

**STANDARD DEPARTURE CHART**  
**RNAV (GNSS) -**  
**INSTRUMENT (SID)**

TWR 118.6 / 118.25  
APP 120.3  
124.05  
ACC 133.25

TRANSITION ALTITUDE  
11 000ft

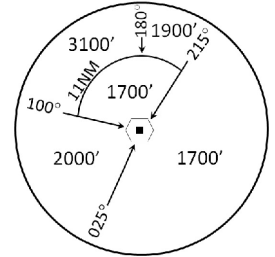
D-ATIS AP ID-WSSS  
128.6

**SINGAPORE/Singapore Changi**  
**RWY 20C**  
**AROSO DEPARTURES**  
**AROSO 5B**

ELEV, ALT IN FEET  
BEARINGS, TRACKS AND  
RADIALS ARE MAGNETIC  
VAR 0°23'E (2022)

NOT TO SCALE

DISTANCES IN NM



MSA 25 NM  
from TEKONG DVOR

**AROSO**  
02° 08' 46" N  
103° 24' 21" E

**AKMET**  
01° 53' 55" N  
103° 43' 39" E

**AKOMA**  
01° 45' 22" N  
103° 54' 43" E  
**A110**

**GENERAL INFORMATION**

**INITIAL CLIMB**  
**3000FT**

**CAUTION: RWY 02R/20L CLOSED UNTIL FURTHER ADVISED**

**NOTE:** RADAR REQUIRED

**NOTE:** RNAV-1 NAVIGATION SPECIFICATION GNSS REQUIRED

**NOTE:** ACFT UNABLE TO FLY THE SID PROFILE  
SHALL INFORM ATC PRIOR TO DEPARTURE AND  
EXPECT RADAR VECTORED IF NECESSARY

**NOTE:** WHEN TAKEN OFF THE SID, AS INSTRUCTED BY ATC,  
REFER TO ENR 1.5, SECTION 3, PARAGRAPH 3.4.1  
- FOR RWY 20C MINIMUM CLIMB GRADIENT

**NOTE:** REFER TO BACK PAGE FOR  
- FORMAL AND TABULAR DESCRIPTIONS  
- RADIO COM FAILURE PROCEDURES

**PROCEDURE INFORMATION**

SID SHALL NOT EXCEED IAS 230KTS UNTIL  
PASSING 4000FT AMSL AND NOT EXCEED  
IAS 250KTS UNTIL PASSING 10000FT AMSL.

CRUISING LEVELS WILL BE ISSUED AFTER TAKE-OFF  
BY SINGAPORE RADAR.

SID SHALL BE ON A MINIMUM CLIMB GRADIENT OF 7%  
UNTIL REACHING OR PASSING 2500FT, THEREAFTER 3.3%.

GND SPEED - KNOTS	75	100	150	200	250	300
7% V/V (fpm)	532	709	1063	1418	1772	2127
3.3% V/V (fpm)	251	334	501	668	835	1003

**DER (RWY 20C)**  
01° 19' 42" N  
103° 59' 05" E

**TEKONG**  
DVOR/DME 116.5  
VTK  
01° 24' 55" N  
104° 01' 20" E  
60M  
**A070**

**IBIXU**  
01° 16' 21" N  
103° 57' 40" E  
**A015**

**SALRU**  
01° 17' 01" N  
104° 08' 02" E

**IBIVA**  
01° 13' 51" N  
103° 56' 37" E  
**A025**

**ADPON**  
01° 12' 03" N  
104° 05' 14" E

**DUBOT**  
01° 08' 46" N  
104° 01' 03" E  
**A040**

**AROSO 5B (SID) RNAV GNSS RWY 20C - DESCRIPTIONS**

**Formal & Abbreviated Descriptions**

Formal Description	Abbreviated Description	Path Terminator	Fly-Over required
To IBIXU on course 203° at or above 1500ft.	IBIXU [M203; A015+] -	CF	N
To IBIVA at or above 2500ft, turn left.	IBIVA [A025+; L] -	TF	N
To DUBOT at or above 4000ft, turn left.	DUBOT [A040+; L] -	TF	N
To ADPON, turn left.	ADPON [L] -	TF	N
To SALRU, turn left.	SALRU [L] -	TF	N
To VTK at or above 7000ft, turn right.	VTK [A070+; R] -	TF	N
To AKOMA at or above 11000ft, turn left.	AKOMA [A110+; L] -	TF	N
To AKMET.	AKMET -	TF	N
To AROSO.	AROSO	TF	N

**Tabular Descriptions**

Path Term	Waypoint Name	Fly-Over	Course °M(°T)	Distance (NM)	Turn Direction	Altitude	Speed Limit	Navigation Spec
CF	IBIXU	-	203(203.4)	4.0	-	A015+	-	RNAV1
TF	IBIVA	-	203(203.4)	3.0	L	A025+	-	RNAV1
TF	DUBOT	-	138(138.4)	7.0	L	A040+	-	RNAV1
TF	ADPON	-	052(052.4)	5.0	L	-	-	RNAV1
TF	SALRU	-	029(029.4)	6.0	L	-	-	RNAV1
TF	VTK	-	319(319.4)	10.0	R	A070+	-	RNAV1
TF	AKOMA	-	342(342.4)	21.0	L	A110+	-	RNAV1
TF	AKMET	-	307(307.4)	14.0	-	-	-	RNAV1
TF	AROSO	-	307(307.4)	24.0	-	-	-	RNAV1

**Radio Communications Failure Procedure**

<b>1</b>	<b>SET TRANSPONDER TO MODE A/C CODE 7600</b>
<b>2</b>	<b>COMMUNICATIONS FAILURE OCCURS IMMEDIATELY AFTER DEPARTURE:</b> PROCEED DIRECT TO SAMKO HOLDING AREA (SHA) CLIMBING TO THE LAST ASSIGNED ALTITUDE, THEREAFTER REFER TO SINGAPORE AIP ON RADIO COMMUNICATIONS FAILURE PROCEDURE.