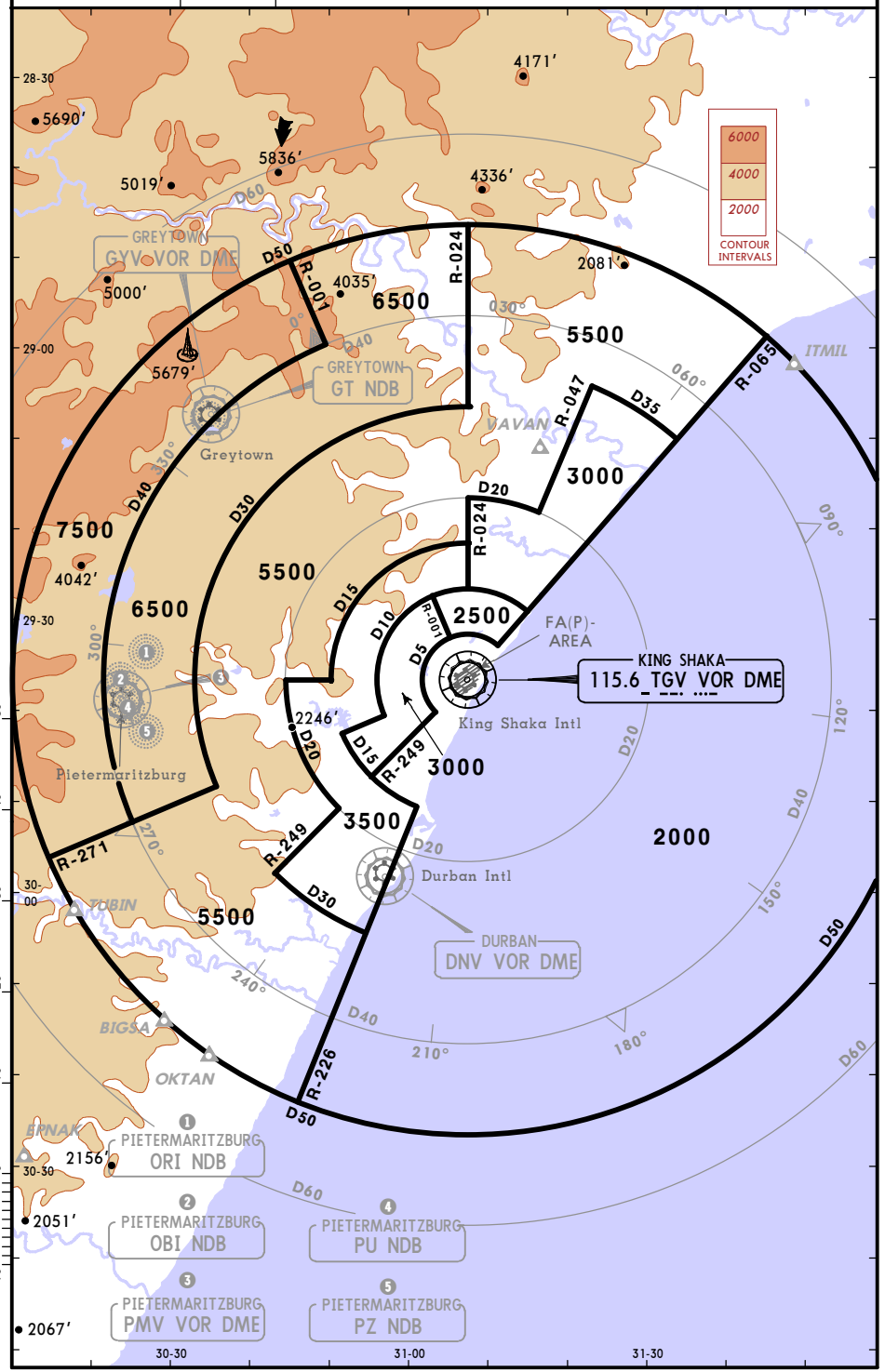
FALE/DUR
KING SHAKA INTL

JEPPESEN
16 JUL 10 (20-1R) Eff 29 Jul

DURBAN, S AFR REP
RADAR MINIMUM ALTITUDES

DURBAN Approach (R)	Apt Elev
125.75	304′

Alt Set: hPa Trans level: By ATC Trans alt: 5500′
A minimum vertical clearance of 1000′ is applied up to TGV 20 DME and 1500′ thereafter.



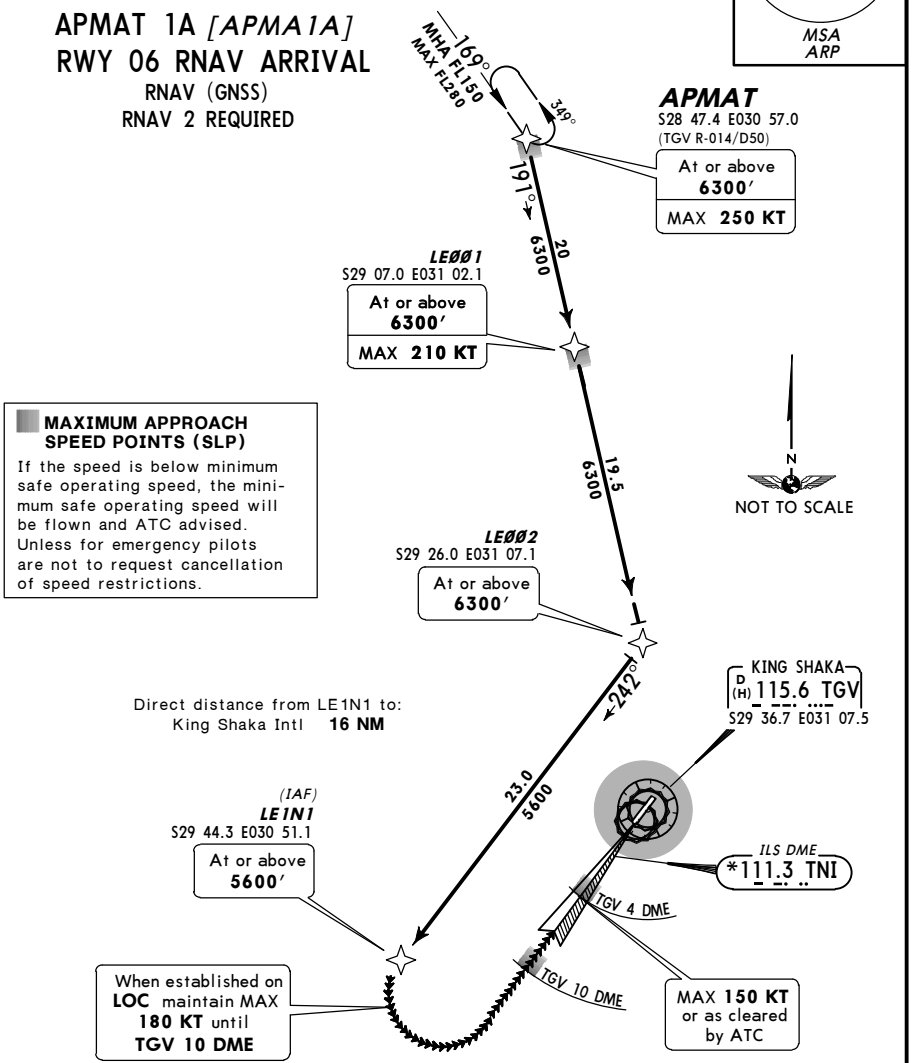
CHANGES: Sectors & altitudes revised.

D-ATIS	Apt Elev
127.0	304′

Alt Set: hPa Trans level: By ATC Trans alt: 5500′
1. If unable to comply with STAR notify ATC.
2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.

5300′
MSA
ARP

APMAT 1A *[APMA1A]*
RWY 06 RNAV ARRIVAL
RNAV (GNSS)
RNAV 2 REQUIRED



LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.

Before APMAT: Proceed to APMAT and enter holding, hold at last assigned FL for minimum 5 minutes, then descend to FL130 or maintain last assigned FL if below FL130. Leave APMAT on "After APMAT" procedure.

After APMAT: Continue on STAR maintaining last assigned FL, when passing LE001 descend to FL80, at LE002 turn RIGHT to LE1N1. Continue RNAV (GNSS) approach and intercept ILS.

ROUTING

From APMAT to LE002, turn RIGHT to LE1N1 for RADAR vectoring to ILS.

In the event of a missed approach with the intention of diverting to an alternate airport comply with **SID ITMIL 1C.**

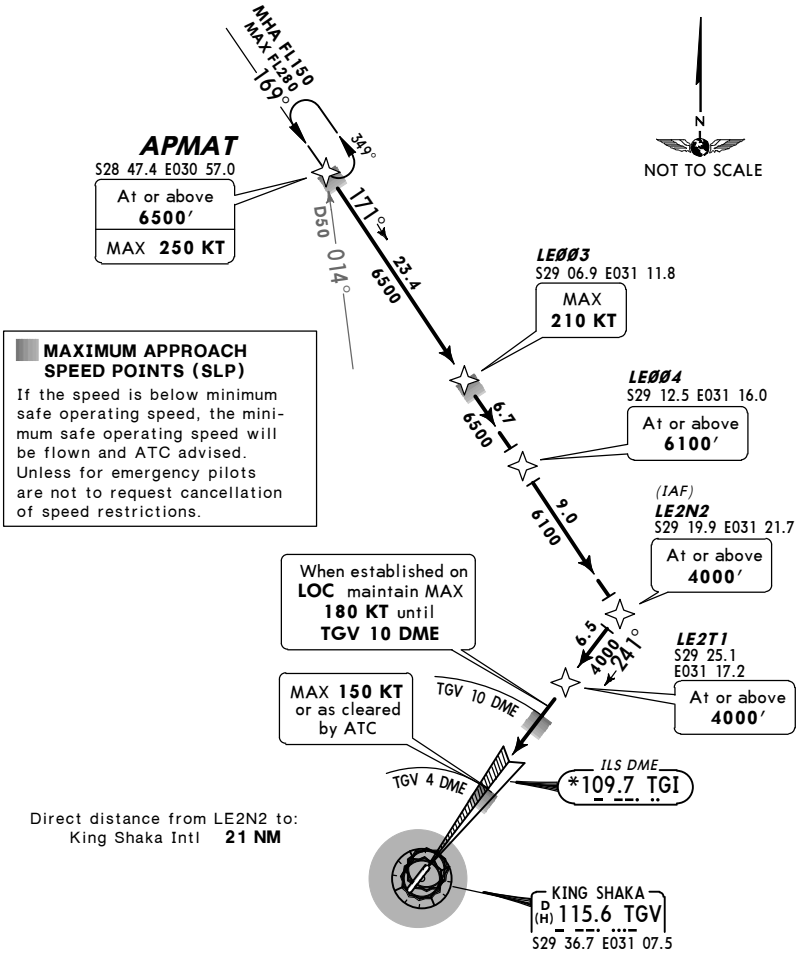
CHANGES: RNAV STAR availability; crossings at APMAT & LE001.

D-ATIS	Apt Elev
127.0	304′

Alt Set: hPa Trans level: By ATC Trans alt: 5500′
1. If unable to comply with STAR notify ATC.
2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.

5300′
MSA
ARP

APMAT 1B *[APMA1B]*
RWY 24 RNAV ARRIVAL
RNAV (GNSS)
RNAV 2 REQUIRED



MAXIMUM APPROACH SPEED POINTS (SLP)
If the speed is below minimum safe operating speed, the minimum safe operating speed will be flown and ATC advised. Unless for emergency pilots are not to request cancellation of speed restrictions.

Direct distance from LE2N2 to:
King Shaka Intl **21 NM**

LOST COMMS

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.
Before APMAT: Proceed to APMAT and enter holding, hold at last assigned FL for minimum 5 minutes, then descend to FL130 or maintain last assigned FL if below FL90. Leave APMAT on "After APMAT" procedure.
After APMAT: Continue on STAR maintaining last assigned FL , at LE003 descend to FL80, then via LE004 to LE2N2, turn RIGHT to LE2T1. Continue RNAV (GNSS) approach and intercept ILS.

ROUTING

From APMAT to LE004, then to LE2N2, turn RIGHT to LE2T1 to intercept ILS.

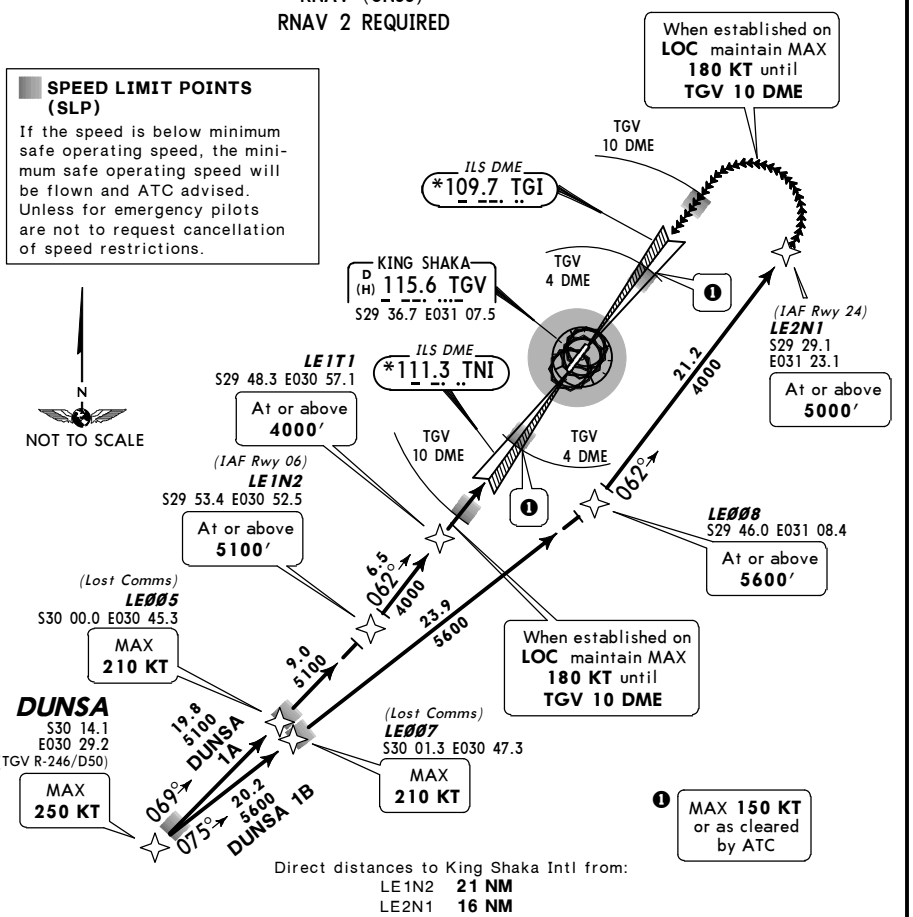
In the event of a missed approach with the intention of diverting to an alternate airport comply with **SID OKTAN 1A.**

CHANGES: RNAV STAR availability.

D-ATIS	Apt Elev	
127.0	304′	Alt Set: hPa Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with STAR notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.

5300′
MSA
ARP

DUNSA 1A *[DUNS1A]*, DUNSA 1B *[DUNS1B]*
RWYS 06, 24 RNAV ARRIVALS
RNAV (GNSS)
RNAV 2 REQUIRED



Direct distances to King Shaka Intl from:
LE1N2 **21 NM**
LE2N1 **16 NM**

LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST COMMS LOST

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.

Before DUNSA: Proceed to DUNSA. Leave DUNSA on "After DUNSA" procedure.

DUNSA 1A

After DUNSA: Continue on STAR maintaining last assigned FL, when passing LE005 descend to FL80, at LE1N2 proceed to LE1T1. Continue RNAV (GNSS) approach and intercept ILS.

DUNSA 1B

After DUNSA: Continue on STAR maintaining last assigned FL, when passing LE007 descend to FL80, then to LE008, turn LEFT to LE2N1. Continue RNAV (GNSS) approach and intercept ILS.

STAR	RWY	ROUTING
DUNSA 1A	**06**	From DUNSA to LE1N2, turn LEFT to LE1T1, intercept ILS.
DUNSA 1B	**24**	From DUNSA to LE008, turn LEFT to LE2N1 for radar vectors to ILS.

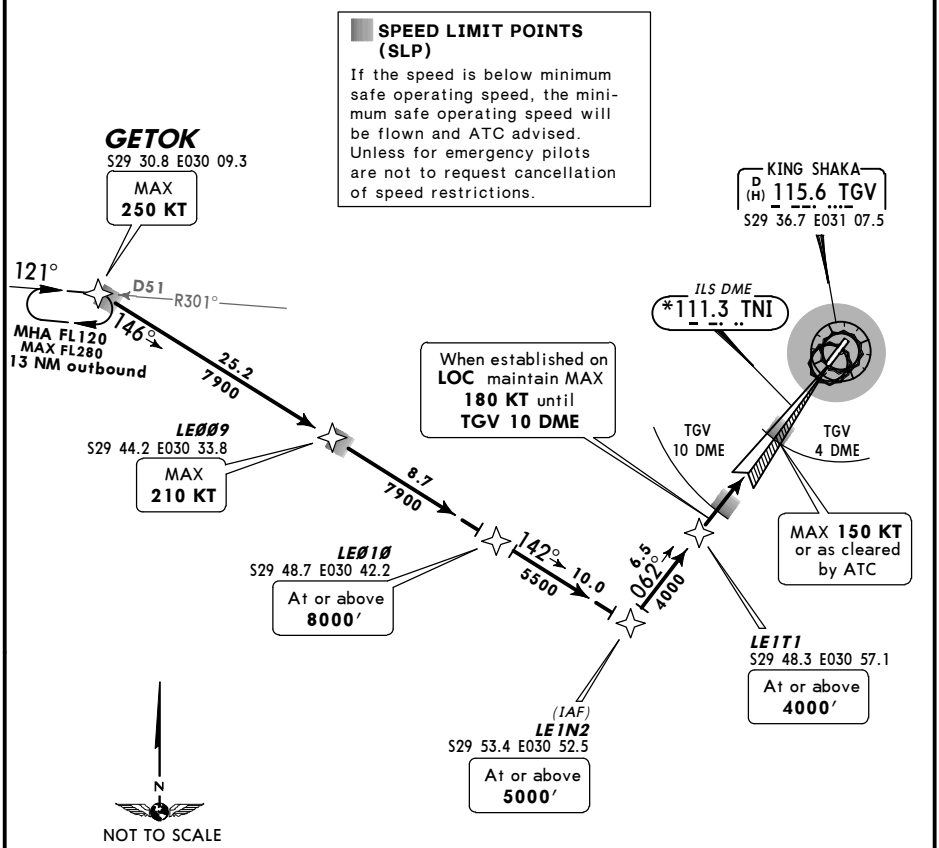
In the event of a missed approach with the intention of diverting to an alternate airport comply with the following SIDs:
RWY 06: SID ITMIL 1C **RWY 24: SID OKTAN 1A.**

CHANGES: RNAV STARs availability.

D-ATIS	Apt Elev	
127.0	304′	Alt Set: hPa Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with STAR notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.

5300′
MSA
ARP

GETOK 1C *[GETO1C]*
RWY 06 RNAV ARRIVAL
RNAV (GNSS)
RNAV 2 REQUIRED



LOST COMMS

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.

Before GETOK: Proceed to GETOK and enter holding, hold at last assigned FL for minimum 5 minutes, then descend to FL120 or maintain last assigned FL if below FL120. Leave GETOK on "After GETOK" procedure.

After GETOK: Continue on STAR and maintain FL120, proceed via LE010 to LE1N2, turn LEFT to LE1T1. Continue RNAV (GNSS) approach and intercept ILS.

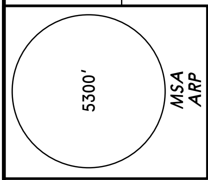
ROUTING

From GETOK to LE010, then to LE1N2, turn LEFT to LE1T1, intercept ILS.

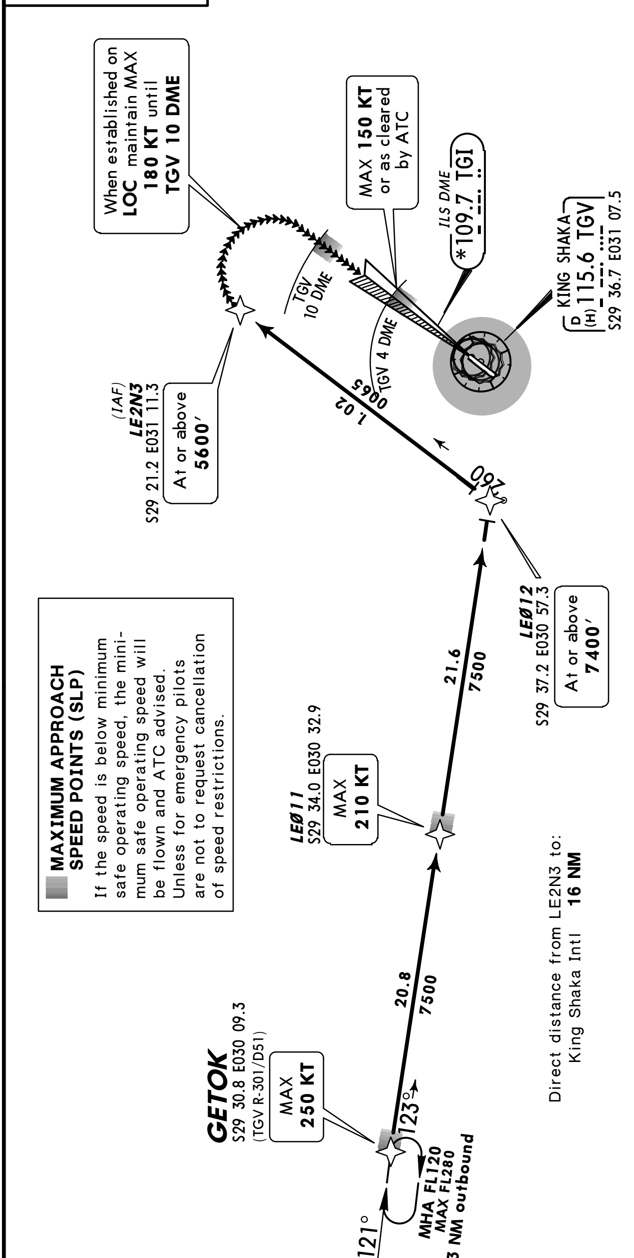
In the event of a missed approach with the intention of diverting to an alternate airport comply with **SID ITMIL 1C.**

CHANGES: RNAV STAR availability.

D-ATIS	Apt Elev	
127.0	304′	Alt Set: hPa Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with STAR notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.



GETOK 1D *[GETO1D]*
RWY 24 RNAV ARRIVAL
RNAV (GNSS)
RNAV 2 REQUIRED



LOST COMMS

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.
Before GETOK: Proceed to GETOK and enter holding, hold at last assigned FL for minimum 5 minutes, then descend to FL120 or maintain last assigned FL if below FL120. Leave GETOK on "After GETOK" procedure.
After GETOK: Continue on STAR and maintain FL120, at LE012 turn LEFT to LE2N3. Continue RNAV (GNSS) approach and intercept ILS.

ROUTING

From GETOK to LE012, turn LEFT to LE2N3 for radar vectors to ILS.

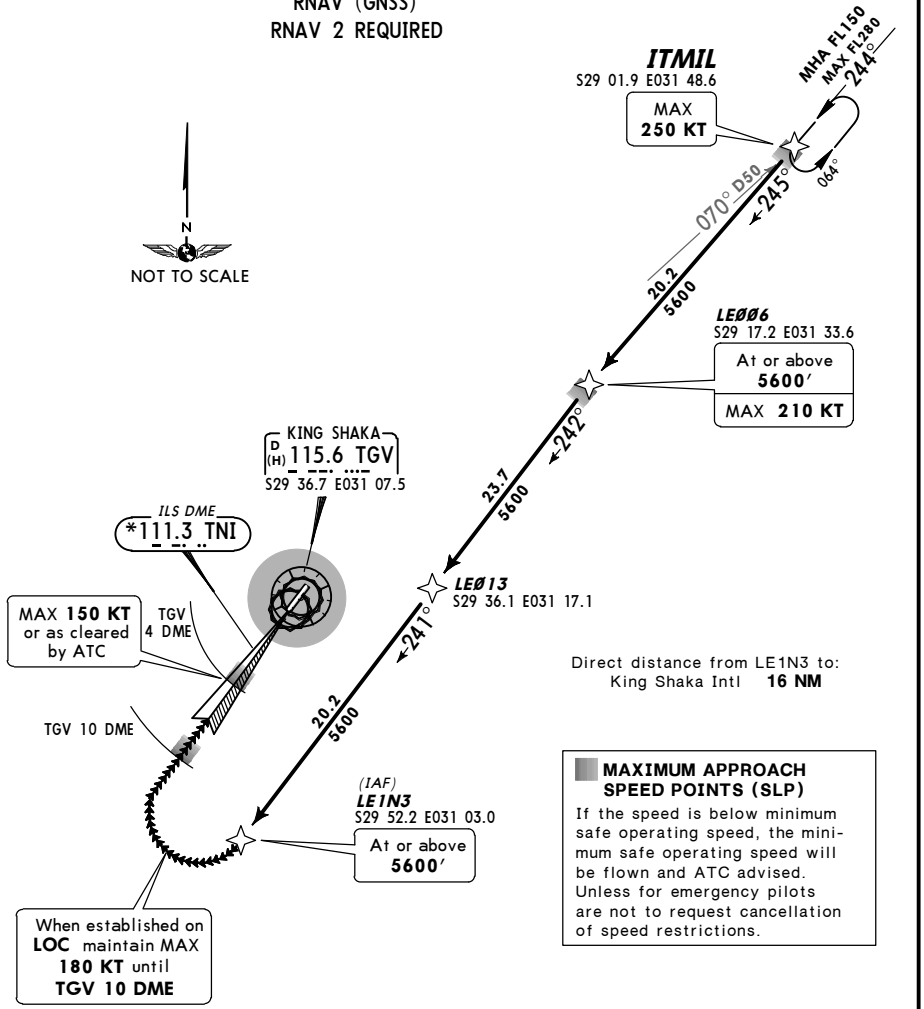
In the event of a missed approach with the intention of diverting to an alternate airport comply with **SID OKTAN 1A.**

CHANGES: RNAV STAR availability.

D-ATIS	Apt Elev	
127.0	304′	Alt Set: hPa Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with STAR notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.

5300′
MSA
ARP

ITMIL 1A *[ITMI1A]*
RWY 06 RNAV ARRIVAL
RNAV (GNSS)
RNAV 2 REQUIRED



MAXIMUM APPROACH SPEED POINTS (SLP)
If the speed is below minimum safe operating speed, the minimum safe operating speed will be flown and ATC advised. Unless for emergency pilots are not to request cancellation of speed restrictions.

LOST COMMS

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.
Before ITMIL: Proceed to ITMIL and enter holding, hold at last assigned FL for minimum 5 minutes, then descend to FL90 or maintain last assigned FL if below FL90. Leave ITMIL on "After ITMIL" procedure.
After ITMIL: Continue on STAR maintaining last assigned FL, when passing LE013 descend to FL80, proceed to LE1N3. Continue RNAV (GNSS) approach and intercept ILS.

ROUTING

From ITMIL to LE006, then to LE013, then to LE1N3, turn RIGHT for radar vectoring to ILS.

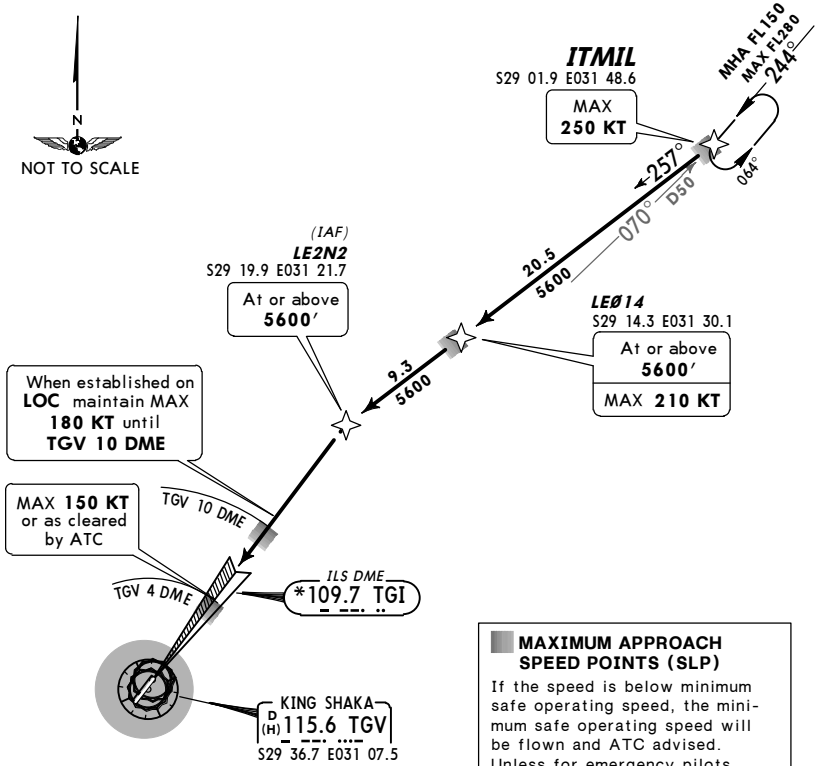
In the event of a missed approach with the intention of diverting to an alternate airport comply with **SID ITMIL 1C.**

CHANGES: RNAV STAR availability.

D-ATIS	Apt Elev	
127.0	304′	Alt Set: hPa Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with STAR notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational.

5300′
MSA
ARP

ITMIL 1B *[ITMI1B]*
RWY 24 RNAV ARRIVAL
RNAV (GNSS)
RNAV 2 REQUIRED



MAXIMUM APPROACH SPEED POINTS (SLP)
If the speed is below minimum safe operating speed, the minimum safe operating speed will be flown and ATC advised. Unless for emergency pilots are not to request cancellation of speed restrictions.

Direct distance from LE2N2 to:
King Shaka Intl **21 NM**

LOST COMMS

If not cleared for an arrival, proceed to nearest STAR entry position at last assigned FL or FL130, whichever is highest. Comply with associated communication failure procedure.
Before ITMIL: Proceed to ITMIL and enter holding, hold at last assigned FL for minimum 5 minutes, then descend to FL90 or maintain last assigned FL if below FL90. Leave ITMIL on "After ITMIL" procedure.
After ITMIL: Continue on STAR maintaining last assigned FL, at LE014 descend to FL80, at LE2N2, turn LEFT and continue RNAV (GNSS) approach and intercept ILS.

ROUTING

From ITMIL to LE2N2, turn LEFT to intercept ILS.

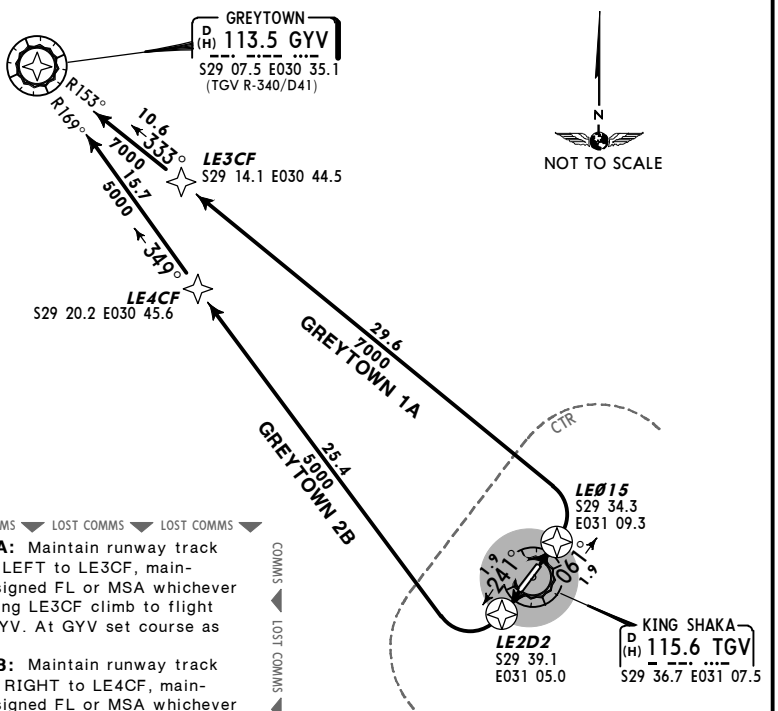
In the event of a missed approach with the intention of diverting to an alternate airport comply with **SID OKTAN 1A.**

CHANGES: RNAV STAR availability.

DURBAN Approach 125.75	*Apt Elev* 304′	Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with SID notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational. 3. SIDs include minimum noise routings. 4. Contact DURBAN Approach on frequency provided in ATC clearance at 2000′. Advise RADAR of level passing on first contact for Mode-C check. 5. Cross CTR boundary at or above 3000′.	5300′ *MSA ARP*

GREYTOWN 1A *[GYV1A]*
GREYTOWN 2B *[GYV2B]*
RWYS 06, 24 RNAV DEPARTURES
RNAV (GNSS)
RNAV 2 REQUIRED

SPEED: MAX 220 KT UNTIL ESTABLISHED ON TRACK TO GYV



COMMS ▼ LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼

GREYTOWN 1A: Maintain runway track to LE015, turn LEFT to LE3CF, maintaining last assigned FL or MSA whichever is higher. Passing LE3CF climb to flight plan level to GYV. At GYV set course as per flight plan.

GREYTOWN 2B: Maintain runway track to LE2D2, turn RIGHT to LE4CF, maintaining last assigned FL or MSA whichever is higher. Then to LE4CF, climb to flight plan level to GYV. At GYV set course as per flight plan.

Both SIDs: Aircraft wishing to return must continue to SID termination point and climb to last assigned FL or MSA or FL80 whichever is higher. At GYV proceed to GETOK and comply with STAR GETOK 1C (GREYTOWN 1A)/ GETOK 1D (GREYTOWN 2B) communication failure procedure.

COMMS ◀ LOST COMMS ◀ LOST COMMS ◀ LOST COMMS

These SIDs require a minimum climb gradient of 7% up to 3000′.

Gnd speed-KT	75	100	150	200	250	300
7% V/V(fpm)	532	709	1063	1418	1772	2127

Initial climb clearance **FL70,** further climb under RADAR control.

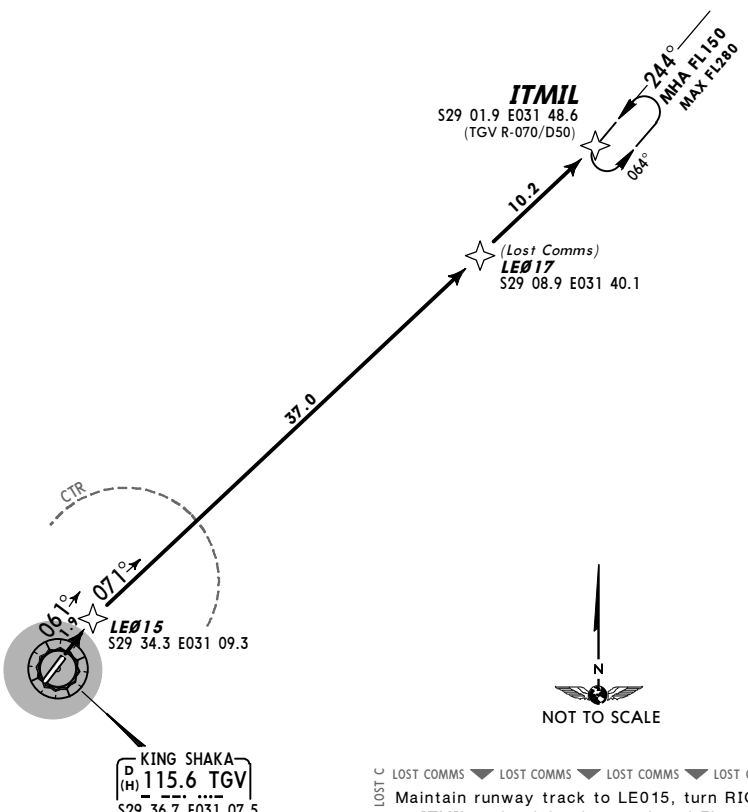
SID	RWY	ROUTING
GREYTOWN 1A	**06**	On runway track to LE015, turn LEFT to LE3CF, then to GYV, then as per flight plan.
GREYTOWN 2B	**24**	On runway track to LE2D2, turn RIGHT to LE4CF, then to GYV, then as per flight plan.

CHANGES: RNAV SIDs availability.

DURBAN Approach 125.75	*Apt Elev* 304′	Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with SID notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational. 3. SIDs include minimum noise routings. 4. Contact DURBAN Approach on frequency provided in ATC clearance at 2000′. Advise RADAR of level passing on first contact for Mode-C check. 5. Cross CTR boundary at or above 3000′.	5300′ *MSA ARP*

ITMIL 1C *[ITMI1C]*
RWY 06 RNAV DEPARTURE
RNAV (GNSS)
RNAV 2 REQUIRED

SPEED: MAX 220 KT UNTIL ESTABLISHED ON TRACK TO ITMIL



LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼

LOST COMMS ▶ LOST C

Maintain runway track to LE015, turn RIGHT to ITMIL maintaining last assigned FL or MSA whichever is higher. When passing LE017 climb to flight plan level, at ITMIL set course as per flight plan.

LOST COMMS ▶

Aircraft wishing to return must continue to SID termination point and climb to last assigned FL or MSA whichever is higher. Enter ITMIL holding and hold for 5 minutes, then comply with the appropriate STAR communication failure procedure.

LOST COMMS ▲ LOST COMMS ▲ LOST COMMS ▲ LOST COMMS ▲

This SID requires a minimum climb gradient of 7% up to 3000′.

Gnd speed-KT	75	100	150	200	250	300
7% V/V(fpm)	532	709	1063	1418	1772	2127

Initial climb clearance **FL70,** further climb under RADAR control.

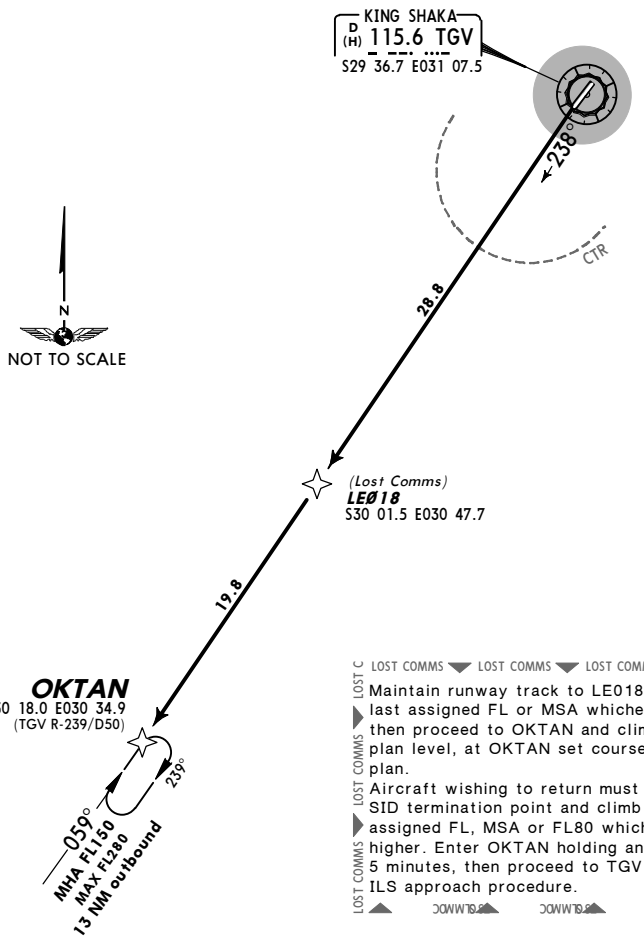
ROUTING

On runway track to LE015, turn RIGHT to ITMIL, then as per flight plan.

CHANGES: RNAV SID availability.

DURBAN Approach 125.75	*Apt Elev* 304′	Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with SID notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational. 3. SIDs include minimum noise routings. 4. Contact DURBAN Approach on frequency provided in ATC clearance at 2000′. Advise RADAR of level passing on first contact for Mode-C check. 5. Cross CTR boundary at or above 3000′.	5300′ *MSA ARP*

OKTAN 1A *[OKTA1A]*
RWY 24 RNAV DEPARTURE
RNAV (GNSS)
RNAV 2 REQUIRED



LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼

Maintain runway track to LE018, maintaining last assigned FL or MSA whichever is higher, then proceed to OKTAN and climb to flight plan level, at OKTAN set course as per flight plan.

Aircraft wishing to return must continue to SID termination point and climb to last assigned FL, MSA or FL80 whichever is higher. Enter OKTAN holding and hold for 5 minutes, then proceed to TGV and comply ILS approach procedure.

This SID requires a minimum climb gradient of 7% up to 3000′.

Gnd speed-KT	75	100	150	200	250	300
7% V/V(fpm)	532	709	1063	1418	1772	2127

Initial climb clearance **FL70**, further climb under RADAR control.

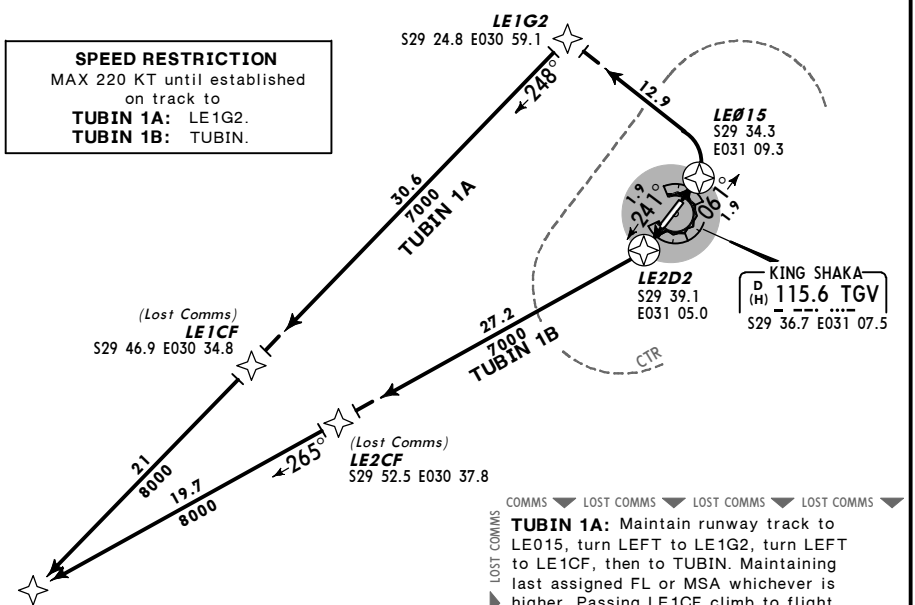
ROUTING

Direct to OKTAN, then as per flight plan.

CHANGES: RNAV SIDs availability.

DURBAN Approach 125.75	*Apt Elev* 304′	Trans level: By ATC Trans alt: 5500′ 1. If unable to comply with SID notify ATC. 2. SIDs and STARs must be announced in operation on ATIS and will only be in force when Surveillance RADAR is operational. 3. SIDs include minimum noise routings. 4. Contact DURBAN Approach on frequency provided in ATC clearance at 2000′. Advise RADAR of level passing on first contact for Mode-C check. 5. Cross CTR boundary at or above 3000′.	5300′ *MSA ARP*

TUBIN 1A *[TUBI1A]*
TUBIN 1B *[TUBI1B]*
RWYS 06, 24 RNAV DEPARTURES
RNAV (GNSS)
RNAV 2 REQUIRED



TUBIN 1A: Maintain runway track to LE015, turn LEFT to LE1G2, turn LEFT to LE1CF, then to TUBIN. Maintaining last assigned FL or MSA whichever is higher. Passing LE1CF climb to flight plan level, at TUBIN set course as per flight plan.

TUBIN 1B: Maintain runway track to LE2D2, maintaining last assigned FL or MSA whichever is higher. Then turn RIGHT to LE2CF, climb to flight plan level, at TUBIN set course as per flight plan.

Both SIDs: Aircraft wishing to return must continue to SID termination point and climb to last assigned FL or MSA or FL80 whichever is higher. At TUBIN proceed to DUNSA and comply with STAR DUNSA 1A (Rwy 06)/ DUNSA 1B (Rwy 24) communication failure procedure.

These SIDs require a minimum climb gradient of 7% up to 3000′.

Gnd speed-KT	75	100	150	200	250	300
7% V/V(fpm)	532	709	1063	1418	1772	2127

Initial climb clearance **FL70**, further climb under RADAR control.

SID	RWY	ROUTING
TUBIN 1A	**06**	On runway track to LE015, turn LEFT to LE1G2, turn LEFT to LE1CF, then to TUBIN, then as per flight plan.
TUBIN 1B	**24**	On runway track to LE2D2, turn RIGHT to LE2CF, then to TUBIN, then as per flight plan.

CHANGES: RNAV SIDs availability.

NOISE ABATEMENT

LT minus 2 HOURS = UTC (Z)

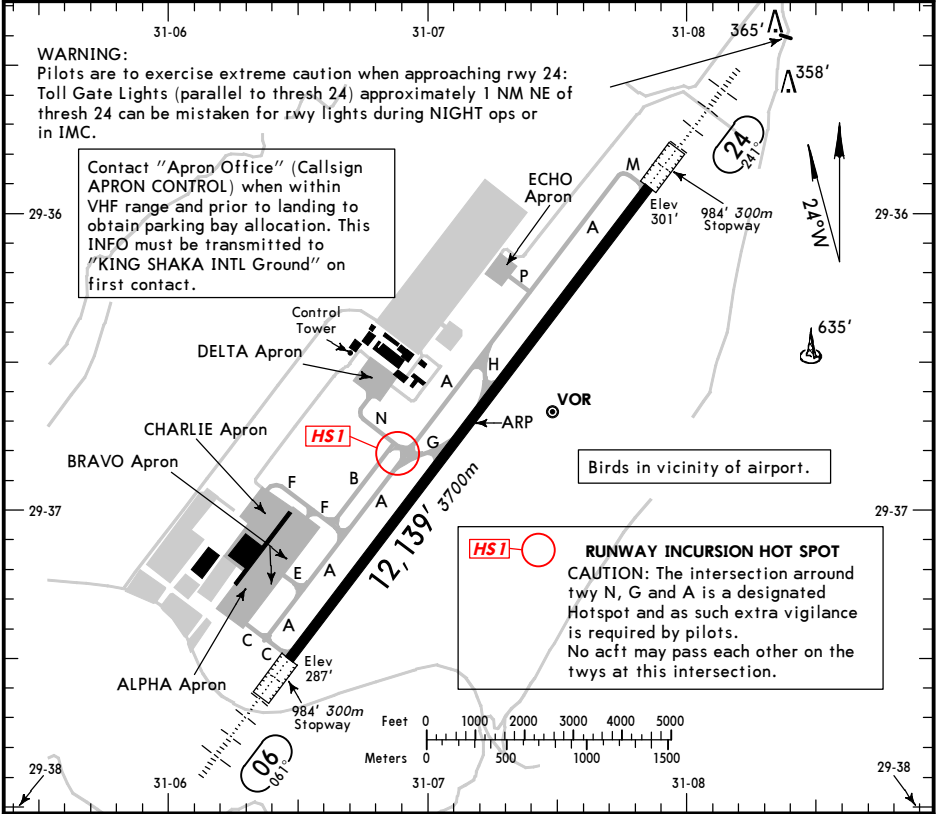
DEPARTURES

The below procedures apply to jet ACFT and may be disregarded if at 3000′ AGL or when leveled off by ATC or when leveled by SID.

Take-off to 1500′ AGL	- take-off power; - take-off flaps; - climb at V_2 + 10 to 20 KT or as limited by body angle; - depending on ACFT type, the take-off power/thrust may be reduced at a lower height;
At 1500′ AGL	- reduce thrust to not less than climb power/thrust;
1500′ to 3000′ AGL	- climb at V_2 + 10 to 20 KT;
At 3000′ AGL	- accelerate smoothly to en-route climb speed with flap retraction on schedule.

No jet ACFT are to use RWY or TWY intersection for take-off between 2200-0600LT.

D-ATIS	KING SHAKA INTL Ground	APRON Control	Tower
127.0	121.65	122.65	118.45



ADDITIONAL RUNWAY INFORMATION

RWY		USABLE LENGTHS — LANDING BEYOND — Threshold	Glide Slope	TAKE-OFF	WIDTH
06	HIRL *(60m)* CL *(15m)* HIALS-II TDZ PAPI (3.0°) ❶		11,106' *3385m*		197' *60m*
24	HIRL *(60m)* CL *(15m)* HIALS-II TDZ PAPI (3.0°) ❷		11,045' *3367m*		

❶ HST-H with HSTIL.
❷ HST-G with HSTIL.

PUSH-BACK PROCEDURE

Push-back, start and taxi clearances to be requested on GND.
Acft are not to request push-back until the TUG is connected and ready to push.
Before start is requested, acft must be ready for immediate push-back.

JAR-OPS TAKE-OFF ❶

	All Rwys — LVP must be in force: RL & CL	RCLM (DAY only) or RL	RCLM (DAY only) or RL	NIL (DAY only)
A				
B	*200m*	*250m*	*400m*	*500m*
C				
D	*250m*	*300m*		

❶ Operators applying U.S. Ops Specs: CL required below 300m.

CHANGES: Note.

STRAIGHT-IN RWY		A	B	C	D
06	ILS ❶	**495**′(208′)	**505**′(218′)	**515**′(228′)	**525**′(238′)
	FULL	**R600m**	**R600m**	**R600m**	**R600m**
	Limited	R750m	R750m	R750m	R750m
	ALS out	R1200m	R1200m	R1200m	R1200m
	ILS ❷	**1129**′(842′)	**1129**′(842′)	**1129**′(842′)	**1129**′(842′)
		R1500m	**R1500m**	**C2400m**	**C2400m**
	LOC ❸❹	**660**′(373′)	**660**′(373′)	**660**′(373′)	**660**′(373′)
		R1000m	**R1000m**	**R1000m**	**R1400m**
	ALS out	R1500m	R1500m	R1800m	R2000m
	LOC ❷❸	**1300**′(1013′)	**1300**′(1013′)	**1300**′(1013′)	**1300**′(1013′)
		R1500m	**R1500m**	**C2400m**	**C2400m**
	RNAV ❸❺	**690**′(403′)	**690**′(403′)	**690**′(403′)	**690**′(403′)
		R1200m	**R1400m**	**R1400m**	**R1800m**
	ALS out	R1500m	R1500m	R2000m	R2000m
	RNAV ❷❸	**1220**′(933′)	**1220**′(933′)	**1220**′(933′)	**1220**′(933′)
		R1500m	**R1500m**	**C2400m**	**C2400m**
	VOR ❸❻	**650**′(363′)	**650**′(363′)	**650**′(363′)	**650**′(363′)
		R1000m	**R1000m**	**R1000m**	**R1400m**
	ALS out	R1500m	R1500m	R1800m	R2000m
	VOR ❷❸	**1920**′(1633′)	**1920**′(1633′)	**1920**′(1633′)	**1920**′(1633′)
		C5000m	**C5000m**	**C5000m**	**C5000m**
24	ILS ❶	**501**′(200′)	**501**′(200′)	**508**′(207′)	**518**′(217′)
	FULL	**R550m**	**R550m**	**R600m**	**R600m**
	Limited	R750m	R750m	R750m	R750m
	ALS out	R1200m	R1200m	R1200m	R1200m
	ILS ❷	**1133**′(832′)	**1133**′(832′)	**1133**′(832′)	**1133**′(832′)
		R1500m	**R1500m**	**C2400m**	**C2400m**
	LOC ❸❹	**670**′(369′)	**670**′(369′)	**670**′(369′)	**670**′(369′)
		R1000m	**R1000m**	**R1000m**	**R1400m**
	ALS out	R1500m	R1500m	R1800m	R2000m
	LOC ❷❸	**1310**′(1009′)	**1310**′(1009′)	**1310**′(1009′)	**1310**′(1009′)
		R1500m	**R1500m**	**C2400m**	**C2400m**
	RNAV ❸❺	**780**′(476′)	**780**′(476′)	**780**′(476′)	**780**′(476′)
		R1500m	**R1500m**	**R1500m**	**R1800m**
	ALS out	R1500m	R1500m	C2200m	C2200m
	RNAV ❷❸	**1260**′(956′)	**1260**′(956′)	**1260**′(956′)	**1260**′(956′)
		R1500m	**R1500m**	**C2400m**	**C2400m**
	VOR ❸❼	**870**′(569′)	**870**′(569′)	**870**′(569′)	**870**′(569′)
		R1500m	**R1500m**	**R1900m**	**R1900m**
	ALS out	R1500m	R1500m	C2600m	C2600m
	VOR ❷❸	**1300**′(999′)	**1300**′(999′)	**1300**′(999′)	**1300**′(999′)
		R1500m	**R1500m**	**C3800m**	**C3800m**
	ALS out	R1500m	R1500m	C4500m	C4500m

❶ Missed apch climb gradient MIM 3.4%.
❷ Missed apch climb gradient MIM 2.5%.
❸ Continuous Descent Final Approach.
❹ Missed apch climb gradient MIM 3.5%.
❺ Missed apch climb gradient MIM 3.9%.
❻ Missed apch climb gradient MIM 3.6%.
❼ Missed apch climb gradient MIM 3.2%.

CHANGES: New page.

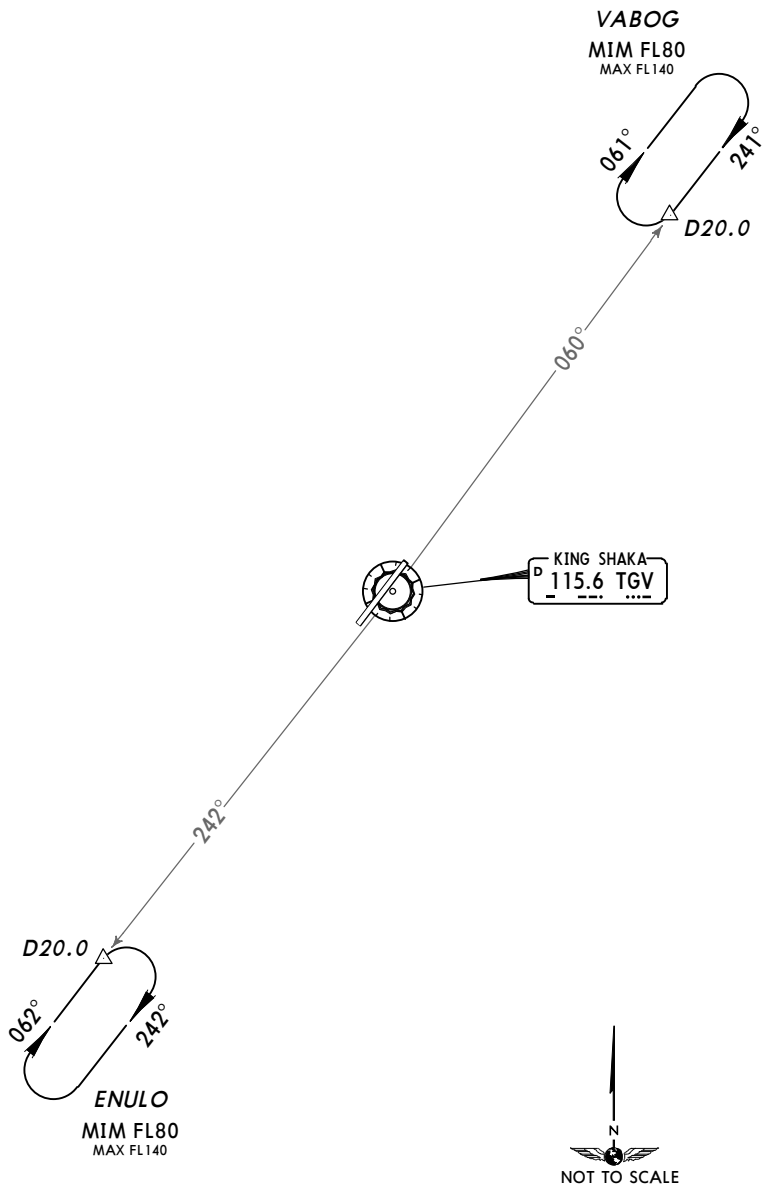
CIRCLE-TO-LAND	100 KT	135 KT	180 KT	205 KT
After apch to rwy 06 ❶	**960**'(673')	**990**'(703')	**1170**'(883')	**1440**'(1153')
After apch to rwy 24 ❷	**960**'(659')	**990**'(689')	**1170**'(869')	**1440**'(1139')
	V1500m ❸	V1600m ❸	V2400m ❸	V3600m ❸

❶ Circling height based on rwy 06 thresh elev of 287'.
❷ Circling height based on rwy 24 thresh elev of 301'.
❸ or higher minimums of preceding straight-in approach.

TAKE-OFF RWY 06, 24

	LVP must be in Force					
	Approved Operators HIRL, CL & mult. RVR req	RL, CL & mult. RVR req	RL & CL	RCLM (DAY only) or RL	RCLM (DAY only) or RL	NIL (DAY only)
A	125m	150m	200m	250m	400m	500m
B						
C						
D	150m	200m	250m	300m		

ENULO & VABOG HOLDINGS



CHANGES: Holdings renamed.

FALE/DUR
KING SHAKA INTL

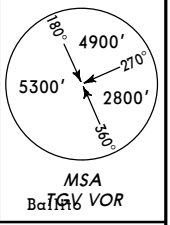
JEPPESEN
10 SEP 10 (21-1) Eff 23 Sep

DURBAN, S AFR REP
ILS Z Rwy 06

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP

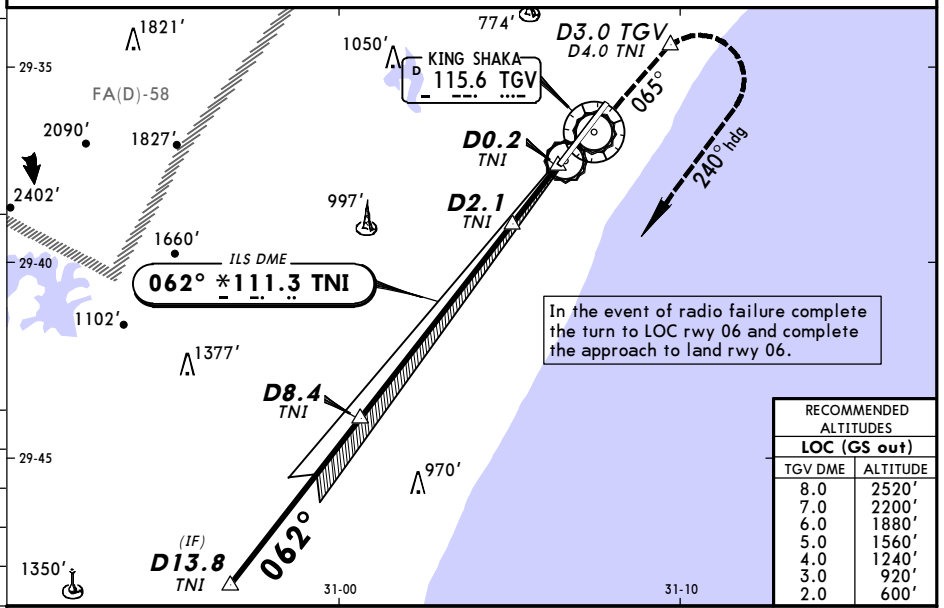
LOC	Final	GS	ILS	Apt Elev 304′
TNI	Apch Crs	D8.4 TNI	DA(H)	
*111.3	062°	3000′ (2713′)	Refer to Minimums	RWY 287′



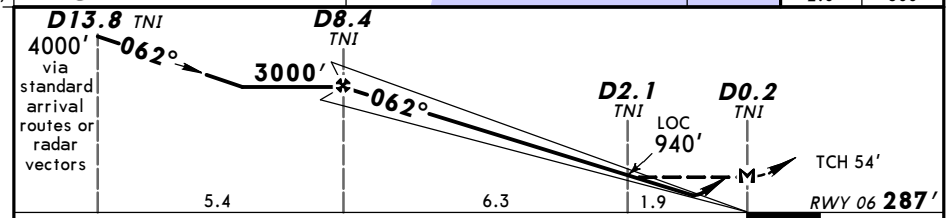
MISSED APCH: Climb STRAIGHT AHEAD on R-065 TGV to D3.0 TGV/D4.0 TNI or 3000′, whichever is later, then turn RIGHT on heading 240° for radar vectors to LOC. **MISSED APCH WITH COMM FAILURE:** Climb STRAIGHT AHEAD on R-065 TGV to D3.0 TGV/D4.0 TNI or 3000′, whichever is later, then turn RIGHT on heading 240° to intercept 12 DME Arc TGV westbound. Crossing R-225 TGV turn RIGHT on heading 035° to intercept LOC and land.

Alt Set: hPa Rwy Elev: 10 hPa Trans level: By ATC Trans alt: 5500′

1. VOR and DME required. 2. CAUTION: High ground West of airport. 3. Procedure only applicable via STAR or radar vectors.



RECOMMENDED ALTITUDES	
LOC (GS out)	
TGV DME	ALTITUDE
8.0	2520′
7.0	2200′
6.0	1880′
5.0	1560′
4.0	1240′
3.0	920′
2.0	600′



Gnd speed-Kts	70	90	100	120	140	160
ILS GS or LOC Descent Angle 3.00°	377	484	538	646	753	861
MAP at D0.2 TNI						

HIALS-II PAPI PAPI

3000′ whichever is later

D3.0 TGV D4.0 TNI via TGV 115.6 R-065

JAR-OPS STRAIGHT-IN LANDING RWY 06

	ILS Missed apch climb grad mim 3.4%		ILS Missed apch climb grad mim 2.5%		LOC (GS out) Missed apch climb grad mim 3.5%		LOC (GS out) Missed apch climb grad mim 2.5%		CIRCLE-TO-LAND
	DA(H) D: 525′(238′)		DA(H) 1129′(842′)		MDA(H) 660′(373′)		MDA(H) 1300′(1013′)		
	FULL	ALS out	FULL	ALS out		ALS out		ALS out	
A	RVR 600m	RVR 1000m	RVR 800m	RVR 1200m	RVR 900m	RVR 1500m	RVR 1200m	RVR 1500m	see 21-4A
B					RVR 1000m		RVR 1400m		
C						RVR 1800m		RVR 2000m	
D					RVR 1400m	RVR 2000m	RVR 1800m		

PANS OPS

1 DA(H) A: 495′ (208′), B: 505′ (218′), C: 515′ (228′).

CHANGES: None.

FALE/DUR
KING SHAKA INTL

JEPPESEN
17 DEC 10 (21-2)

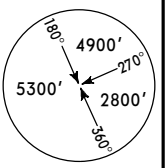
DURBAN, S AFR REP
ILS Y Rwy 06

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP

LOC	Final	GS	ILS	Apt Elev 304′
TNI	Apch Crs	D8.4 TNI	DA(H) Refer to Minimums	RWY 287′
*111.3	062°	3000′ (2713′)		

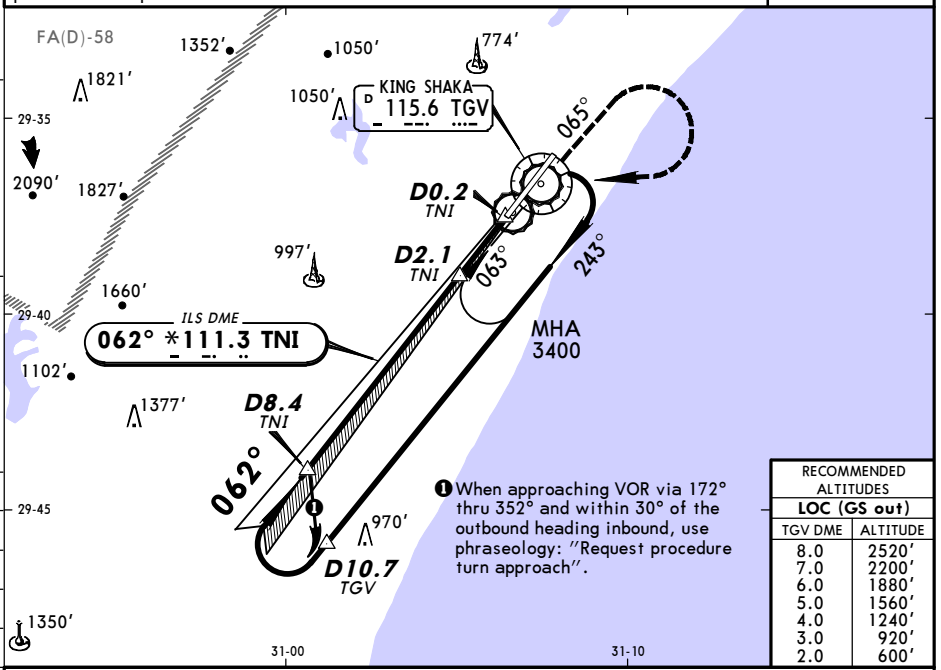
MISSED APCH: Climb STRAIGHT AHEAD on R-065 TGV to 3000′, then turn RIGHT to VOR climbing to 3400′.



MSA
TGV VOR

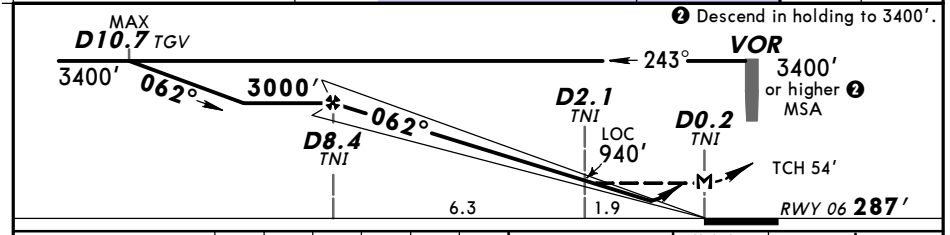
Alt Set: hPa Rwy Elev: 10 hPa Trans level: By ATC Trans alt: 5500′

1. **VOR and DME required.** 2. CAUTION: High ground West of airport. 3. 080°/260° procedure turn prohibited.



❶ When approaching VOR via 172° thru 352° and within 30° of the outbound heading inbound, use phraseology: "Request procedure turn approach".

RECOMMENDED ALTITUDES	
LOC (GS out)	
TGV DME	ALTITUDE
8.0	2520′
7.0	2200′
6.0	1880′
5.0	1560′
4.0	1240′
3.0	920′
2.0	600′



❷ Descend in holding to 3400′.

Gnd speed-Kts	70	90	100	120	140	160
ILS GS or LOC Descent Angle 3.00°	377	484	538	646	753	861
MAP at D0.2 TNI						

HIALS-II
PAPI PAPI

3000′ RT
TGV on 115.6 R-065

JAR-OPS

STRAIGHT-IN LANDING RWY 06

	ILS Missed apch climb grad mim 3.4%		ILS Missed apch climb grad mim 2.5%		LOC (GS out) Missed apch climb grad mim 3.5%		LOC (GS out) Missed apch climb grad mim 2.5%		CIRCLE-TO-LAND
	❶ DA(H) D: 525′ (238′)		DA(H) 1129′ (842′)		MDA(H) 660′ (373′)		MDA(H) 1300′ (1013′)		
	FULL	ALS out	FULL	ALS out		ALS out		ALS out	
A	RVR 600m	RVR 1000m	RVR 800m	RVR 1200m	RVR 900m	RVR 1500m	RVR 1200m	RVR 1500m	see 21-4A
B					RVR 1000m	RVR 1800m	RVR 1400m	RVR 2000m	
C									
D					RVR 1400m	RVR 2000m	RVR 1800m		

PANS OPS

❶ DA(H) A: 495′ (208′), B: 505′ (218′), C: 515′ (228′).

CHANGES: None.

FALE/DUR
KING SHAKA INTL

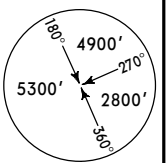
JEPPESEN
17 DEC 10 (21-3)

DURBAN, S AFR REP
ILS Z Rwy 24

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP TM

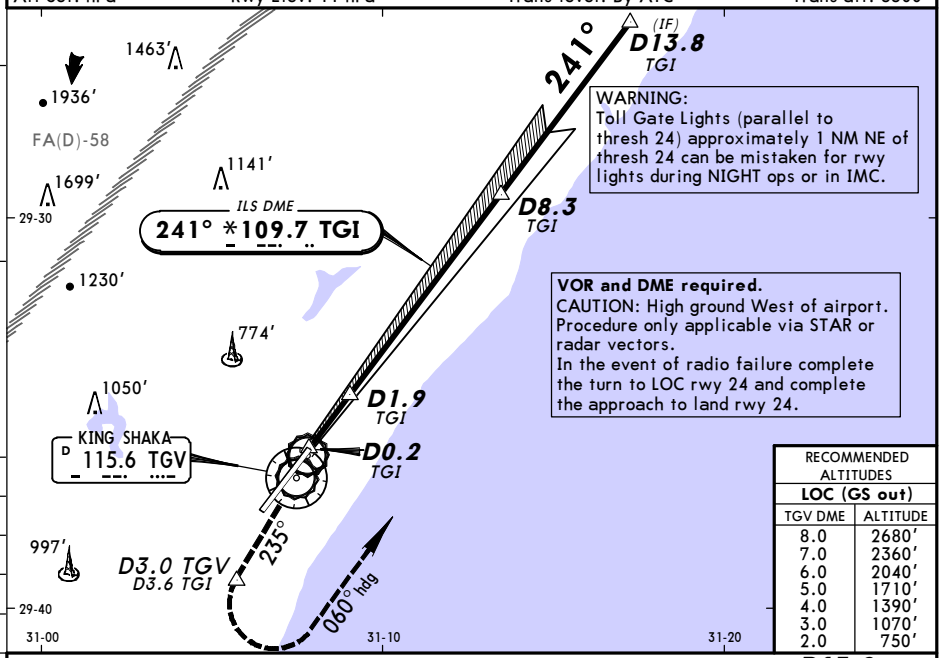
LOC TGI	Final Apch Crs	GS	ILS DA(H)	Apt Elev 304′
*109.7	241°	D8.3 TGI 3000′ (2699′)	Refer to Minimums	RWY 301′



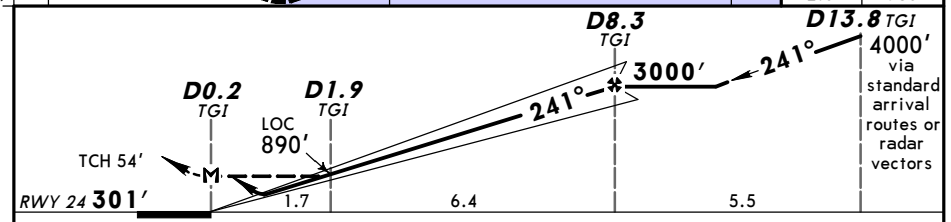
MSA
TGV VOR

MISSED APCH: Climb STRAIGHT AHEAD on R-235 TGV to D3.0 TGV/D3.6 TGI or 3000′, whichever is later, then turn LEFT on heading 060° for radar vectors to LOC. **MISSED APCH WITH COMM FAILURE:** Climb STRAIGHT AHEAD on R-235 TGV to D3.0 TGV/D3.6 TGI or 3000′, whichever is later, then turn LEFT on heading 060° to intercept 12 DME Arc TGV westbound. Crossing R-079 TGV turn LEFT on heading 215° to intercept LOC and land.

Alt Set: hPa | Rwy Elev: 11 hPa | Trans level: By ATC | Trans alt: 5500′



RECOMMENDED ALTITUDES	
LOC (GS out)	
TGV DME	ALTITUDE
8.0	2680′
7.0	2360′
6.0	2040′
5.0	1710′
4.0	1390′
3.0	1070′
2.0	750′



Gnd speed-Kts	70	90	100	120	140	160
ILS GS or LOC Descent Angle 3.00°	377	484	538	646	753	861
MAP at D0.2 TGI						

HIALS-II
PAPI PAPI

3000′ whichever is later | D3.0 TGV D3.6 TGI | via TGV 115.6 R-235

JAR-OPS STRAIGHT-IN LANDING RWY 24

	ILS Missed apch climb grad mim 3.4%		2.5%		LOC (GS out) Missed apch climb grad mim 3.5%		2.5%		CIRCLE-TO-LAND
	[1] DA(H) D: 518′(217′)		DA(H) 1133′(832′)		MDA(H) 670′(369′)		MDA(H) 1310′(1009′)		
	FULL	ALS out	FULL	ALS out		ALS out		ALS out	
A	RVR 550m	RVR 1000m	RVR 800m	RVR 1200m	RVR 900m	RVR 1500m	RVR 1200m	RVR 1500m	see 21-4A
B					RVR 1000m	RVR 1800m	RVR 1400m	RVR 2000m	
C	RVR 600m								
D					RVR 1400m	RVR 2000m	RVR 1800m		

PANS OPS

[1] DA(H) AB: 501′ (200′), C: 508′ (207′).

CHANGES: Warning note.

FALE/DUR
KING SHAKA INTL

JEPPESEN
17 DEC 10 (21-4)

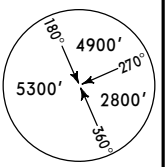
DURBAN, S AFR REP
ILS Y Rwy 24

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP

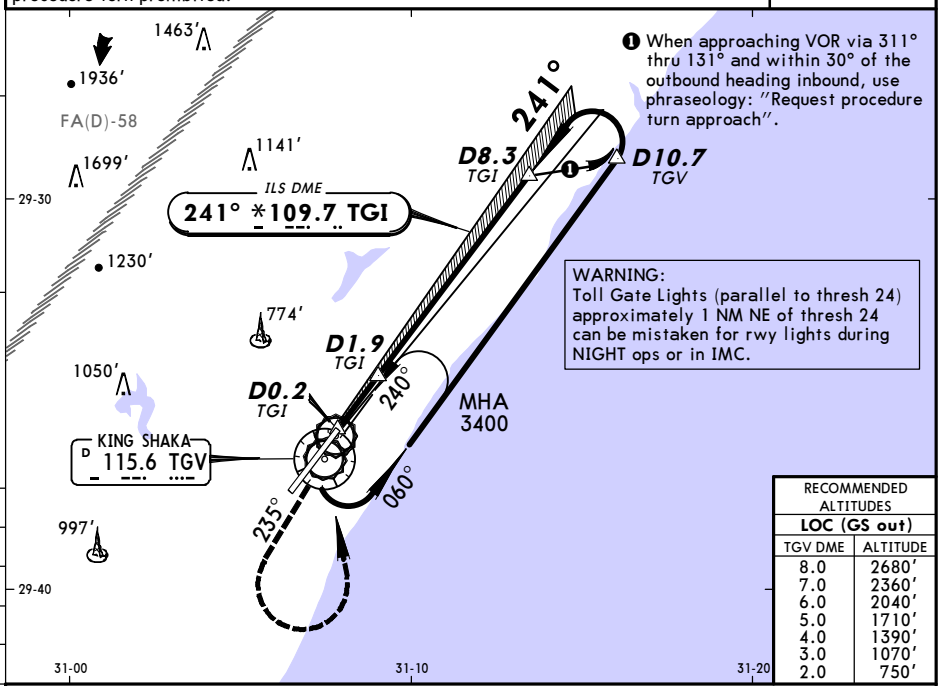
LOC TGI	Final Apch Crs	GS	ILS DA(H) Refer to Minimums	Apt Elev 304′
*109.7	241°	D8.3 TGI 3000′ (2699′)		RWY 301′

MISSED APCH: Climb STRAIGHT AHEAD on R-235 TGV to 3000′, then turn LEFT to VOR climbing to 3400′.



MSA TGV VOR

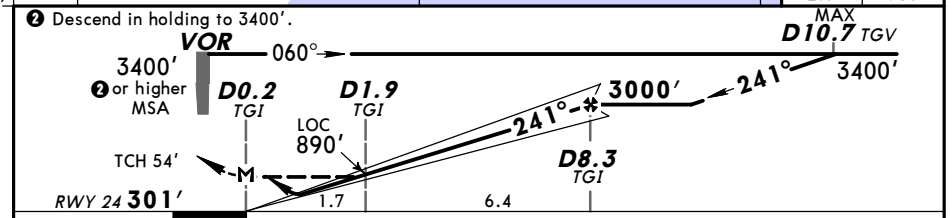
Alt Set: hPa Rwy Elev: 11 hPa Trans level: By ATC Trans alt: 5500′
1. VOR and DME required. 2. CAUTION: High ground West of airport. 3. 080°/260° procedure turn prohibited.



❶ When approaching VOR via 311° thru 131° and within 30° of the outbound heading inbound, use phraseology: "Request procedure turn approach".

WARNING:
Toll Gate Lights (parallel to thresh 24) approximately 1 NM NE of thresh 24 can be mistaken for rwy lights during NIGHT ops or in IMC.

RECOMMENDED ALTITUDES LOC (GS out)	
TGV DME	ALTITUDE
8.0	2680′
7.0	2360′
6.0	2040′
5.0	1710′
4.0	1390′
3.0	1070′
2.0	750′



Gnd speed-Kts	70	90	100	120	140	160
ILS GS or LOC Descent Angle 3.00°	377	484	538	646	753	861
MAP at D0.2 TGI						

HIALS-II PAPI PAPI LT
3000′ on TGV 115.6 R-235

JAR-OPS STRAIGHT-IN LANDING RWY 24

PANS OPS	ILS Missed apch climb grad mim 3.4% DA(H) D: 518′(217′) FULL	ILS ALS out	ILS Missed apch climb grad mim 2.5% DA(H) 1133′(832′) FULL	ILS ALS out	LOC (GS out) Missed apch climb grad mim 3.5% MDA(H) 670′(369′)	LOC (GS out) ALS out	LOC (GS out) Missed apch climb grad mim 2.5% MDA(H) 1310′(1009′)	LOC (GS out) ALS out	CIRCLE-TO-LAND
A	RVR 550m	RVR 1000m	RVR 800m	RVR 1200m	RVR 900m	RVR 1500m	RVR 1200m	RVR 1500m	see 21-4A
B					RVR 1000m	RVR 1800m	RVR 1400m	RVR 2000m	
C	RVR 600m								
D					RVR 1400m	RVR 2000m	RVR 1800m		

❶ DA(H) AB: 501′ (200′), C: 508′ (207′).

CHANGES: Warning note.

DURBAN, S AFR REP
CIRCLING MNMS for ILS or LOC Rwy 06/24

CIRCLE-TO-LAND

ENTIRELY AT PILOTS DISCRETION

MISSED APCH CLIMB GRADIENT MIM 3.4%
&
MISSED APCH CLIMB GRADIENT MIM 3.5%

JAR-OPS

Max Kts	Rwy 06 [1] After ILS & LOC MDA(H)	VIS	Rwy 24 [2] After ILS & LOC MDA(H)	VIS
100	960′ *(673′)*	*1500m*	960′ *(659′)*	*1500m*
135	990′ *(703′)*	*1600m*	990′ *(689′)*	*1600m*
180	1170′ *(883′)*	*2400m*	1170′ *(869′)*	*2400m*
205	1440′ *(1153′)*	*3600m*	1440′ *(1139′)*	*3600m*

MISSED APCH CLIMB GRADIENT MIM 2.5%

JAR-OPS

Rwy 06 [1]

Max Kts	After ILS MDA(H)	VIS	After LOC MDA(H)	VIS
100	1130′ *(843′)*	*1500m*	1300′ *(1013′)*	*1500m*
135	1130′ *(843′)*	*1600m*	1300′ *(1013′)*	*1600m*
180	1170′ *(883′)*	*2400m*	1300′ *(1013′)*	*2400m*
205	1440′ *(1153′)*	*3600m*	1440′ *(1153′)*	*3600m*

JAR-OPS

Rwy 24 [2]

Max Kts	After ILS MDA(H)	VIS	After LOC MDA(H)	VIS
100	1140′ *(839′)*	*1500m*	1310′ *(1009′)*	*1500m*
135	1140′ *(839′)*	*1600m*	1310′ *(1009′)*	*1600m*
180	1170′ *(869′)*	*2400m*	1310′ *(1009′)*	*2400m*
205	1440′ *(1139′)*	*3600m*	1440′ *(1139′)*	*3600m*

[1] Circling height based on rwy 06 thresh elev of 287′.
[2] Circling height based on rwy 24 thresh elev of 301′.

CHANGES: None.

FALE/DUR
KING SHAKA INTL

JEPPESEN
5 NOV 10 (22-1) Eff 18 Nov

DURBAN, S AFR REP
RNAV (GNSS) Rwy 06

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

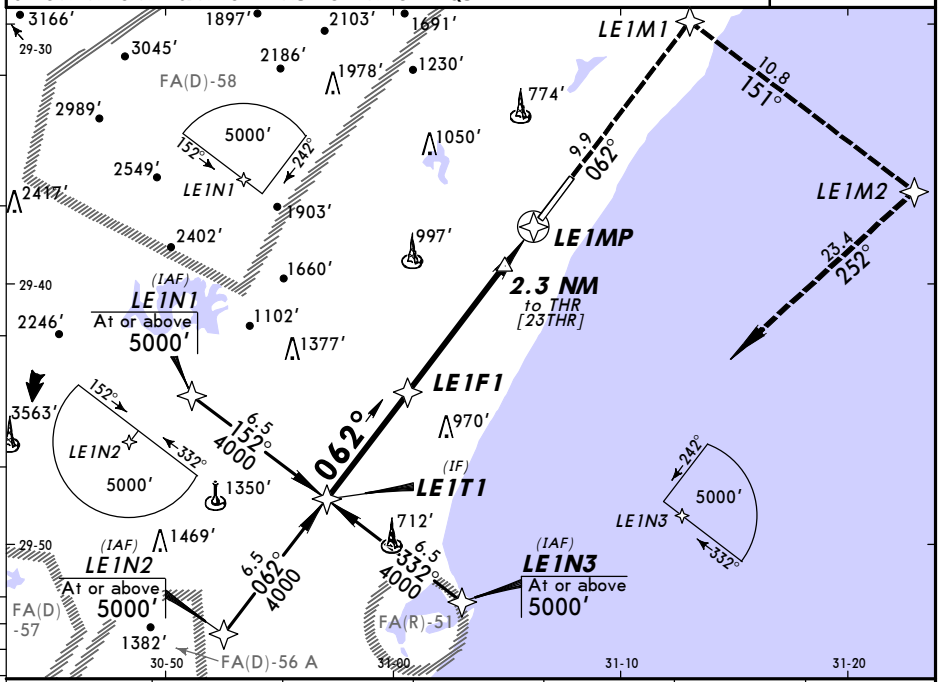
BRIEFING STRIP

RNAV	Final Apch Crs 062°	Procedure Alt LE1F1 3000′ (2713′)	LNAV MDA(H) Refer to Minimums	Apt Elev 304′ RWY 287′	TAA 25 NM IAF

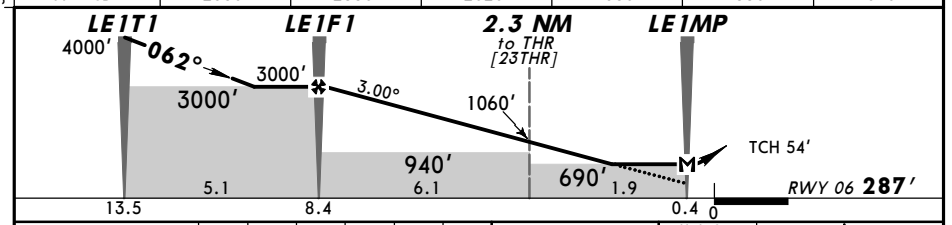
MISSED APCH: Climb STRAIGHT AHEAD to 3000′ via LE1M1 to LE1M2, then turn RIGHT to LE1N3 for radar vectors.

Alt Set: hPa Rwy Elev: 10 hPa Trans level: By ATC Trans alt: 5500′

SPECIAL AIRCRAFT & AIRCREW AUTHORIZATION REQUIRED.



DIST to LE1MP	7.0	6.0	5.0	4.0	3.0	2.0
ALTITUDE	2680′	2350′	2020′	1680′	1350′	1010′



Gnd speed-Kts	70	90	100	120	140	160
Descent Angle 3.00°	372	478	531	637	743	849
MAP at LE1MP						

HIALS-II PAPI PAPI

3000′ via LE1M1

PANS OPS

JAR-OPS STRAIGHT-IN LANDING RWY 06 LNAV

	Missed apch climb grad mim 3.9% MDA(H) 690′ (403′)		Missed apch climb grad mim 2.5% MDA(H) 1220′ (933′)	
		ALS out		ALS out
A	RVR 1200m	RVR 1500m	RVR 1200m	RVR 1500m
B	RVR 1400m		RVR 1400m	
C		RVR 2000m		RVR 2000m
D	RVR 1800m		RVR 1800m	

CIRCLE-TO-LAND

Circling height based on rwy 06 thresh elev of 287′

Max Kts	MDA(H)	VIS
100	960′ (673′) 1	1500m
135	990′ (703′) 1	1600m
180	1170′ (883′) 1	2400m
205	1440′ (1153′)	3600m

1 After approach with missed apch climb grad mim 2.5%: MDA(H) 1220′(933′).

CHANGES: Procedure.

FALE/DUR
KING SHAKA INTL

JEPPESEN
5 NOV 10 (22-2) Eff 18 Nov

DURBAN, S AFR REP
RNAV (GNSS) Rwy 24

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP

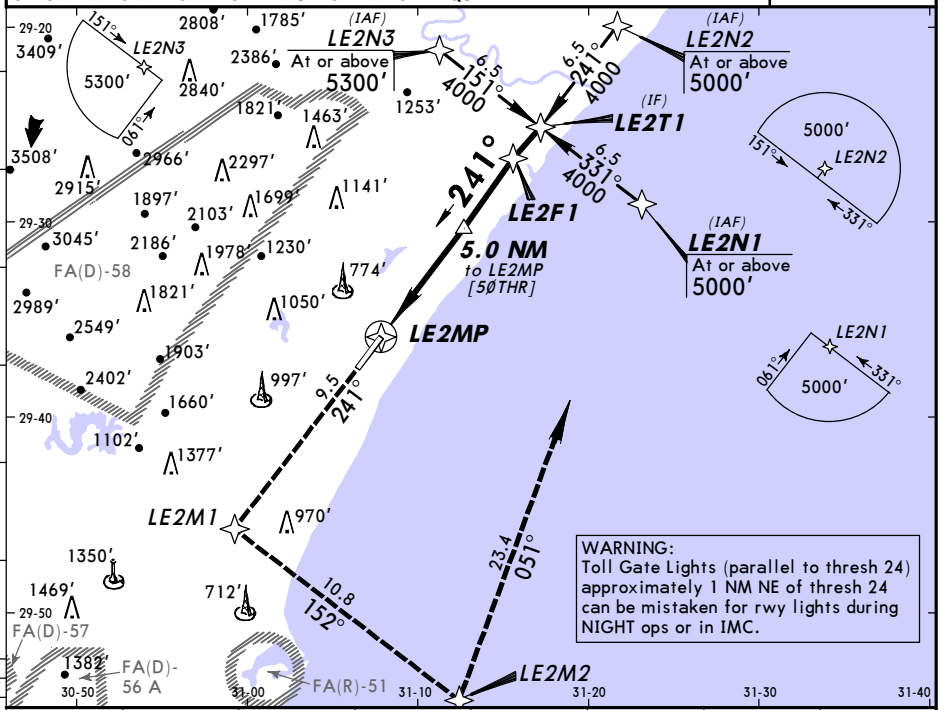
RNAV	Final Apch Crs 241°	Procedure Alt LE2F1 3000′ (2696′)	LNAV MDA(H) Refer to Minimums	Apt Elev 304′

TAA
25 NM
IAF

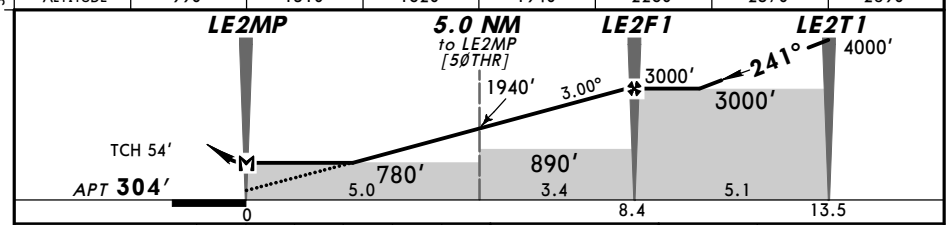
MISSED APCH: Climb STRAIGHT AHEAD to 3000′ via LE2M1 to LE2M2, then turn LEFT to LE2N1 for radar vectors.

Alt Set: hPa Apt Elev: 11 hPa Trans level: By ATC Trans alt: 5500′

SPECIAL AIRCRAFT & AIRCREW AUTHORIZATION REQUIRED.



DIST to LE2MP	2.0	3.0	4.0	5.0	6.0	7.0	8.0
ALTITUDE	990′	1310′	1620′	1940′	2260′	2570′	2890′



Gnd speed-Kts	70	90	100	120	140	160
Descent Angle 3.00°	372	478	531	637	743	849
MAP at LE2MP						

HIALS-II
PAPI PAPI
3000′ via LE2M1

PANS OPS

JAR-OPS STRAIGHT-IN LANDING RWY 24 LNAV

	Missed apch climb grad mim 3.9% MDA(H) 780′ (476′)		Missed apch climb grad mim 2.5% MDA(H) 1260′ (956′)	
		ALS out		ALS out
A	RVR 1200m	RVR 1500m	RVR 1200m	RVR 1500m
B	RVR 1400m		RVR 1400m	
C		RVR 2000m		RVR 2000m
D	RVR 1800m		RVR 1800m	

CIRCLE-TO-LAND

Max Kts	MDA(H)	VIS
100	960′ (656′) 1	1500m
135	990′ (686′) 1	1600m
180	1170′ (866′) 1	2400m
205	1440′ (1136′)	3600m

1 After approach with missed apch climb grad mim 2.5%: MDA(H) 1260′(956′).

CHANGES: Procedure.

FALE/DUR
KING SHAKA INTL

JEPPESEN
17 DEC 10 (23-1)

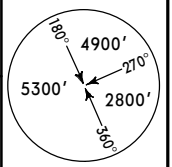
DURBAN, S AFR REP
VOR Z Rwy 06

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP

VOR	Final	Minimum Alt	MDA(H)	Apt Elev 304′
TGV	Apch Crs	D9.6	(CONDITIONAL)	RWY 287′
115.6	065°	3000′ (2713′)	650′ (363′)	

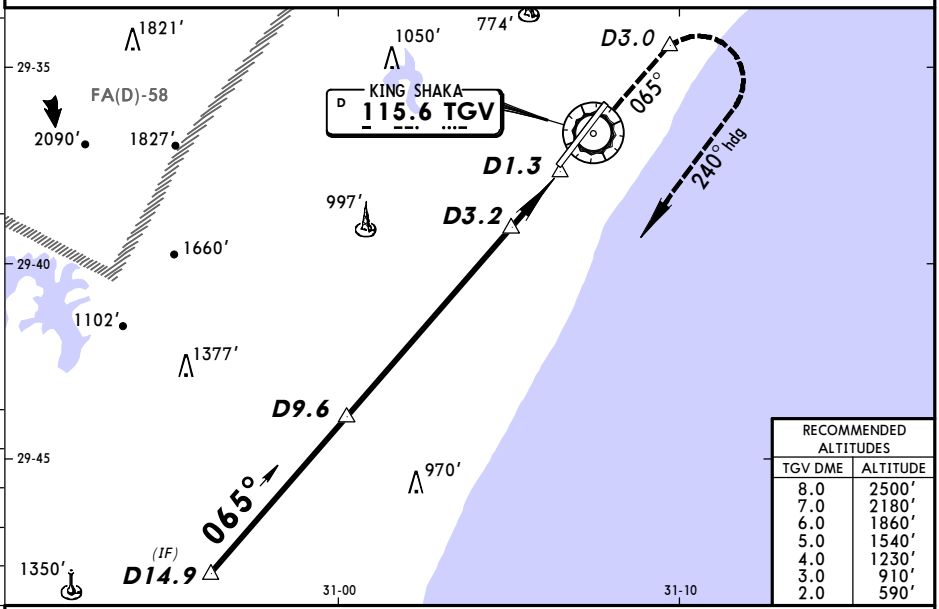
MISSED APCH: Climb STRAIGHT AHEAD on R-065 to D3.0 or 3000′, whichever is later, then turn RIGHT on heading 240° for radar vectors. **MISSED APCH WITH COMM FAILURE:** Climb STRAIGHT AHEAD on R-065 to D3.0 or 3000′, whichever is later, then turn RIGHT on heading 240° to intercept 12 DME Arc westbound. Crossing R-225 turn RIGHT on heading 035° to intercept R-245 and land.



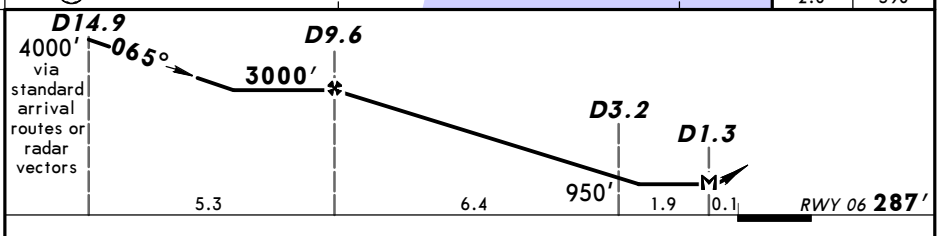
MSA TGV VOR

Alt Set: hPa | Rwy Elev: 10 hPa | Trans level: By ATC | Trans alt: 5500′

1. DME required. 2. CAUTION: High ground West of airport. 3. Procedure only applicable via STAR or radar vectors.



RECOMMENDED ALTITUDES	
TGV DME	ALTITUDE
8.0	2500′
7.0	2180′
6.0	1860′
5.0	1540′
4.0	1230′
3.0	910′
2.0	590′



Gnd speed-Kts	70	90	100	120	140	160
Descent Angle 3.00°	372	478	531	637	743	849
MAP at D1.3						

HIALS-II PAPI PAPI

3000′ | D3.0 whichever is later | TGV via 115.6 R-065

PANS OPS

JAR-OPS STRAIGHT-IN LANDING RWY **06**

	Missed apch climb grad mim 3.6% MDA(H) 650′ (363′)		Missed apch climb grad mim 2.5% MDA(H) 1920′ (1633′)	
		ALS out		ALS out
A	RVR 900m	RVR 1500m	RVR 1200m	RVR 1500m
B	RVR 1000m		RVR 1400m	
C		RVR 1800m		RVR 2000m
D	RVR 1400m	RVR 2000m	RVR 1800m	

CIRCLE-TO-LAND 1

ENTIRELY AT PILOTS DISCRETION

Max Kts	MDA(H)	VIS
100	2 960′ (673′)	1500m
135	2 990′ (703′)	1600m
180	2 1170′ (883′)	2400m
205	2 1440′ (1153′)	3600m

1 Circling height based on rwy 06 thresh elev of 287′.
2 After missed apch climb grad mim 2.5%: MDA(H) 1920′ (1633′).

CHANGES: None.

FALE/DUR
KING SHAKA INTL

JEPPESEN
17 DEC 10 (23-2)

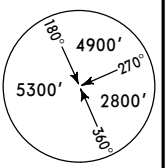
DURBAN, S AFR REP
VOR Z Rwy 24

D-ATIS	DURBAN Approach	KING SHAKA INTL Tower	Ground	APRON Control
127.0	125.75	118.45	121.65	122.65

BRIEFING STRIP TM

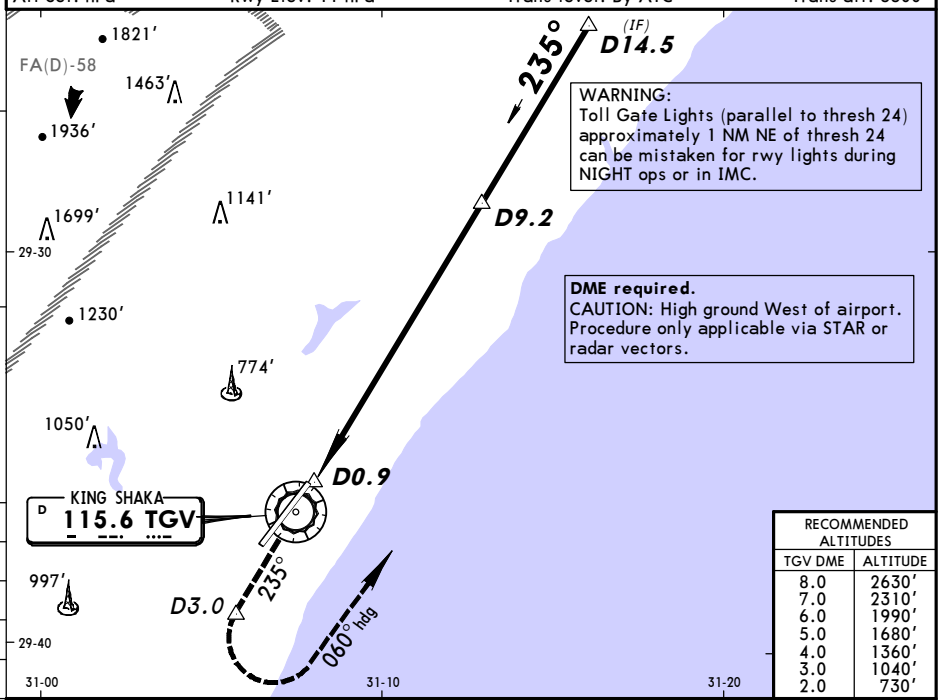
VOR	Final Apch Crs	Minimum Alt	MDA(H)	Apt Elev 304′
TGV		D9.2	(CONDITIONAL)	RWY 301′
115.6	235°	3000′ (2699′)	870′ (569′)	

MISSED APCH: Climb STRAIGHT AHEAD on R-235 to D3.0 or 3000′, whichever is later, then turn LEFT on heading 060° for radar vectors. **MISSED APCH WITH COMM FAILURE:** Climb STRAIGHT AHEAD on R-235 to D3.0 or 3000′, whichever is later, then turn LEFT on heading 060° to intercept 12 DME Arc westbound. Crossing R-074 turn LEFT on heading 215° to intercept R-055 and land.

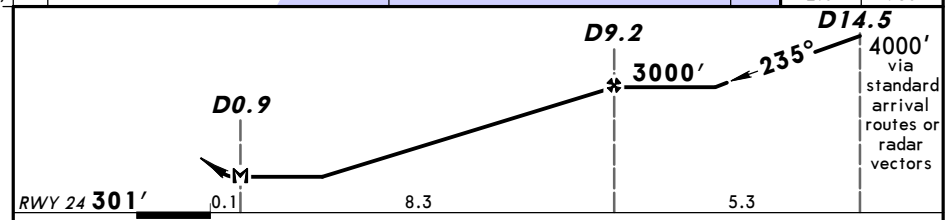


MSA TGV VOR

Alt Set: hPa | Rwy Elev: 11 hPa | Trans level: By ATC | Trans alt: 5500′



RECOMMENDED ALTITUDES	
TGV DME	ALTITUDE
8.0	2630′
7.0	2310′
6.0	1990′
5.0	1680′
4.0	1360′
3.0	1040′
2.0	730′



Gnd speed-Kts	70	90	100	120	140	160
Descent Angle 3.00°	372	478	531	637	743	849
MAP at D0.9						

HIALS-II
PAPI PAPI

3000′ whichever is later | D3.0 | TGV via 115.6 R-235

PANS OPS

JAR-OPS

STRAIGHT-IN LANDING RWY 24

	Missed apch climb grad mim 3.2% MDA(H) 870′ (569′)		Missed apch climb grad mim 2.5% MDA(H) 1300′ (999′)	
		ALS out		ALS out
A	RVR 1000m	RVR 1500m	RVR 1200m	RVR 1500m
B	RVR 1200m		RVR 1400m	
C		RVR 2000m		RVR 2000m
D	RVR 1600m		RVR 1800m	

CIRCLE-TO-LAND[1]

ENTIRELY AT PILOTS DISCRETION

Max Kts	MDA(H)	VIS
100	[2] 960′ (659′)	1500m
135	[2] 990′ (689′)	1600m
180	[2] 1170′ (869′)	2400m
205	1440′ (1139′)	3600m

[1] Circling height based on rwy 24 thresh elev of 301′.
[2] After missed apch climb grad mim 2.5%: MDA(H) 1300′ (999′).

CHANGES: Warning note.