F/B/W/T	190528.6N 0725123.1E
15	36	45	---DO---	190528.6N 0725121.8E
16	36	45	85R/B/W/T	190528.6N 0725120.5E
17	36	45	---DO---	190528.6N 0725119.2E
18	45	54	---DO---	190528.6N 0725118.0E
19	45	54	---DO---	190530.8N 0725115.2E
20	45	54	---DO---	190530.8N 0725113.3E
21	45	54	---DO---	190530.8N 0725111.4E
22	45	54	---DO---	190530.8N 0725109.5E
23	45	54	52F/B/W/T	190530.8N 0725107.6E
24	34.1Deg	45	---DO---	190530.8N 0725105.8E
25	28.88	36.44	---DO---	190540.0N 0725132.8E
26	27.05	27.17	---DO---	190538.9N 0725131.7E
27	27.05	27.17	---DO---	190537.8N 0725130.6E
28	27.05	27.17	---DO---	190536.7N 0725129.5E
29	27.05	27.17	---DO---	190535.6N 0725128.4E
30	27.05	27.17	---DO---	190534.5N 0725127.3E
31	27.05	27.17	---DO---	190533.4N 0725126.2E
32	27.05	27.17	47R/B/W/T	190532.3N 0725125.1E
33	27.05	27.17	---DO---	190531.2N 0725124.0E
34	28.89	36.44	---DO---	190535.7N 0725136.6E
35	35	40	---DO---	190534.9N 0725134.9E
36	35	40	---DO---	190532.6N 0725133.5E
37	35	40	---DO---	190530.7N 0725132.2E
38	35	40	---DO---	190529.7N 0725131.6E
39	35	40	---DO---	190528.7N 0725130.9E
40	34.4	33.65	96R/B/W/T	190527.6N 0725130.3E
40A	30	36	---DO---	190527.6N 0725130.3E
41	65	74	44R/B/W/T	1905.7N 07252.3E
42 TO 43	65	71	---DO---	1905.7N 07252.3E
44 TO 45	65	74	57R/B/W/T	1905.7N 07252.4E
46 TO 47	65	71	66R/C/W/T	1905.7N 07252.4E
48 TO 50	65	71	---DO---	1905.6N 07252.5E
51	65	74	---DO---	190540.0N 0725237.0E
52	65	74	---DO---	190541.7N 0725239.0E
53	65	74	55R/B/W/T	190543.3N 0725240.4E
54	65	74	---DO---	190544.8N 0725241.1E
55	65	74	66R/C/W/T	190546N 0725243E
56	65	71	46R/C/W/T	1905.6N 07252.2E
57	61	74	---DO---	---DO---
58	65	71	---DO---	---DO---
59	61	74	---DO---	1905.6N 07252.3E
60	65	71	---DO---	---DO---
61	61	74	---DO---	---DO---
62	65	71	---DO---	1905.5N 07252.4E

63 TO 64	45	54	54R/B/W/T	---DO---
65 TO 67	60	71	69R/B/W/T	1905.5N 07252.6E
71 TO 72	51	60	---DO---	1905.6N 07252.0E
73	64.5	71	---DO---	1905.6N 07252.1E
74	60	71		1905.7N 07252.1E
75	60	71		1905.7N 07252.2E
81	35.9	42.25	54/R/C/W/U	190527N 0725146E
82	35.9	44.5	54/R/C/W/U	190527N 0725145E
83	35.9	44.5	54/R/C/W/U	190529N 0725144E
84	35.9	42.25	54/R/C/W/U	190530N 0725143E
85	35.9	42.25	54/R/C/W/U	190531N 0725142E
86	35.9	42.25	54/R/C/W/U	190526N 0725146E
87	35.9	42.25	54/R/C/W/U	190527N 0725140E
88	35.9	42.25	54/R/C/W/U	190528N 0725130E
89	35	40	64/R/C/W/T	190528N 0725213E
90	35	40	64/R/C/W/T	190528N 0725214E
91	35	40	64/R/C/W/T	190528N 0725216E
92	35	40	64/R/C/W/T	190528N 0725217E
93	35	40	64/R/C/W/T	190528N 0725219E
94	35	40	64/R/C/W/T	190528N 0725220E

note

1. At old airport apron, parking is non-standard & is owner's/operator's responsibility.
2. Two B747 can not be parked simultaneously on bay 41 & 42
3. Power in/ push back from stand 1 to 24, 34 to 40a & 41 to 54.
4. Power in / power out fm stand 25 to 33.
5. Aerobridge and PAPA-AGNIS on 51 to 54.
6. Acft from stand 25 to 33 to taxi – in via twy A2 and taxi out via twy A1 with right turn only.
7. VGDS for A300 and A320 for bay 20 to 24. PAPA-AGNIS on request
8. No power to be used for exiting stands marked as power-in and push back.
9. Hydrant refueling facility not avbl. on bay 75.
10. Bay 41, 44 to 45, 57, 59 and 61 can accommodate B777-300
11. Bay no. 56,58,60& 62 accommodate B747-400.
12. Stand 33 can accommodate CRJ/ATR acft. PCN 41R/C/W/T.
13. Power in push back facing south only on stands 55.
14. Power in push back facing east only on stands 81 to 94.
15. Engine start after pulling acft. upto abeam bay 84 for stand 85.
16. Engine start after pulling acft. upto abeam bay 84 for stand 88
17. VGDS (graphic) on bay 41 to 54
18. Stand 89 to 94 power – in push back facing east only.

**TAXIWAYS**

Designation	Width /Shoulder (M)	PCN	Remarks
A1	23/11.5	55/R/C/W/T( Btn Rwy 14& upto behind Bay 1) 47/R/B/W/T (behind Bay 1 & upto D)	Suitable for type
A2	23/10.5	61/R/C/W/T (Btn Rwy14 & upto behind Bay 34) 47/R/B/W/T(behind bay 34 & upto D)	
B2	23/10.5	68/F/B/W/T (988M from beginning of RWY14)	

B3	23/10.5	79R/B/W/T (Btn Rwy 14& upto Twy G) 65/F/C/W/U (Btn Twy G & Twy H)	‘D’ Acft.
B4	45/10.5	64/F/B/W/T	
B5	23/10.5	64/R/C/W/T (985M fm junction of Twy ‘H’ and B3’)	Length 80M
B6	23M/10.5	64/R/C/W/T (735M Fm junction of Twy ‘H’ and ‘B3’)	Length 80M
C	23/10	64F/B/W/T	
D	23/10.5	53/F/B/W/T (fm Rwy09/27 upto TwyB2) 77/R/B/W/T (B2 with Rwy14/32)	
E	29.53 to 46/7	92/R/B/W/T	
F	23/10.5	90/F/C/W/T (Btn Rwy 14/32 upto behind Bay 41) 60/R/B/W/T (Behind Bay41 upto behind Bay45)	
F1	23/10.5	52/F/B/W/U (Behind Bay56 to Bay46) 52/R/B/W/T(Behind Bay46 to Bay54)	
G	23/10.5	87/R/B/W/T	
H	23/10.5	63/F/C/W/T(Btn its junction with Twy F1&B3) 63/F/C/W/U(Btn Twy B3 & Rwy09/27)	
I	23M/10.5	75R/C/W/T(linking RWY 09/27 with Twy ‘D’) 2200M from displaced THR	Length 362M
J	23/10.5	75R/B/W/T	
L	22/NIL	85/R/B/W/T	
L1	24/10.5	65/F/C/W/U	
L2	24/10.5	65/F/C/W/U	
Q	23/10.5	50/F/C/W/U (1567M Fm begning of Rwy 27)	
R	32.5/5.2	50/F/C/W/U	
S	23/10.5	35/F/C/W/U (1979M from beginning of RWY 27)	
T	23/10.5	50/F/C/W/U (1877M Fm beginning of RWY 27)	
U	25.10/2.5	54/R/C/W/U	
Y	23M/10.5	75/R/C/W/T(1985M Fm THR Rwy 27)	
Z	23/10.5	75/R/C/W/T(75M Fm begning of Rwy 32)	Length 1100M

## Note:

1. A1 and A2 are suitable for acft wing span upto 35.9M only.
2. Acft Holding on Twy B4 will prohibit Acft.taxi on Twy D behind Twy B4.
3. Acft.holding on Twy C will prohibit Acft. Taxing on Twy D behind Twy C.
4. Acft. On Twy J will prohibit acft. Taxing on Portion of Twy D btn Twy J and Rwy 14/32.
- 5.Twy L,L1& L2 avbl. For acft of wing span upto 45M only.
- 6.Twy S & Twy T avbl. For acft. Of wing span 23.9M only.
- 7.Acft. Holding on Twy D at HLDG PSN Rwy14/32 will prohibit acft. Taxing on Twy J.

- 8.Acft. Holding on Twy J at HLDG PSN Rwy14/32 will prohibit acft. Taxing on Twy D.
- 9.Acft. Holding on Twy C will prohibit acft. Taxing on Twy D.
- 10.Acft. Holding on Twy B4 will prohibit acft. Taxing on Twy D.
- 11.Paved area with PCN 40/R/C/W/U AVBL. without any marking on south side of rwy 09/27.
- 12.Acft for St no 25 to 33 to Taxi in from south to north only via Twy D then Twy A2 and taxi out via Twy A1 with right turn only.
- 13.H24 Aircraft taxing or towing shall not cross any RWY without positive clearance from tower.
- 14.Pilots / Operators shall take all ground precautions and shall not repeat not use power in exiting the stands notified as Power-in / Push back stands.
- 15.Heavy aircraft requiring backtrack after landing on RWY 14 shall make 180 Deg turn on the turning pad at the end of RWY 14.
- 16.Portion of TWY 'F' btn RWY 14/32 and parking bay no 41 redesigned as Taxi lane 'F'.

#### **VABB AD 2.24 CHARTS RELATED TO AN AERODROME**

1. ILS (X) RWY27
2. ILS (Y) RWY27
3. ILS RWY09
4. ILS RWY14
5. VOR RWY09 (CAT A/B)
6. VOR RWY 09 (CAT C/D)
7. VOR RWY32
8. VOR RWY27
9. VOR RWY14 (CAT A/B)
10. VOR RWY14 (CAT C/D)