

List of pages in this Trip Kit

Trip Kit Index

Airport Information For ENTC

Terminal Charts For ENTC

Revision Letter For Cycle 18-2021

Change Notices

Notebook

General Information

Location: TROMSO NOR
ICAO/IATA: ENTC / TOS
Lat/Long: N69° 40.9', E018° 55.1'
Elevation: 32 ft

Airport Use: Public
Daylight Savings: Observed
UTC Conversion: -1:00 = UTC
Magnetic Variation: 10.0° E

Fuel Types: 100 Octane (LL), Jet A-1
Repair Types: Minor Airframe, Minor Engine
Customs: Yes
Airport Type: IFR
Landing Fee: Yes
Control Tower: Yes
Jet Start Unit: No
LLWS Alert: No
Beacon: No

Sunrise: 0356 Z
Sunset: 1724 Z

Runway Information

Runway: 18
Length x Width: 8041 ft x 148 ft
Surface Type: asphalt
TDZ-Elev: 15 ft
Lighting: Edge, ALS, Centerline
Displaced Threshold: 1283 ft

Runway: 36
Length x Width: 8041 ft x 148 ft
Surface Type: asphalt
TDZ-Elev: 27 ft
Lighting: Edge, ALS, Centerline
Displaced Threshold: 184 ft

Communication Information

ATIS: 126.125
Tromso Tower: 118.300
Tromso Approach: 123.750

JEPPESEN
19 MAR 21 10-2A Eff: 25 Mar

ENTC/TOS
LANGNES

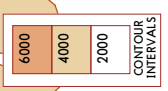
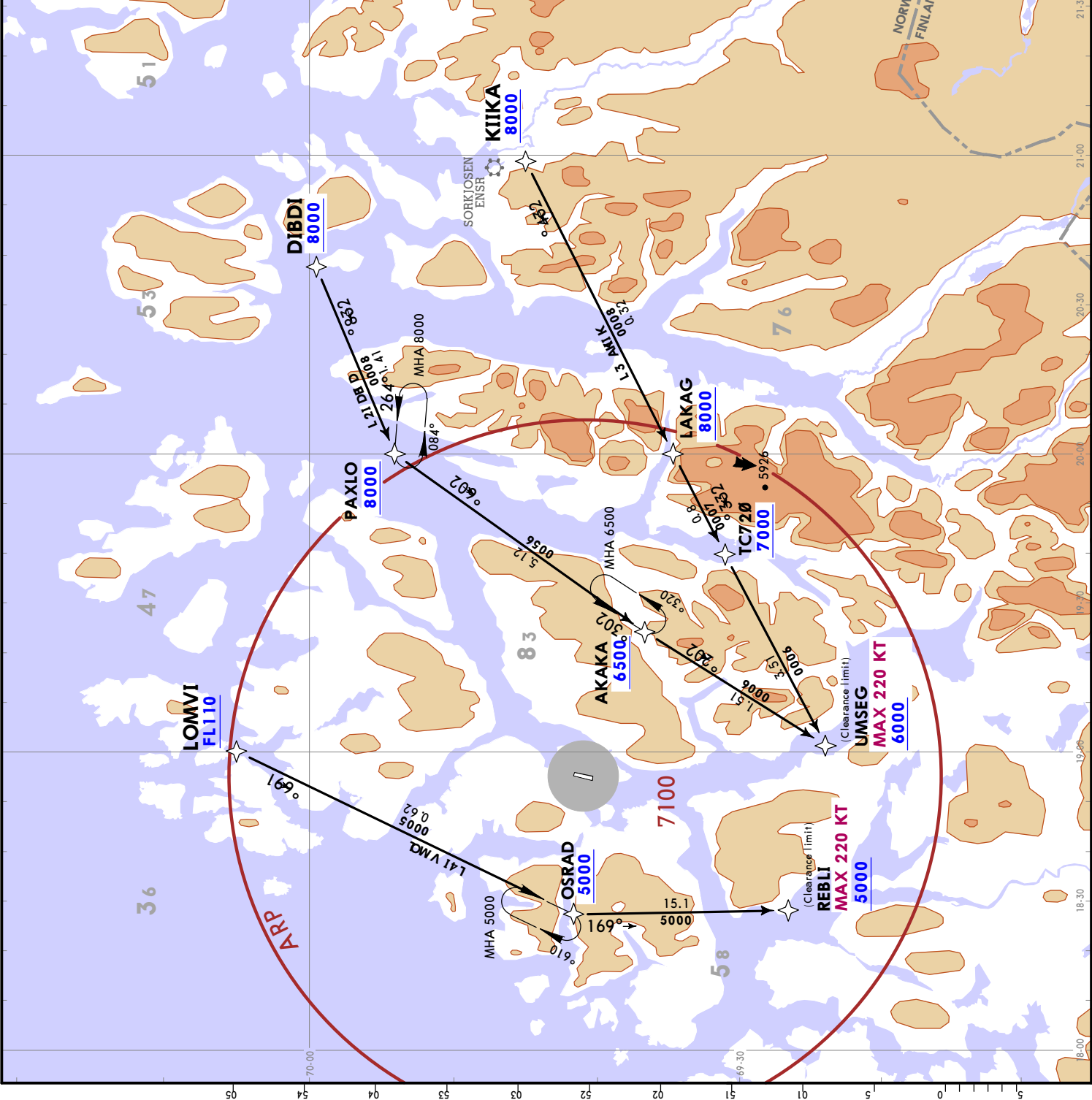
TROMSO, NORWAY
RNAV STAR

*ATIS 126.125 Apt Elev 32
 Alt Set: hPa Trans level: By ATC
 1. RNAV 1.
 2. GNSS required.
 3. RADAR service shall be available.
 4. Loss of RNAV 1 capability, request vectoring.
 5. Vectoring may be used for sequencing to final when necessary.
 6. Descend as cleared by ATC.

DIBDI 2L [DIBD2L]
 KIIKA 3L [KIIKA3L]
 LOMVI 4L [LOMV4L]
 RNAV ARRIVALS
 (RWY 36)

LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼ LOST
 Proceed on STAR and start approach to RWY 36 without delay.
 LOST COMMS ▲ LOST COMMS ▲ LOST COMMS ▲ LOST

STAR	ROUTING
DIBDI 2L	DIBDI - PAXLO - AKAKA - UMSEG.
KIIKA 3L	KIIKA - LAKAG - TC720 - UMSEG.
LOMVI 4L	LOMVI - OSRAD - REBLI.



ENTC/TOS
LANGNES

JEPPESSEN
19 MAR 21 (10-2D) Eff 25 Mar

TROMSO, NORWAY
STAR

*ATIS 126.125	Apt Elev 32	Alt Set: hPa Trans level: By ATC 1. RADAR service shall be available. 2. Vectoring will be used for sequencing. 3. Descent as cleared by ATC.
------------------	----------------	---

LURAP 5L [LURA5L], SENJA 9M (SJA 9M) [SJA9M]
ARRIVALS
(ALL RWYS)



STAR	RWY	ROUTING
LURAP 5L	36	Intercept 015° bearing to KBV.
SJA 9M	18	Intercept 010° bearing via GIBMO to MACKA, turn RIGHT, along D13.0 Arc TRO, when passing TRO R343 turn RIGHT, intercept TR LOC or 183° bearing to KV.

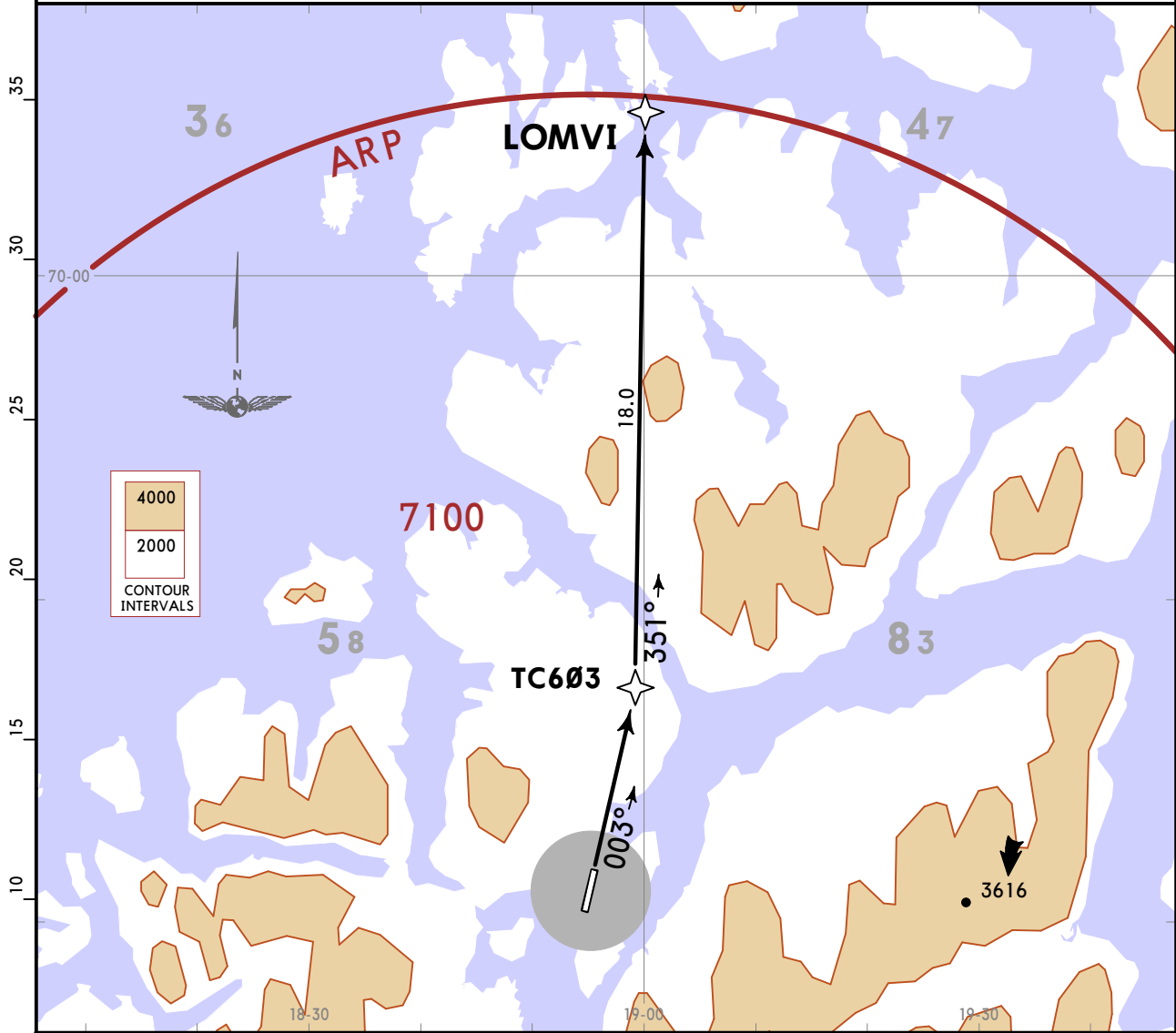
ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3 Eff 25 Mar

TROMSO, NORWAY
RNAV SID

*TROMSO Approach 123.750	Trans alt: 7000 1. RNAV 1. 2. GNSS required. 3. Surveillance service shall be available. 4. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available. 5. When vectored or cleared for direct routing the SID climb gradients apply.
Apt Elev 32	

LOMVI 7A RNAV DEPARTURE
[LOMV7A]
(RWY 36)



Close-In Obstacles

Vegetation close to THR 18 requires more than 7.5% climb gradient, and must be avoided visually or by other means.

This SID requires minimum climb gradients of 6.0% (365 per NM) up to 5000 to stay within controlled airspace and/or due to ATC restriction.
6.0% (365 per NM) up to 1800 due to obstacle.

Gnd speed-KT	75	100	150	200	250	300
6.0% V/V (fpm)	456	608	911	1215	1519	1823

If unable to comply inform ATC.

- ▼ LOST COMMS ▼ LOST COMMS ▼ LOST COMMS
- ▶ Maintain last assigned level for two minutes, then climb to the cruising level stated in CPL.
- ▶ ACFT under RADAR vectoring shall proceed in the most direct manner possible to rejoin the current flight plan route no later than the next significant point, climbing to the cruising level stated in CPL taking into consideration the applicable minimum flight altitude.
- ▶ LOST COMMS ▲ LOST COMMS ▲ LOST COMMS

Initial climb clearance **FL90**

ROUTING

On 003° track to TC603 - LOMVI.

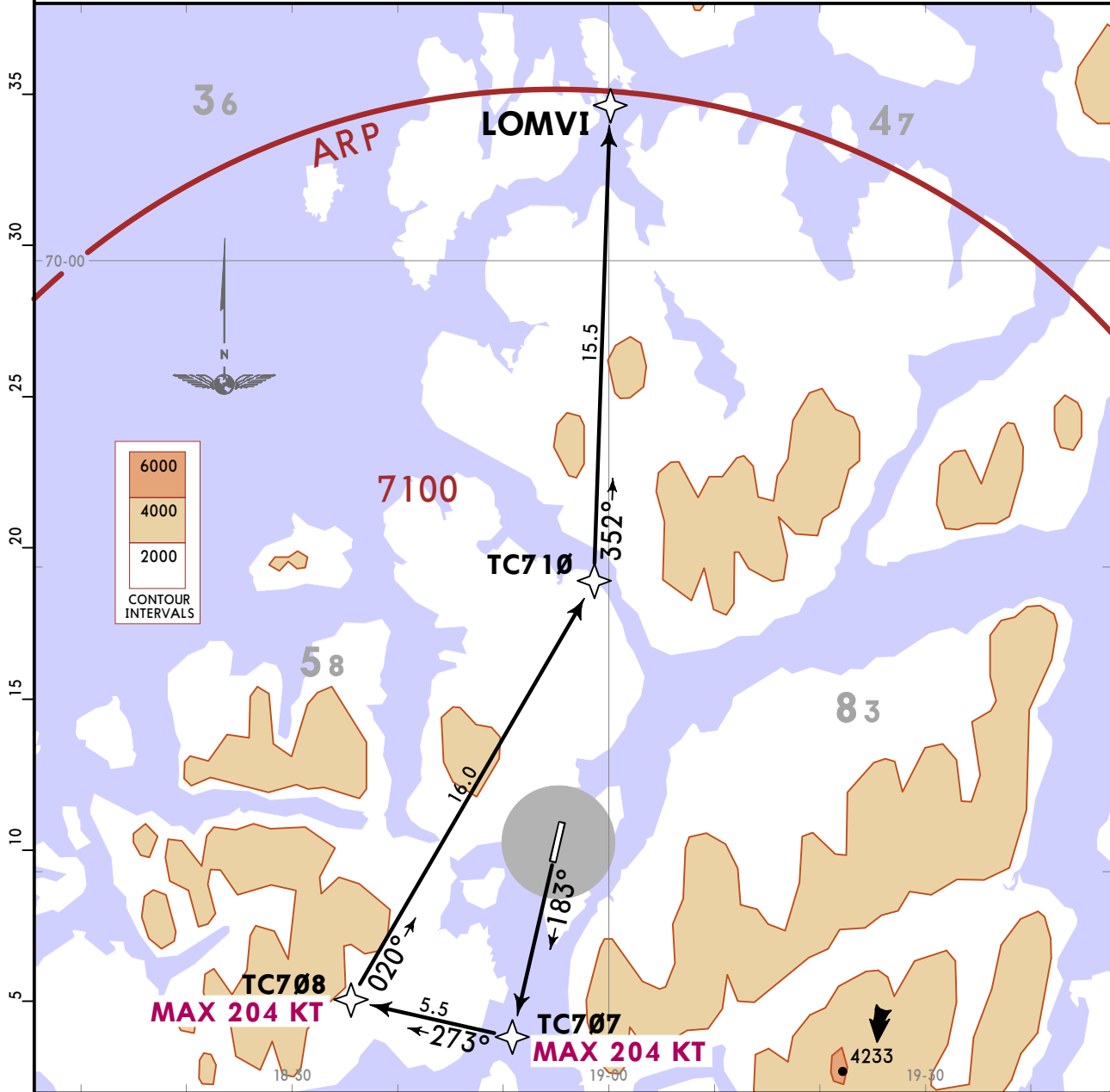
ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 (10-3A) Eff 25 Mar

TROMSO, NORWAY
RNAV SID

*TROMSO Approach 123.750	Trans alt: 7000 1. RNAV 1. 2. GNSS required. 3. Surveillance service shall be available. 4. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available. 5. When vectored or cleared for direct routing the SID climb gradients apply.
Apt Elev 32	

LOMVI 6B RNAV DEPARTURE
[LOMV6B]
(RWY 18)



This SID requires a minimum climb gradient of 7.1% (431 per NM) up to 4000.

Gnd speed-KT	75	100	150	200	250	300
7.1% V/V (fpm)	539	719	1079	1438	1798	2157

If unable to comply inform ATC.

Close-In Obstacles

Vegetation close to THR 36 requires more than 5.6% climb gradient, and must be avoided visually or by other means.

Initial climb clearance **FL90**

ROUTING

On 183° track to TC707 - TC708 - TC710 - LOMVI.

ENTC/TOS
LANGNES

JEPPESEN

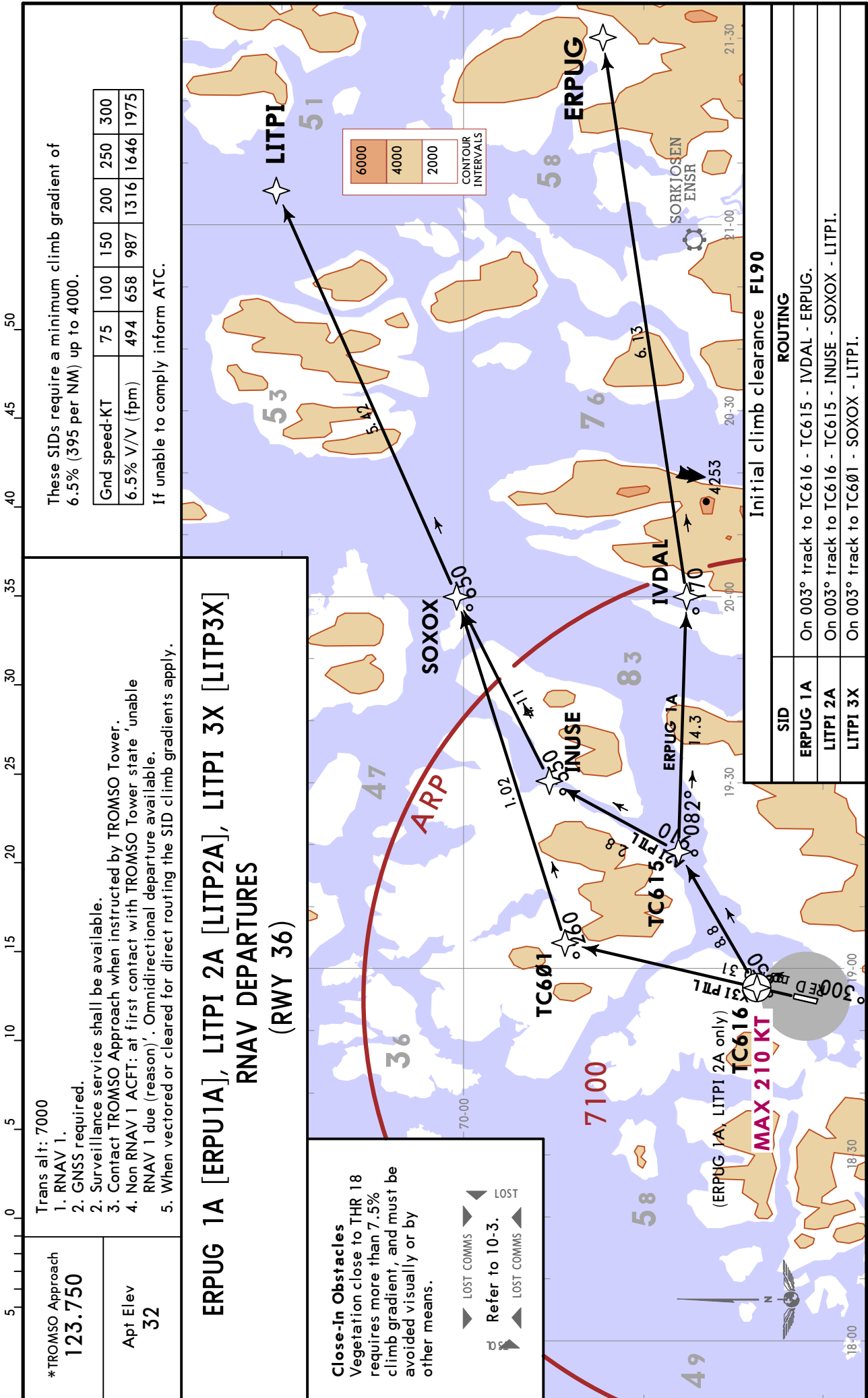
TROMSO, NORWAY

19 MAR 21

10-3B

Eff 25 Mar

RNAV SID



ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3C Eff 25 Mar

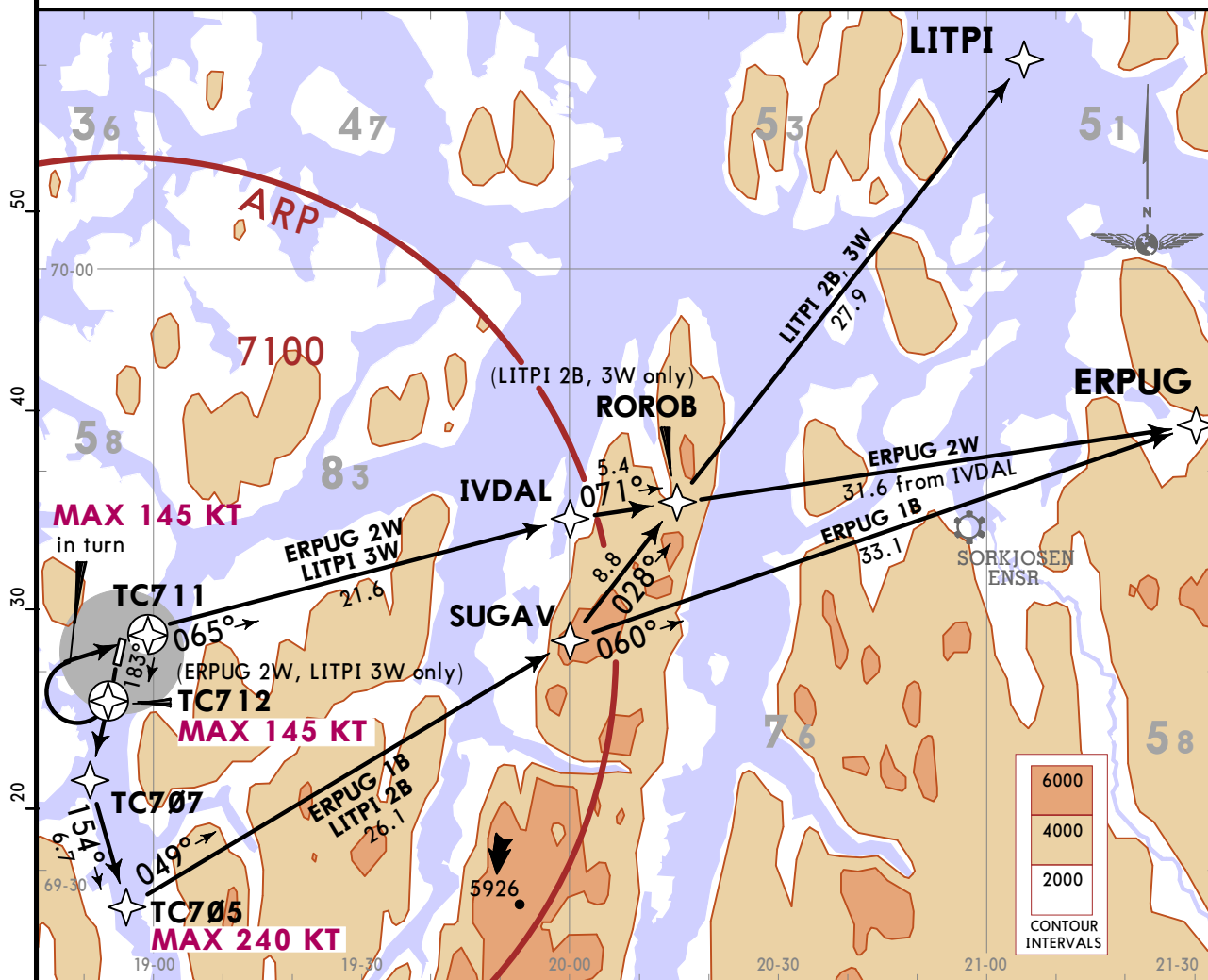
TROMSO, NORWAY
RNAV SID

*TROMSO Approach
123.750

Apt Elev
32

- Trans alt: 7000
1. RNAV 1.
 2. GNSS required.
 3. Surveillance service shall be available.
 4. Contact TROMSO Approach when instructed by TROMSO Tower.
 5. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available.
 6. When vectored or cleared for direct routing the SID climb gradients apply.

ERPUG 1B [ERPU1B], ERPUG 2W [ERPU2W]
LITPI 2B [LITP2B], LITPI 3W [LITP3W]
RNAV DEPARTURES (RWY 18)



Close-In Obstacles

Vegetation close to THR 36 requires more than 5.6% climb gradient, and must be avoided visually or by other means.

These SIDs require minimum climb gradients of

ERPUG 1B, LITPI 2B

6.2% (377 per NM) up to 5200.

ERPUG 2W, LITPI 3W

9.8% (595 per NM) up to 900, then

6.5% (395 per NM) up to 2500.



Gnd speed-KT	75	100	150	200	250	300
6.2% V/V (fpm)	471	628	942	1256	1570	1884
6.5% V/V (fpm)	494	658	987	1316	1646	1975
9.8% V/V (fpm)	744	992	1489	1985	2481	2977

If unable to comply inform ATC.

Initial climb clearance FL90

SID	ROUTING
ERPUG 1B	On 183° track to TC707 - TC705 - SUGAV - ERPUG.
ERPUG 2W CAT A & B	On 183° track to TC712 - TC711 - IVDAL - ERPUG.
LITPI 2B	On 183° track to TC707 - TC705 - SUGAV - ROROB - LITPI.
LITPI 3W CAT A & B	On 183° track to TC712 - TC711 - IVDAL - ROROB - LITPI.

ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3D Eff 25 Mar

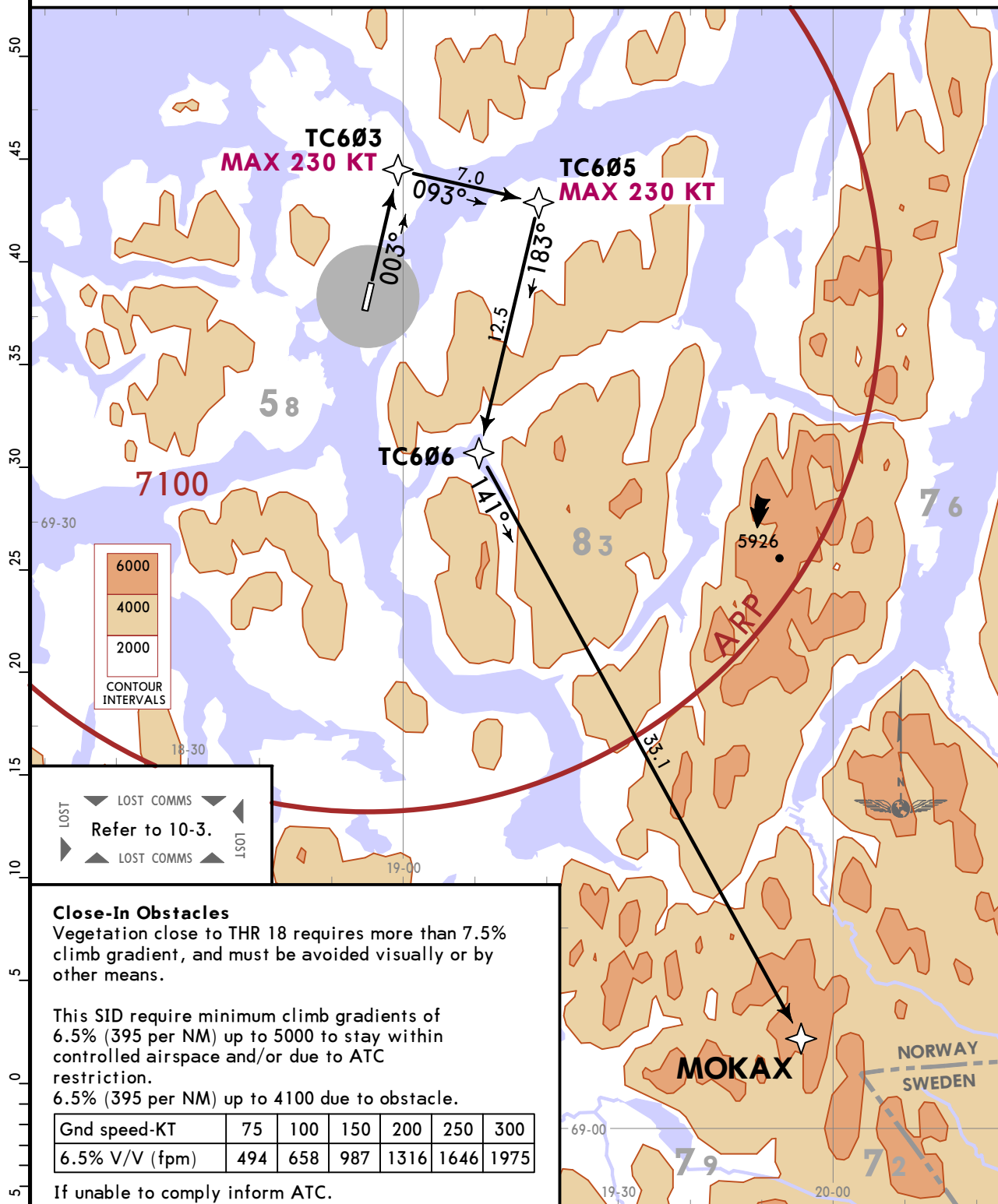
TROMSO, NORWAY
RNAV SID

*TROMSO Approach
123.750

Apt Elev
32

- Trans alt: 7000
1. RNAV 1.
 2. GNSS required.
 3. Surveillance service shall be available.
 4. Contact TROMSO Approach when instructed by TROMSO Tower.
 5. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available.
 6. When vectored or cleared for direct routing the SID climb gradients apply.

MOKAX 1A RNAV DEPARTURE
[MOKA1A]
(RWY 36)



Initial climb clearance **FL90**

ROUTING

On 003° track to TC603 - TC605 - TC606 - MOKAX.

ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3E Eff 25 Mar

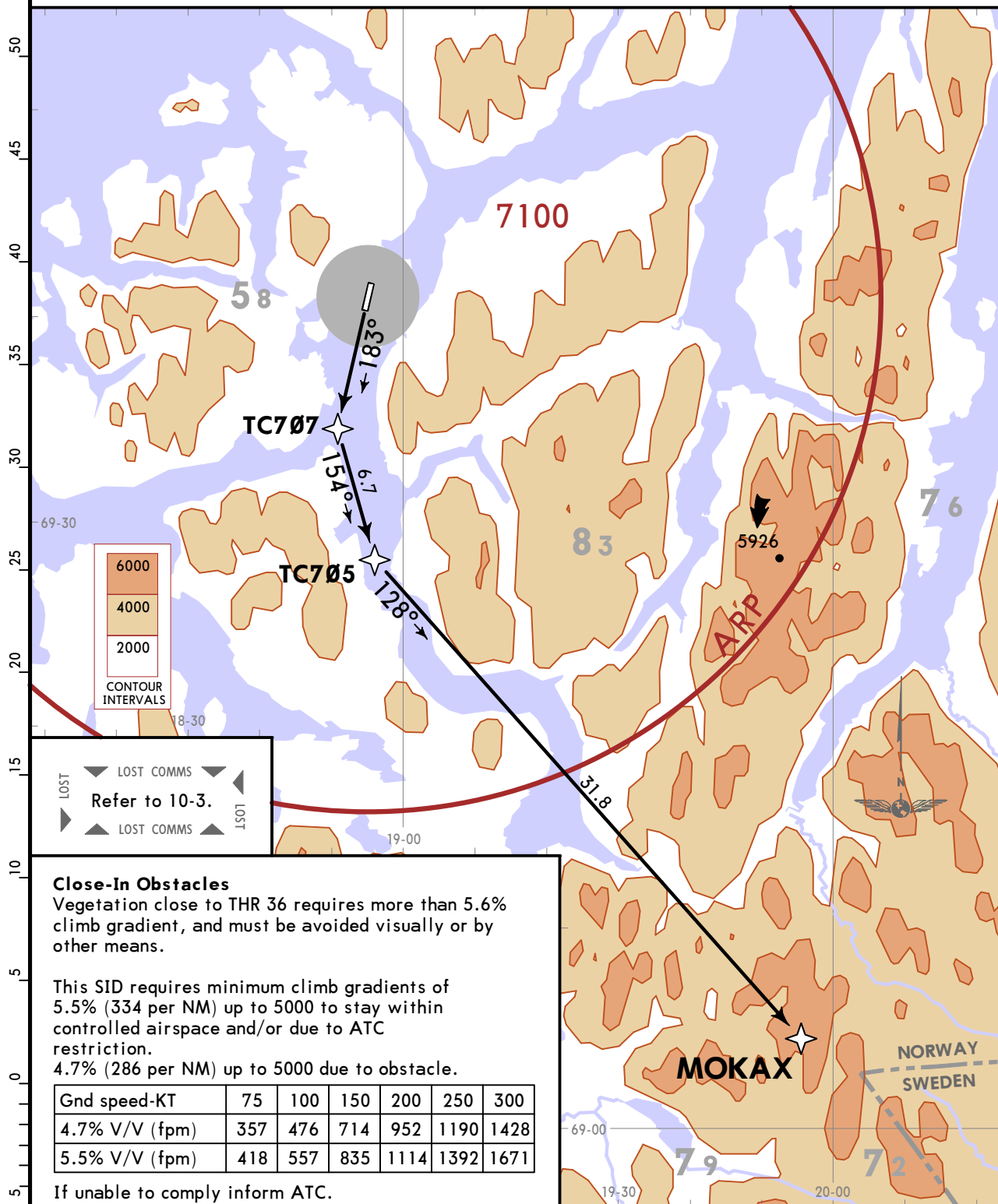
TROMSO, NORWAY
RNAV SID

*TROMSO Approach
123.750

Apt Elev
32

- Trans alt: 7000
1. RNAV 1.
 2. GNSS required.
 3. Surveillance service shall be available.
 4. Contact TROMSO Approach when instructed by TROMSO Tower.
 5. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available.
 6. When vectored or cleared for direct routing the SID climb gradients apply.

MOKAX 1B RNAV DEPARTURE
[MOKA1B]
(RWY 18)



LOST COMMS
Refer to 10-3.
LOST COMMS

Close-In Obstacles
Vegetation close to THR 36 requires more than 5.6% climb gradient, and must be avoided visually or by other means.

This SID requires minimum climb gradients of 5.5% (334 per NM) up to 5000 to stay within controlled airspace and/or due to ATC restriction.
4.7% (286 per NM) up to 5000 due to obstacle.

Gnd speed-KT	75	100	150	200	250	300
4.7% V/V (fpm)	357	476	714	952	1190	1428
5.5% V/V (fpm)	418	557	835	1114	1392	1671

If unable to comply inform ATC.

Initial climb clearance **FL90**

ROUTING

On 183° track to TC707 - TC705 - MOKAX.

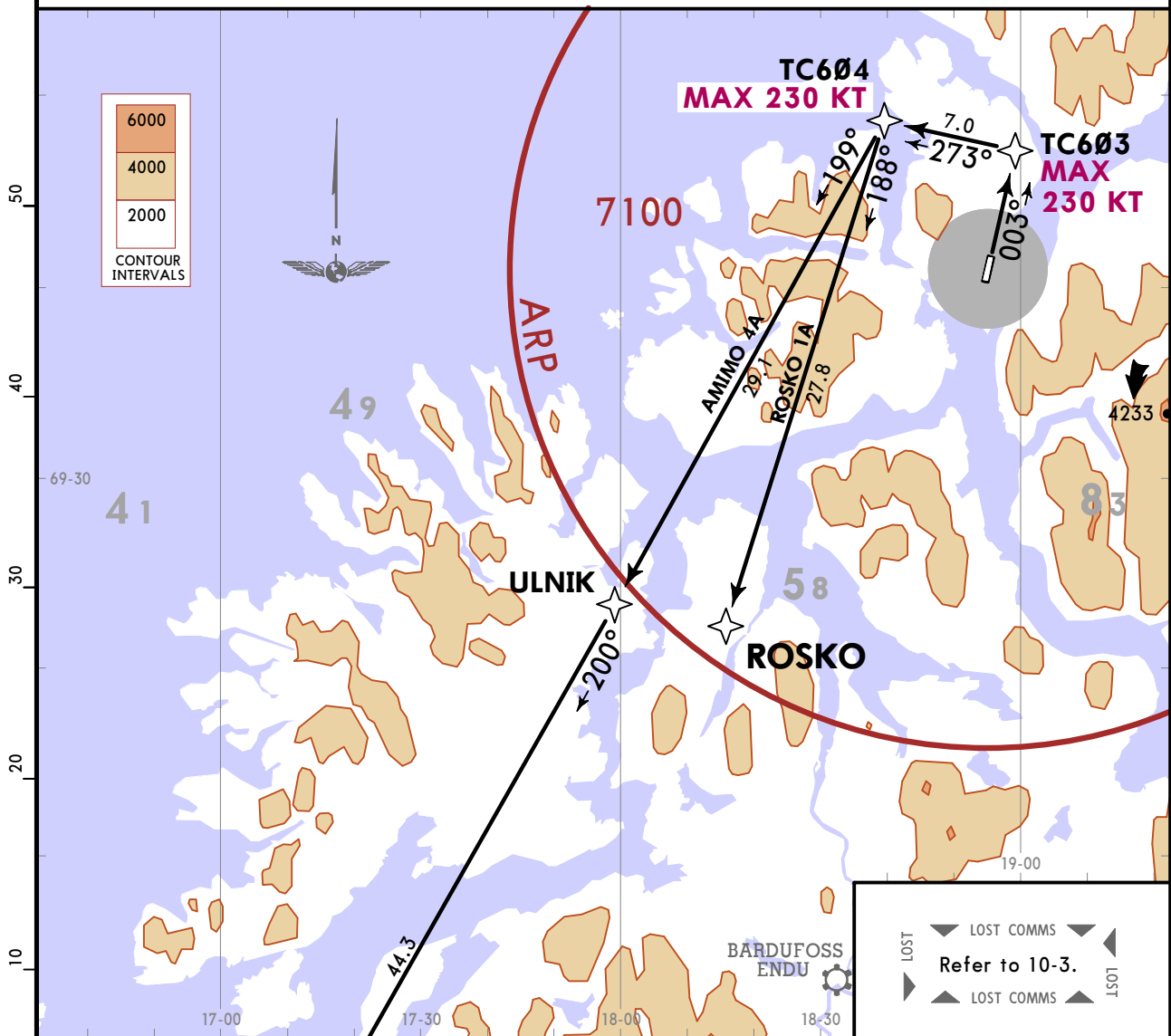
ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3F Eff 25 Mar

TROMSO, NORWAY
RNAV SID

*TROMSO Approach 123.750	Trans alt: 7000 1. RNAV 1. 2. GNSS required. 3. Surveillance service shall be available. 4. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available. 5. When vectored or cleared for direct routing the SID climb gradients apply.
Apt Elev 32	

**AMIMO 4A [AMIM4A], ROSKO 1A [ROSK1A]
RNAV DEPARTURES
(RWY 36)**



NOT TO SCALE



Close-In Obstacles

Vegetation close to THR 18 requires more than 7.5% climb gradient, and must be avoided visually or by other means.

These SIDs require minimum climb gradients of 7.5% (456 per NM) up to 4300 to stay within controlled airspace and/or due to ATC restriction. 7.5% (456 per NM) up to 3500 due to obstacle.

Gnd speed-KT	75	100	150	200	250	300
7.5% V/V (fpm)	570	760	1139	1519	1899	2279

If unable to comply inform ATC.

Initial climb clearance **FL90**

SID	ROUTING
AMIMO 4A	On 003° track to TC603 - TC604 - ULNIK - EVPUS - AMIMO.
ROSKO 1A	On 003° track to TC603 - TC604 - ROSKO.

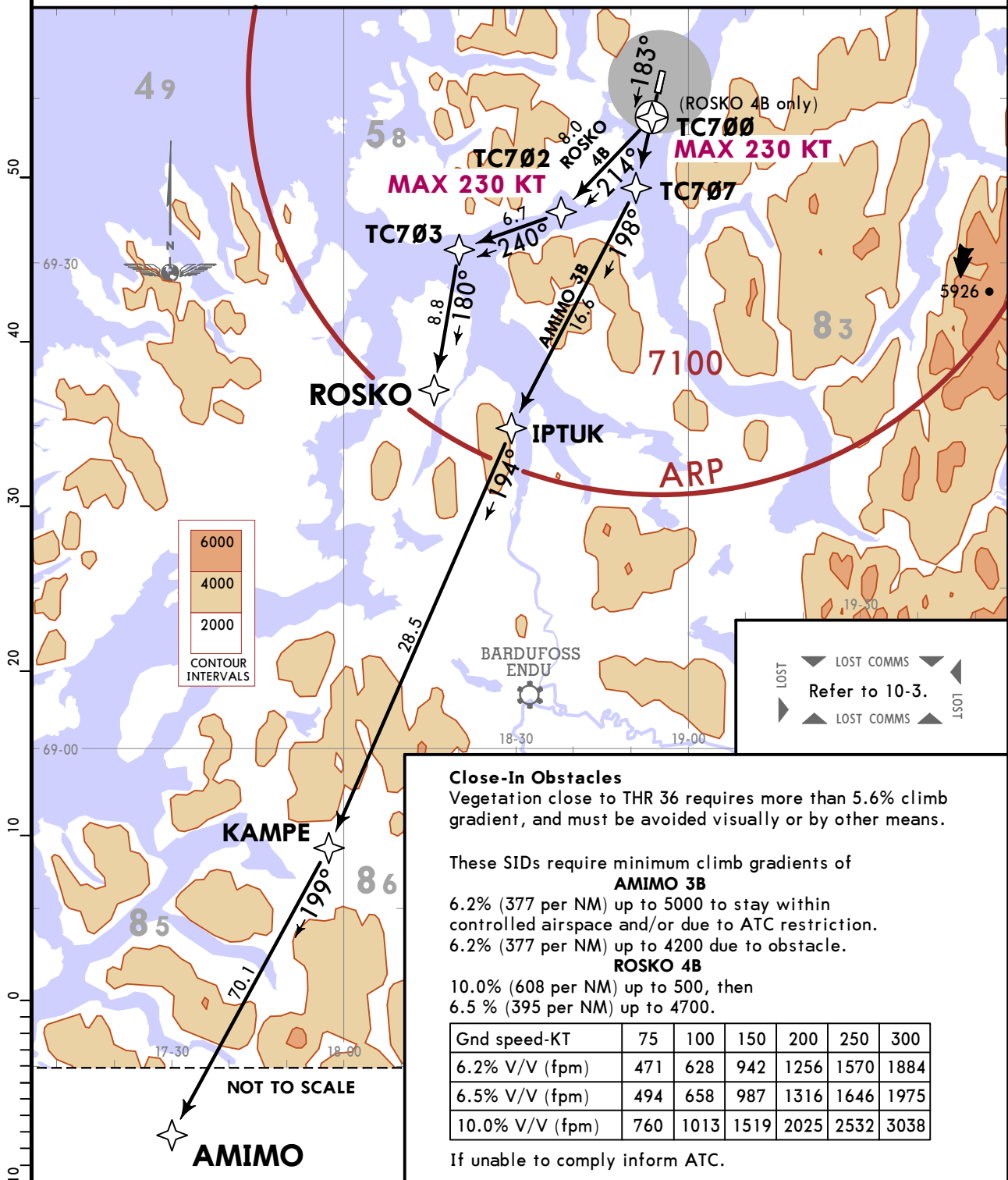
ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 (10-3G) Eff 25 Mar

TROMSO, NORWAY
RNAV SID

*TROMSO Approach 123.750	Trans alt: 7000 1. RNAV 1. 2. GNSS required. 3. Surveillance service shall be available. 4. Contact TROMSO Approach when instructed by TROMSO Tower. 5. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available.
Apt Elev 32	2. When vectored or cleared for direct routing the SID climb gradients apply.

**AMIMO 3B [AMIM3B], ROSKO 4B [ROSK4B]
RNAV DEPARTURES
(RWY 18)**



Close-In Obstacles
Vegetation close to THR 36 requires more than 5.6% climb gradient, and must be avoided visually or by other means.

These SIDs require minimum climb gradients of

AMIMO 3B
6.2% (377 per NM) up to 5000 to stay within controlled airspace and/or due to ATC restriction.
6.2% (377 per NM) up to 4200 due to obstacle.

ROSKO 4B
10.0% (608 per NM) up to 500, then
6.5 % (395 per NM) up to 4700.

Gnd speed-KT	75	100	150	200	250	300
6.2% V/V (fpm)	471	628	942	1256	1570	1884
6.5% V/V (fpm)	494	658	987	1316	1646	1975
10.0% V/V (fpm)	760	1013	1519	2025	2532	3038

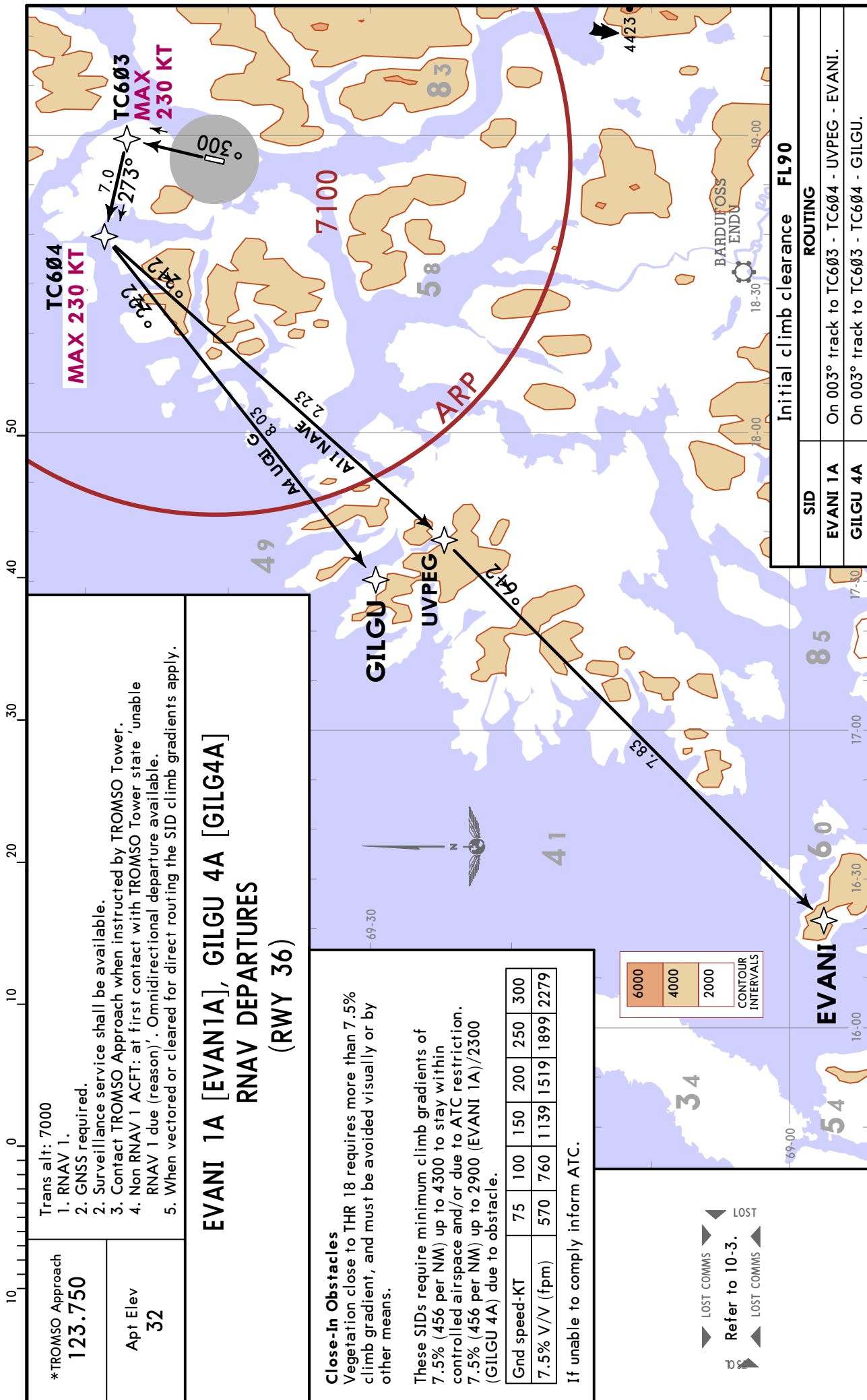
If unable to comply inform ATC.

Initial climb clearance FL90	
SID	ROUTING
AMIMO 3B	On 183° track to TC707 - IPTUK - KAMPE - AMIMO.
ROSKO 4B	On 183° track to TC700 - TC702 - TC703 - ROSKO.

ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3H Eff 25 Mar

TROMSO, NORWAY
RNAV SID



Trans alt: 7000
 1. RNAV 1.
 2. GNSS required.
 3. Surveillance service shall be available.
 4. Contact TROMSO Approach when instructed by TROMSO Tower.
 5. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable RNAV 1 due (reason)'. Omnidirectional departure available.
 6. When vectored or cleared for direct routing the SID climb gradients apply.

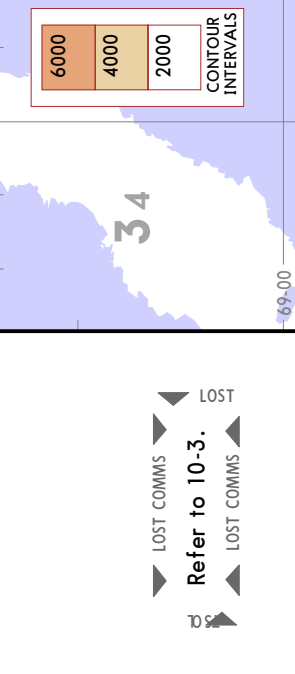
**EVANI 1A [EVANI1A], GILGU 4A [GILG4A]
 RNAV DEPARTURES
 (RWY 36)**

Close-In Obstacles
 Vegetation close to THR 18 requires more than 7.5% climb gradient, and must be avoided visually or by other means.

These SIDs require minimum climb gradients of 7.5% (456 per NM) up to 4300 to stay within controlled airspace and/or due to ATC restriction. 7.5% (456 per NM) up to 2900 (EVANI 1A)/2300 (GILGU 4A) due to obstacle.

Gnd speed-KT	75	100	150	200	250	300
7.5% V/V (fpm)	570	760	1139	1519	1899	2279

If unable to comply inform ATC.

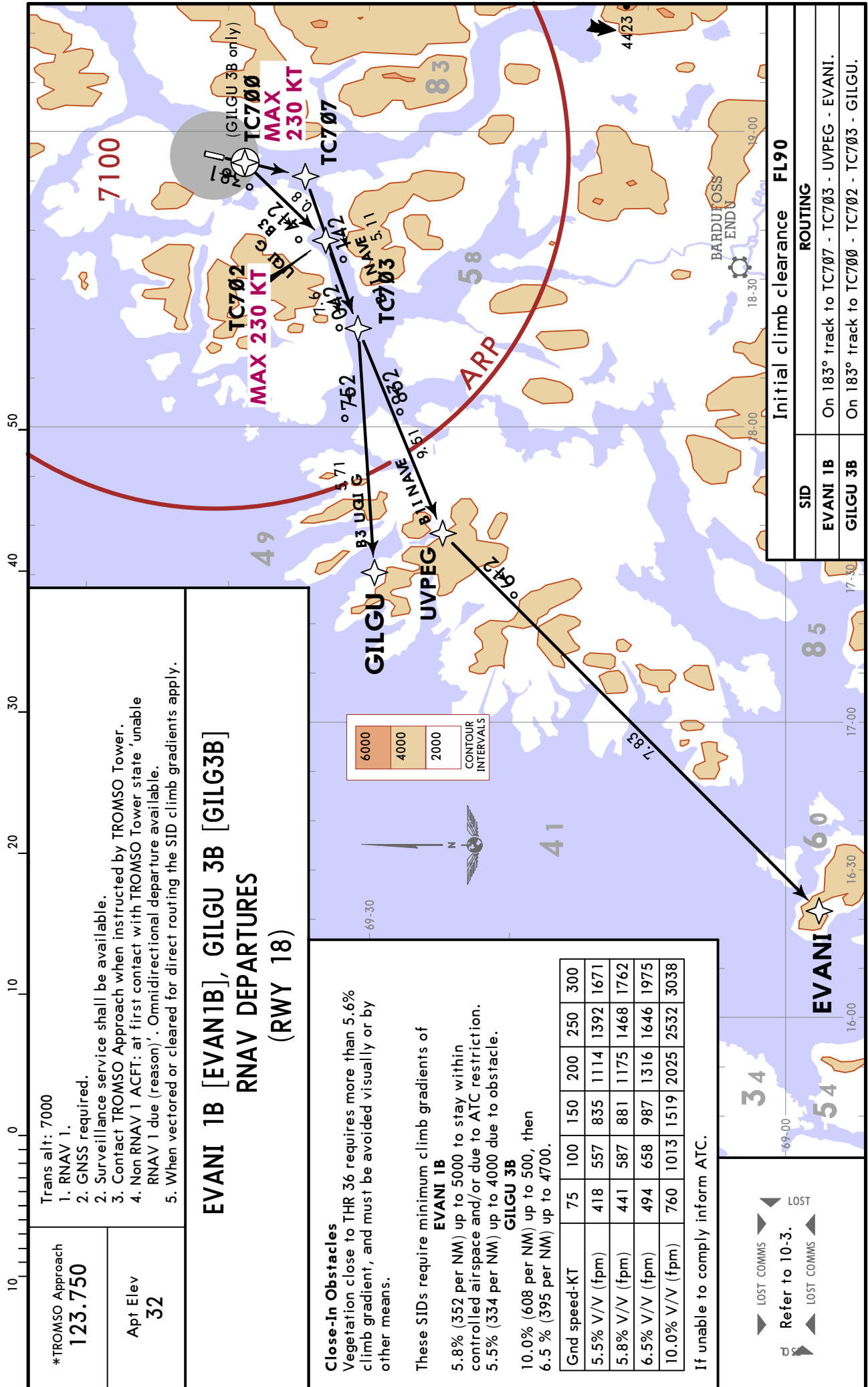


SID	Initial climb clearance	FL90 ROUTING
EVANI 1A	On 003° track to TC603	- TC604 - UVPEG - EVANI.
GILGU 4A	On 003° track to TC603	- TC604 - GILGU.

ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3J Eff 25 Mar

TROMSO, NORWAY
RNAV SID



Trans alt: 7000
 1. RNAV 1.
 2. GNSS required.
 3. Surveillance service shall be available.
 4. Contact TROMSO Approach when instructed by TROMSO Tower.
 5. Contact TROMSO Tower state 'unable' at first contact with TROMSO Tower state 'unable' due to 'reason'.
 6. Non RNAV 1 ACFT: at first contact with TROMSO Tower state 'unable' due to 'reason'.
 7. Omnidirectional departure available.
 8. When vectored or cleared for direct routing the SID climb gradients apply.

**EVANI 1B [EVAN1B], GILGU 3B [GILG3B]
 RNAV DEPARTURES
 (RWY 18)**

Close-In Obstacles
 Vegetation close to THR 36 requires more than 5.6% climb gradient, and must be avoided visually or by other means.

These SIDs require minimum climb gradients of

EVANI 1B
 5.8% (352 per NM) up to 5000 to stay within controlled airspace and/or due to ATC restriction.
 5.5% (334 per NM) up to 4000 due to obstacle.

GILGU 3B
 10.0% (608 per NM) up to 500, then
 6.5% (395 per NM) up to 4700.

Gnd speed-KT	75	100	150	200	250	300
5.5% V/V (fpm)	418	557	835	1114	1392	1671
5.8% V/V (fpm)	441	587	881	1175	1468	1762
6.5% V/V (fpm)	494	658	987	1316	1646	1975
10.0% V/V (fpm)	760	1013	1519	2025	2532	3038

If unable to comply inform ATC.

LOST COMMS
 Refer to 10-3.
 LOST COMMS

SID	Initial climb clearance FL90	
	ROUTING	ROUTING
EVANI 1B	On 183° track to TC707 - TC703 - UVPEG - EVANI.	
GILGU 3B	On 183° track to TC700 - TC702 - TC703 - GILGU.	

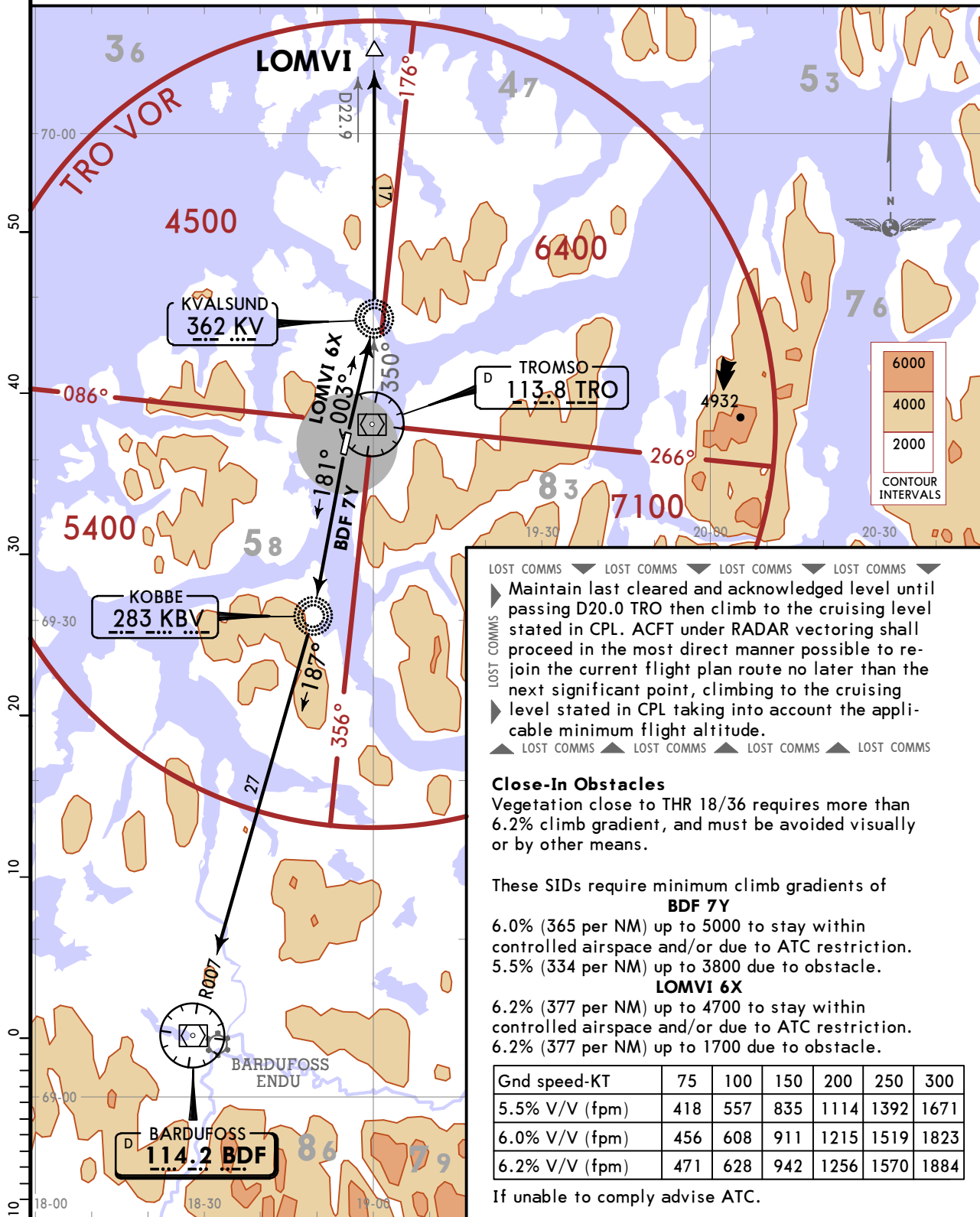
ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 10-3K Eff 25 Mar

TROMSO, NORWAY
SID

*TROMSO Approach 123.750	Apt Elev 32	Trans alt: 7000 1. Surveillance service shall be available. 2. Contact TROMSO Approach when instructed by TROMSO Tower. 3. When vectored or cleared for direct routing the SID climb gradients apply.
-----------------------------	----------------	--

**BARDUFLOSS 7Y (BDF 7Y) [BDF7Y], LOMVI 6X [LOMV6X]
DEPARTURES
(ALL RWYS)**



LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼ LOST COMMS ▼
 ▶ Maintain last cleared and acknowledged level until passing D20.0 TRO then climb to the cruising level stated in CPL. ACFT under RADAR vectoring shall proceed in the most direct manner possible to re-join the current flight plan route no later than the next significant point, climbing to the cruising level stated in CPL taking into account the applicable minimum flight altitude.
 ▲ LOST COMMS ▲ LOST COMMS ▲ LOST COMMS ▲ LOST COMMS ▲

Close-In Obstacles
 Vegetation close to THR 18/36 requires more than 6.2% climb gradient, and must be avoided visually or by other means.

These SIDs require minimum climb gradients of
BDF 7Y
 6.0% (365 per NM) up to 5000 to stay within controlled airspace and/or due to ATC restriction.
 5.5% (334 per NM) up to 3800 due to obstacle.
LOMVI 6X
 6.2% (377 per NM) up to 4700 to stay within controlled airspace and/or due to ATC restriction.
 6.2% (377 per NM) up to 1700 due to obstacle.

Gnd speed-KT	75	100	150	200	250	300
5.5% V/V (fpm)	418	557	835	1114	1392	1671
6.0% V/V (fpm)	456	608	911	1215	1519	1823
6.2% V/V (fpm)	471	628	942	1256	1570	1884

If unable to comply advise ATC.

Initial climb clearance FL90		
SID	RWY	ROUTING
BDF 7Y	18	Climb on 181° bearing to KBV, intercept BDF R007 inbound to BDF.
LOMVI 6X	36	Climb on 003° bearing to KV, intercept TRO R350 to LOMVI.

ENTC/TOS
LANGNES

JEPPESEN
19 MAR 21 (10-3L) Eff 25 Mar

TROMSO, NORWAY
DEPARTURE

*TROMSO Approach 123.750	Apt Elev 32	Trans alt: 7000 1 Contact TROMSO Approach when instructed by TROMSO Tower. 2. When vectored or cleared for direct routing the departure climb gradients apply.
--------------------------------	----------------	--

**OMNI 2A, OMNI 3B
OMNIDIRECTIONAL DEPARTURES
(ALL RWYS)
EXPECT RADAR VECTERING BY TROMSO APPROACH TO JOIN
THE CLEARED ATS ROUTE**

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

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

RWY 18: Climb on 183° track to D8.0 TC, then proceed in the most direct manner possible to join the current flight plan route, climbing to the cruising level stated in CPL.
ACFT under RADAR vectoring shall proceed in the most direct route to join the current flight plan route, climbing to the cruising level stated in CPL.

RWY 36: Climb on 003° track to D6.0 TR, then proceed in the most direct manner possible to join the current flight plan route, climbing to the cruising level stated in CPL.
ACFT under RADAR vectoring shall proceed in the most direct route to join the current flight plan route, climbing to the cruising level stated in CPL.

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

These departures require minimum climb gradients of

- Rwy 18:** 8.1% (492 per NM) up to 4500.
- Rwy 36:** 7.5% (456 per NM) up to 3500.

Gnd speed-KT	75	100	150	200	250	300
7.5% V/V (fpm)	570	760	1139	1519	1899	2279
8.1% V/V (fpm)	615	820	1230	1641	2051	2461

If unable to comply advise ATC.

Initial climb clearance FL90

SID	RWY	ROUTING
OMNI 2A	36	Climb on 003° track to D6.0 TR. Start turn when cleared by ATC.
OMNI 3B	18	Climb on 183° track to D8.0 TC. Start turn when cleared by ATC.

ENTC/TOS

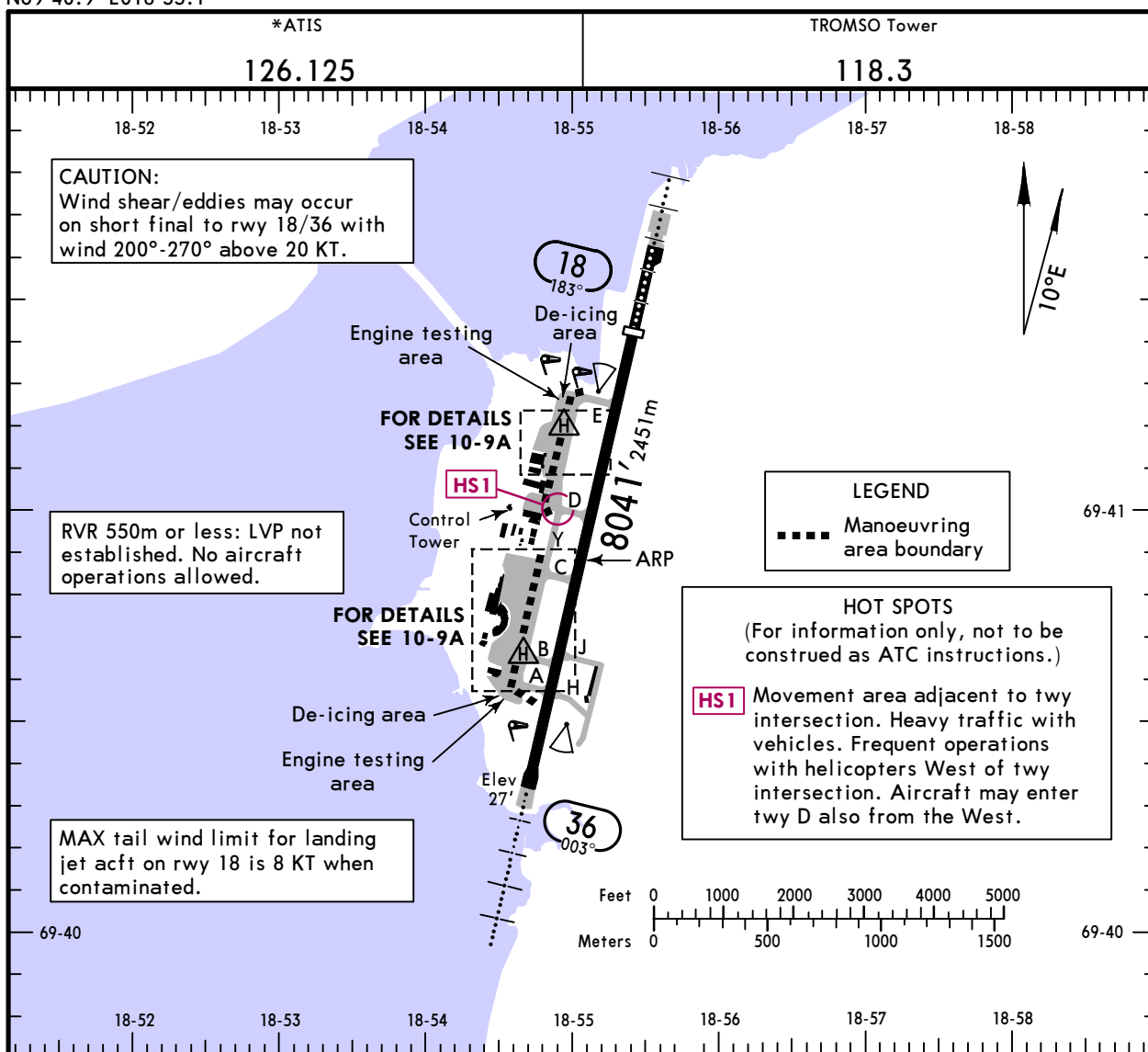
Apt Elev **32'**
N69 40.9 E018 55.1



12 MAR 21 **(10-9)** Eff 25 Mar

TROMSO, NORWAY

LANGNES



ADDITIONAL RUNWAY INFORMATION

RWY	SURFACE	SLOPE	PAPI	RVR	USABLE LENGTHS		TAKE-OFF	WIDTH
					Threshold	Glide Slope		
18 ① 36	HIRL (60m) CL (60m) HIALS SFL PAPI (4.0°)				6575' 2004m	5785' 1763m	②	148' 45m
					7858' 2395m	7190' 2192m		

① Rwy 18/36 grooved.

② TAKE-OFF RUN AVAILABLE

RWY 18:

from rwy head	7858' (2395m)
twy E int	5528' (1685m)
twy D int	3855' (1175m)
twy C int	2913' (888m)

RWY 36:

from rwy head	8041' (2451m)
twy A int	6670' (2033m)
twy H int	6660' (2030m)
twy B int	6250' (1905m)
twy J int	6086' (1855m)
twy C int	5016' (1529m)
twy D int	4049' (1234m)

NOISE ABATEMENT PROCEDURE

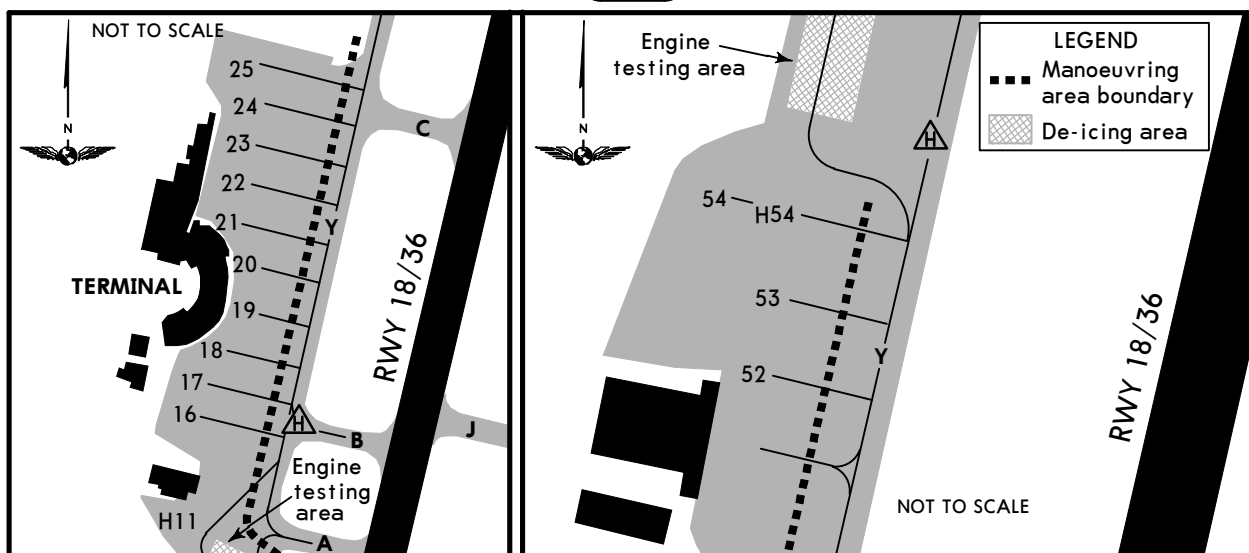
Aircraft with MTOM 2500 KG or more, shall not overfly island of Tromsoya below 2000'.

Standard

TAKE-OFF

--

A	RVR 550m
B	
C	
D	



INS COORDINATES

STAND No.	COORDINATES	ELEVATION
16	N69 40.7 E018 54.4	29
17	N69 40.7 E018 54.5	30
18	N69 40.7 E018 54.5	31
19	N69 40.7 E018 54.6	30
20	N69 40.8 E018 54.6	29
21	N69 40.8 E018 54.5	27
22, 23	N69 40.8 E018 54.6	27
24, 25	N69 40.9 E018 54.6	27
52	N69 41.1 E018 54.8	17
53	N69 41.2 E018 54.9	15
54	N69 41.2 E018 54.8	13
Heli stands		
H11	N69 40.6 E018 54.5	27
H54	N69 41.2 E018 54.8	13

Special requirements for aircraft operators performing commercial transportation

The aircraft operator shall stipulate special crew qualification requirements, REF EASA AMC1 ORO.FC.105.

For operations with jet ACFT in PANS OPS code C/D:

- 1 OCT - 30 APR: CAT C
- 1 MAY - 30 SEP: CAT B.

For operations with other types of aircraft: CAT B required all year round.

The aircraft operator shall stipulate special limitations with regard to surface wind.

The aircraft operator shall stipulate special requirements with regard to runway status.

Departure procedures, take-off minima, take-off weight limitations shall be documented.

The aircraft operator shall document fulfilment of the requirements above to CAA Norway at least 14 days prior to commencing operations. CAA Norway will, after evaluating the documentation and finding it adequate, issue a letter of compliance. A copy of this letter has to be carried by the crew and presented to local airport authorities or representatives of CAA Norway on request.

DE-ICING PROCEDURE

De-icing for ACFT with reference code C or lower is carried out on de-icing platforms North and South. ACFT with reference code D or greater shall be escorted by follow-me vehicle to de-icing platform.

When requesting start-up clearance, inform TWR that de-icing is required.

Contact TWR for taxi instructions to de-icing platform.

Contact de-icing operator before entering de-icing platform.

When de-icing is completed, contact TWR for taxi instructions.

ENTC/TOS



23 OCT 20 **10-9Y** Eff 5 Nov

STD COPTER MINIMUMS

TROMSO, NORWAY
LANGNES

STRAIGHT-IN RWY		DA(H) / MDA(H)	RVR (ALS/ALS out)
18	ILS ①	289' (274')	600m / 1000m
	ILS ②	413' (398')	750m / 1000m
	LOC	860' (845')	1000m / 1000m
	RNP	1040' (1025')	1000m / 1000m
36	ILS ①	352' (325')	750m / 1000m
	ILS ③	684' (657')	750m / 1000m
	ILS ②	764' (737')	750m / 1000m
	LOC ③	750' (723')	1000m / 1000m
	LOC ②	760' (733')	1000m / 1000m
	RNP ④	760' (733')	1000m / 1000m
	RNP ①	970' (943')	1000m / 1000m
	RNP ②	1280' (1253')	1000m / 1000m

- ① Missed apch climb gradient mim 4.0%.
- ② Missed apch climb gradient mim 2.5%.
- ③ Missed apch climb gradient mim 3.0%.
- ④ Missed apch climb gradient mim 5.0%.

CIRCLE-TO-LAND ⑤	MDA(H)	VIS
	840' (808') ⑥	1000m
RNP 18	1040' (1008')	1000m
RNP 36	1280' (1248')	1000m
RNP A ⑦	870' (838')	1000m
RNP A ⑧	930' (898')	1000m
RNP A ⑨	1040' (1008')	1000m

- ⑤ Not authorized West of airport.
- ⑥ After ILS or LOC 18: MDA(H) 860' (828').
- ⑦ Missed apch climb gradient mim 3.5%.
- ⑧ Missed apch climb gradient mim 3.0%.
- ⑨ Missed apch climb gradient mim 2.5%.

TAKE-OFF RWY 18, 36

Low Visibility Take-off				
RL/FATO LTS, RCLM & RVR info	RL/FATO LTS, & RCLM	Unlit/unmarked defined RWY/FATO	Nil Facilities DAY	Nil Facilities NIGHT
	550m		550m ⑩	800m

- ⑩ Or rejected take-off distance whichever is the greater.

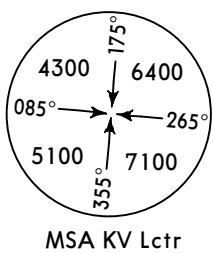
ENTC/TOS LANGNES

JEPPESEN

TROMSO, NORWAY

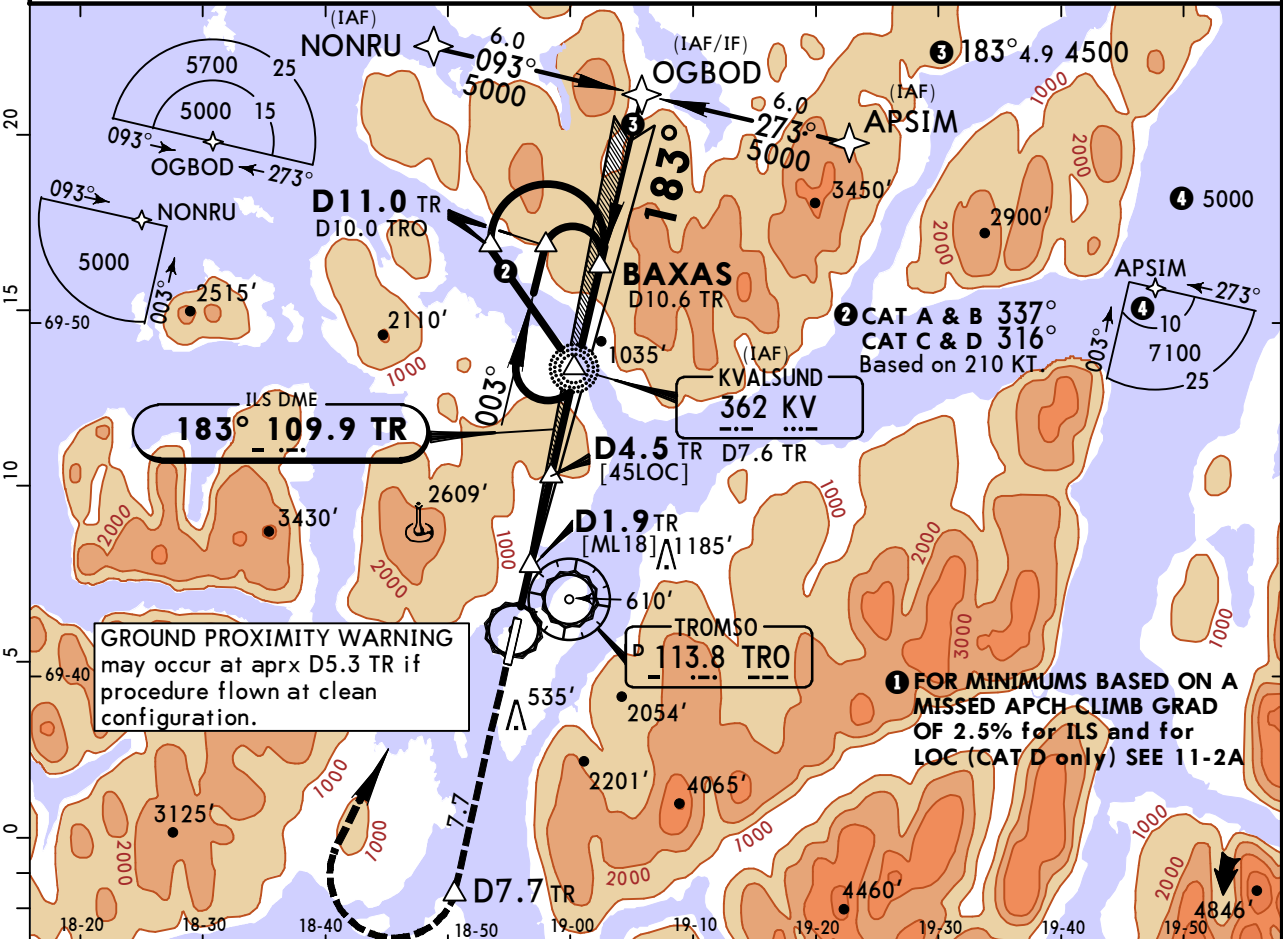
12 MAR 21 (11-1) Eff 25 Mar ● ILS or LOC Rwy 18

*ATIS 126.125		*TROMSO Approach 123.750		TROMSO Tower 118.3	
LOC TR 109.9	Final Apch Crs 183°	BAXAS 4500' (4485')	ILS DA(H) Refer to Minimums	Apt Elev 32' Rwy 15'	



MISSED APCH: Climb STRAIGHT AHEAD to 3000' or D7.7 TR whichever earlier. Turn RIGHT (CAT C: MAX 160KT, CAT D: MAX 185KT) to intercept and proceed on 010° to KV Lctr, climbing to 5000' and hold. Do not turn before MAP.

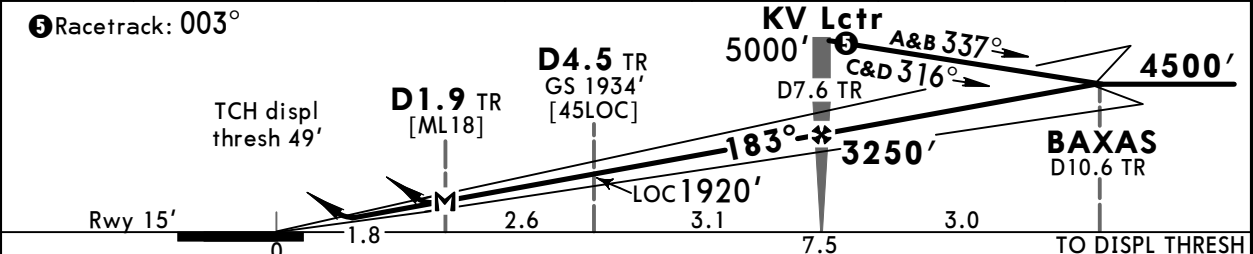
Alt Set: hPa Rwy Elev: 1 hPa Trans level: By ATC Trans alt: 7000'
 1. RNAV transitions: RNAV1 (GNSS required). 2. DME and ADF required. 3. WARNING: Steep GS angle, appropriate acft and crew qualification required. 4. Terrain penetrates OAS between D4.5 TR and KV Lctr.



GROUND PROXIMITY WARNING may occur at aprx D5.3 TR if procedure flown at clean configuration.

FOR MINIMUMS BASED ON A MISSED APCH CLIMB GRAD OF 2.5% for ILS and for LOC (CAT D only) SEE 11-2A

LOC (GS out)	TR DME	3.0	4.0	5.0	6.0	7.0
	ALTITUDE	1290'	1710'	2140'	2570'	2990'



Gnd speed-Kts	70	90	100	120	140	160	HIALS PAPI PAPI	3000' or D7.7 TR whichever earlier	
ILS GS or LOC Descent Angle	4.00°	496	637	708	850	991			1133
MAP at D1.9 TR									

PANS OPS	Standard ILS STRAIGHT-IN LANDING RWY 18				LOC (GS out) CDFA		CIRCLE-TO-LAND	
	Missed apch climb gradient mim 4.0%				DA/MDA(H) ABC: 860' (845')		Not authorized West of airport	
	A: 289' (274')		C: 322' (307')		Missed apch climb gradient mim 2.8%			
	B: 309' (294')		D: 339' (324')		DA/MDA(H) D: 860' (845')			
	FULL		ALS out		ALS out			
A	RVR 600m 1	RVR 1300m		RVR 1500m		Max Kts	MDA(H) VIS	
B	RVR 650m 1	RVR 1400m				100	860' (828') 1500m	
C	RVR 700m 1	RVR 1500m				135	860' (828') 1600m	
D	RVR 800m	RVR 3100m		RVR 3800m		180	2660' (2628') 2400m 2	
						205	2960' (2928') 3600m 2	

ENTC/TOS LANGNES

JEPPESEN

TROMSO, NORWAY

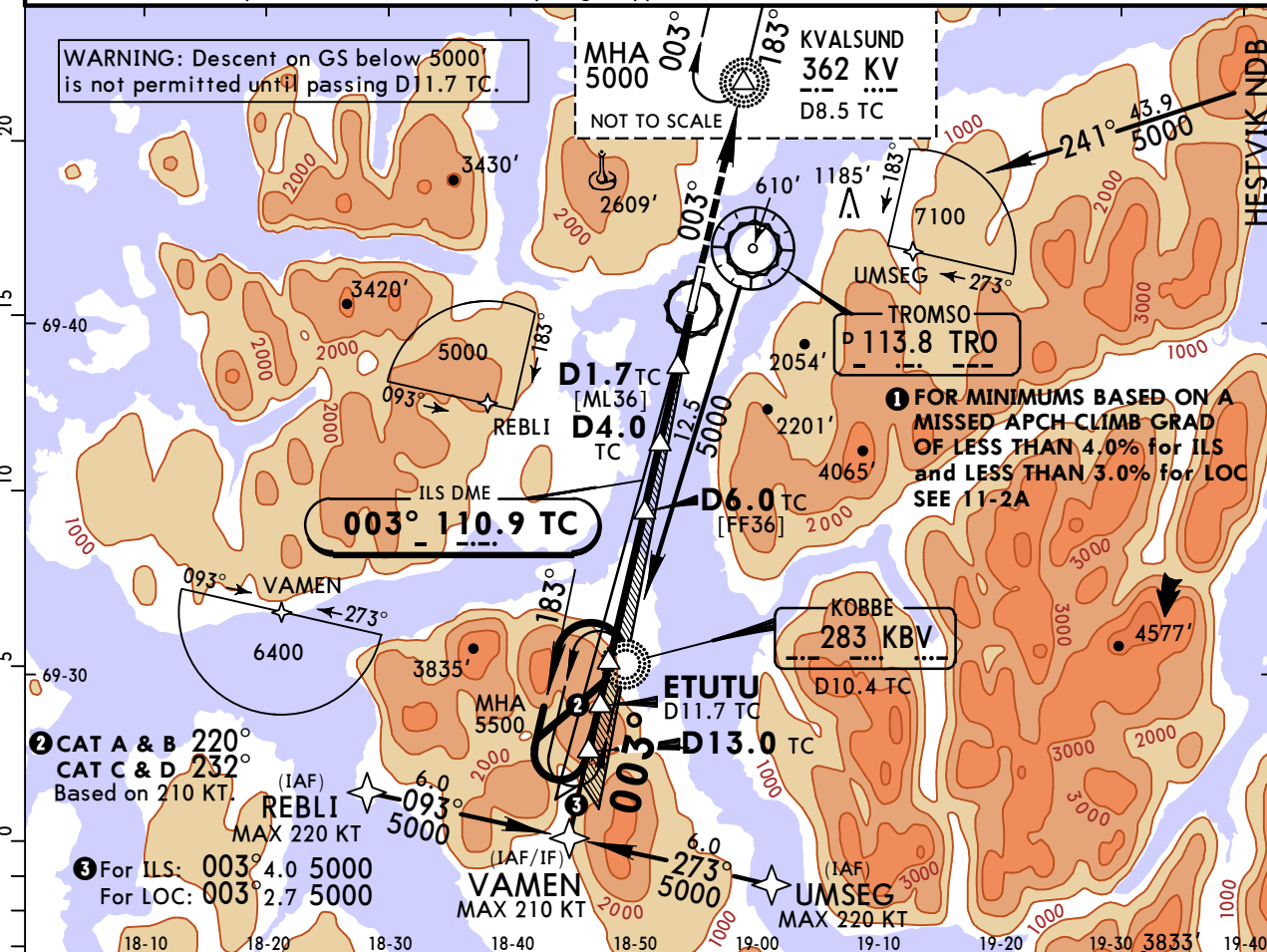
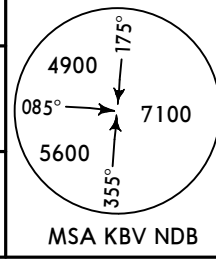
12 MAR 21

(11-2)

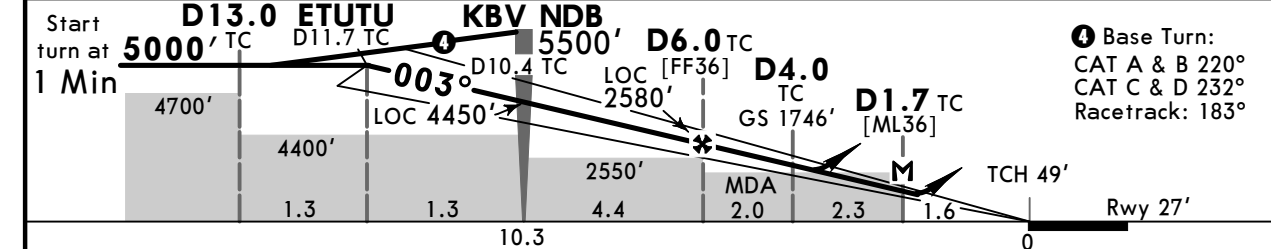
Eff 25 Mar

ILS or LOC Rwy 36

*ATIS 126.125		*TROMSO Approach 123.750		TROMSO Tower 118.3	
LOC TC 110.9	Final Apch Crs 003°	ETUTU 5000' (4973')	ILS DA(H) Refer to Minimums	Apt Elev 32' Rwy 27'	
MISSED APCH: Climb on 003° to KV Lctr (D8.5 TC), then turn LEFT climbing on 343°. When passing 3500' turn LEFT direct to KV Lctr, climbing to 5000' and hold.					
Alt Set: hPa		Rwy Elev: 1 hPa		Trans level: By ATC	
1. DME and ADF required.		2. WARNING: Steep angle approach.			



LOC (GS out)	TC DME ALTITUDE	6.0 2580'	5.0 2160'	4.0 1730'	3.0 1310'	2.0 880'
--------------	-----------------	-----------	-----------	-----------	-----------	----------



Gnd speed-Kts	70	90	100	120	140	160	HIALS PAPI PAPI 003° KV 362' D8.5 TC
ILS GS or LOC Descent Angle	4.00°	496	637	708	850	991	
MAP at D1.7 TC							

Standard STRAIGHT-IN LANDING RWY 36				CIRCLE-TO-LAND	
ILS Missed apch climb gradient mim 4.0% A: 352' (325') C: 385' (358') B: 372' (345') D: 402' (375')		LOC (GS out) Missed apch climb gradient mim 3.0% CDFA DA/MDA(H) 750' (723')		Not authorized West of airport	
FULL		ALS out		Max Kts	MDA(H) VIS
A	RVR 800m	RVR 1500m	RVR 1500m	100	840' (808') 1500m
B	RVR 900m			135	850' (818') 1600m
C	RVR 1000m	RVR 1600m	RVR 2700m	180	2660' (2628') 2400m
D	RVR 1000m	RVR 1700m	RVR 3400m	205	2960' (2928') 3600m

ENTC/TOS
LANGNES

JEPESEN
6 SEP 19 **11-2A** **Eff 12 Sep**

TROMSO, NORWAY

ILS RWY 18 MINIMUMS

MISSED APCH CLIMB GRADIENT MIM 2.5%

Standard		STRAIGHT-IN LANDING RWY 18	
		ILS	
		DA(H) A: 413' (398') C: 445' (430')	
		B: 430' (415') D: 1033' (1018')	
		FULL	ALS out
A	RVR 1100m	RVR 1500m	
B	RVR 1200m		
C	RVR 1300m		
D	RVR 2400m		

LOC RWY 18 MINIMUMS

MISSED APCH CLIMB GRADIENT MIM 2.5%

Standard		STRAIGHT-IN LANDING RWY 18		CIRCLE-TO-LAND	
		LOC (GS out)		Not authorized	
		CDFA		West of airport	
		DA/MDA(H) 1030' (1015')			
		ALS out		Max Kts	MDA(H) _____ VIS _____
D	RVR 4100m	RVR 4900m	205	2960' (2928')	3600m 1

1 or higher straight-in minimums.

ILS RWY 36 MINIMUMS

MISSED APCH CLIMB GRADIENT MIM 3.0%

Standard		STRAIGHT-IN LANDING RWY 36	
		ILS	
		DA(H) A: 684' (657') C: 718' (691')	
		B: 704' (677') D: 734' (707')	
		FULL	ALS out
A	RVR 1500m		
B			
C			
D			

ILS or LOC RWY 36 MINIMUMS

MISSED APCH CLIMB GRADIENT MIM 2.5%

Standard		STRAIGHT-IN LANDING RWY 36		CIRCLE-TO-LAND		
		ILS		LOC (GS out)		
		DA(H) A: 764' (737') C: 798' (771')		DA/MDA(H) CDFA A: 760' (733') C: 810' (783')		
		B: 784' (757') D: 815' (788')		B: 790' (763') D: 830' (803')		
		FULL	ALS out	Max Kts	MDA(H) _____ VIS _____	
A	RVR 1500m	RVR 1500m		100	840' (808') 1500m	
B					135	850' (818') 1600m
C	RVR 2400m		RVR 2900m	RVR 3600m	180	2660' (2628') 2400m 1
D			RVR 3100m	RVR 3800m	205	2960' (2928') 3600m 1

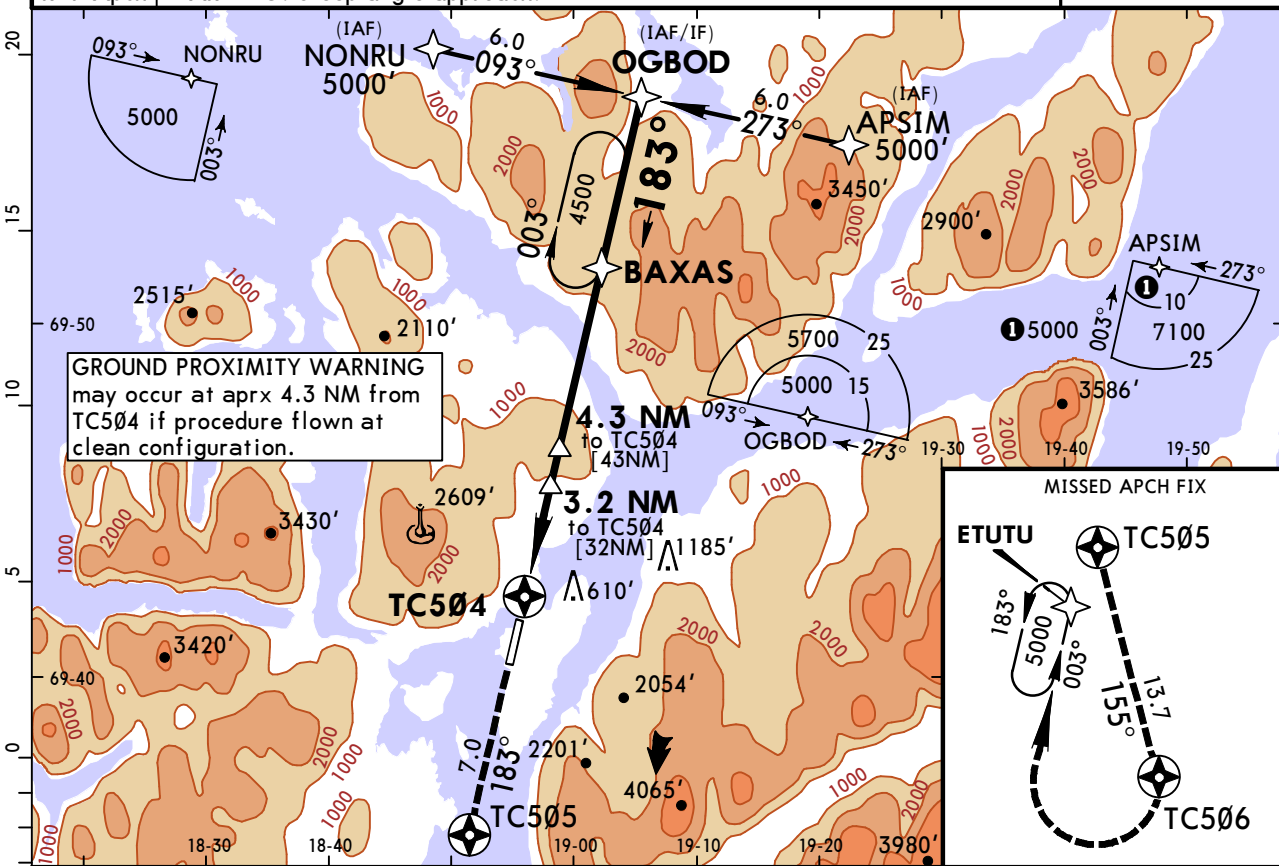
1 or higher straight-in minimums.

ENTC/TOS LANGNES

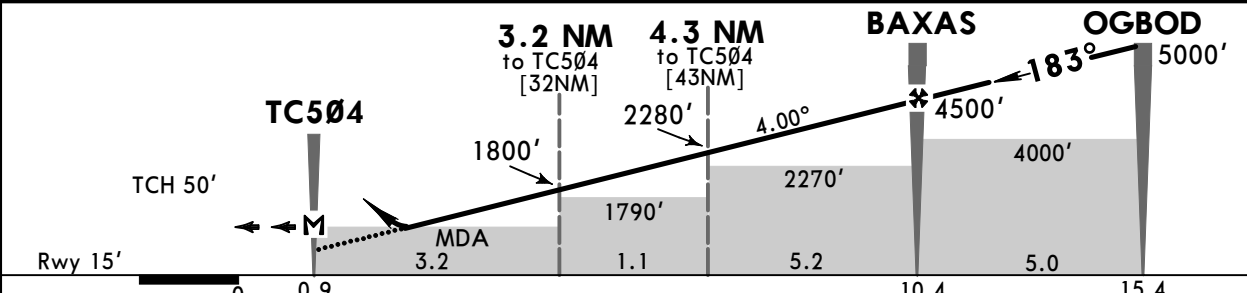
JEPPesen
23 OCT 20 (12-1) Eff 5 Nov

TROMSO, NORWAY RNP Rwy 18

*ATIS 126.125		*TROMSO Approach 123.750		TROMSO Tower 118.3	
RNAV	Final Apch Crs 183°	BAXAS 4500' (4485')	DA/MDA(H) 1040' (1025')	Apt Elev 32'	Rwy 15'
MISSED APCH: Climb on 183° to TC505, then turn LEFT to TC506. Turn RIGHT to ETUTU, climbing to 5000' and hold. Acft may request direct routing to ETUTU after passing 5000'.					TAA 25 NM IF
Alt Set: hPa		Rwy Elev: 1 hPa	Trans level: By ATC	Trans alt: 7000'	
RNP Apch WARNING: Steep angle approach.					



DIST to TC504	2.0	3.0	4.0	5.0	6.0	7.0	8.0	9.0
ALTITUDE	1300'	1720'	2150'	2570'	2990'	3420'	3840'	4260'



Gnd speed-Kts	70	90	100	120	140	160	HIALS PAPI PAPI	TC505 on 183°
Descent Angle 4.00°	496	637	708	850	991	1133		

Standard		STRAIGHT-IN LANDING RWY 18		CIRCLE-TO-LAND	
		LNAV CDFA DA/MDA(H) 1040' (1025')		Not authorized West of airport	
		ALS out		Max Kts	
A	RVR 1500m			100	1040' (1008') 1500m
B	RVR 1500m			135	1040' (1008') 1600m
C	RVR 4100m	RVR 4900m		180	2660' (2628') 2400m
D	RVR 4100m	RVR 4900m		205	2960' (2928') 3600m

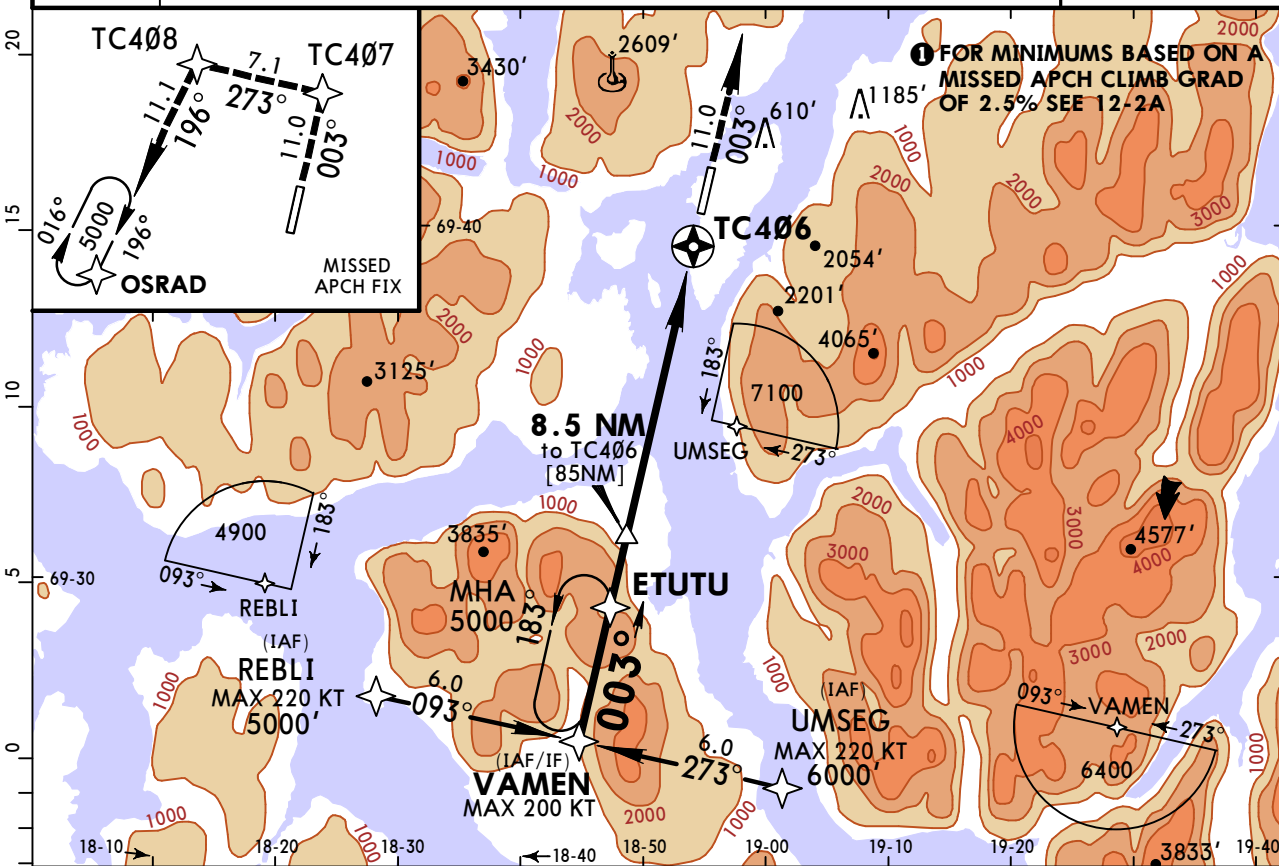
ENTC/TOS LANGNES

JEPPESEN
23 OCT 20
Eff 5 Nov **(12-2)**

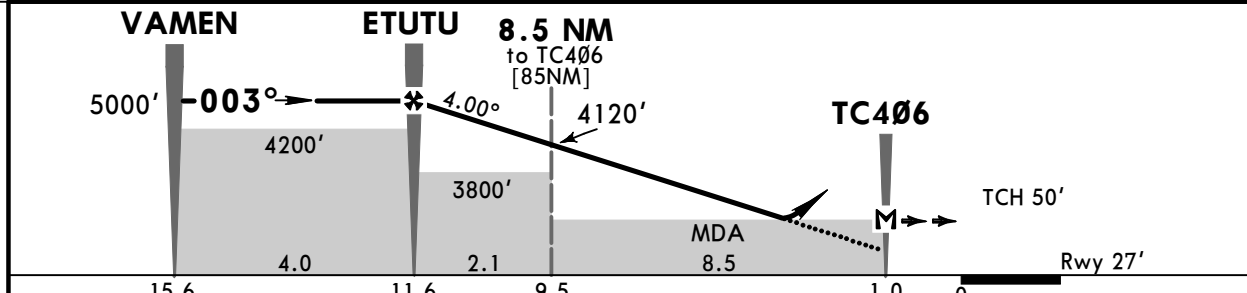
TROMSO, NORWAY

RNP Rwy 36

*ATIS 126.125		*TROMSO Approach 123.750		TROMSO Tower 118.3	
RNAV	Final Apch Crs 003°	ETUTU 5000' (4973')	DA/MDA(H) Refer to Minimums	Apt Elev 32'	7100 MSA ARP
MISSED APCH: Climb on 003° to TC407, then turn LEFT to TC408. Turn LEFT to OSRAD at 5000' and hold.					
RNP Apch	Alt Set: hPa	Rwy Elev: 1 hPa	Trans level: By ATC	Trans alt: 7000'	



DIST to TC406	9.0	8.0	7.0	6.0	5.0	4.0	3.0	2.0
ALTITUDE	4330'	3900'	3480'	3050'	2630'	2200'	1780'	1360'



MAP at TC406		STRAIGHT-IN LANDING RWY 36		CIRCLE-TO-LAND	
Standard		LNAV		Not authorized West of airport	
DA/MDA(H)	MACG mim 5.0%	DA/MDA(H)	MACG mim 4.0%		
A: 760' (733')	CDFA C: 860' (833')	A: 970' (943')	C: 1050' (1023')		
B: 810' (783')	D: 900' (873')	B: 1010' (983')	D: 1080' (1053')		

PANS OPS	A	RVR 1500m	RVR 1500m	Max Kts	100	MDA(H)	1280' (1248')	VIS	1500m
	B	RVR 3100m	RVR 3800m	135	1300' (1268')	1600m			
	C	RVR 3300m	RVR 4000m	180	2660' (2628')	2400m			
	D	RVR 4100m	RVR 4900m	205	2960' (2928')	3600m			

1 or higher straight-in minimums.

ENTC/TOS
LANGNES

JEPPESEN
23 OCT 20 **12-2A** Eff 5 Nov

TROMSO, NORWAY

RNP RWY 36 MINIMUMS

MISSED APCH CLIMB GRADIENT MIM 2.5%

Standard STRAIGHT-IN LANDING RWY 36		CIRCLE-TO-LAND	
LNAV CDFA		Not authorized West of airport	
DA/MDA(H)	A: 1280' (1253') C: 1330' (1303') B: 1300' (1273') D: 1350' (1323')	Max Kts	MDA(H) _____ VIS _____
A	ALS out RVR 5000m	100	1280' (1248') I 1500m
B		135	1300' (1268') I 1600m
C		180	2660' (2628') I 2400m
D		205	2960' (2928') I 3600m

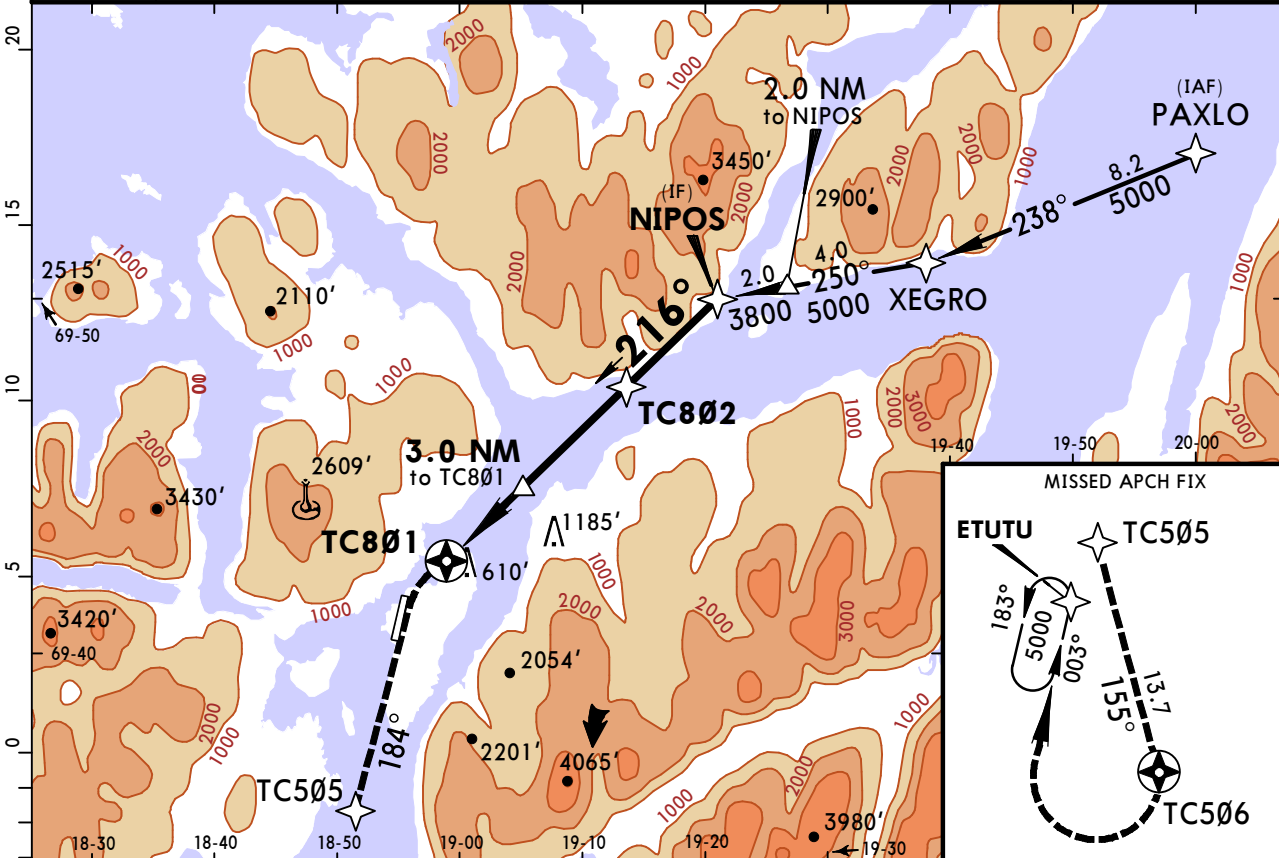
I or higher straight-in minimums.

ENTC/TOS
LANGNES

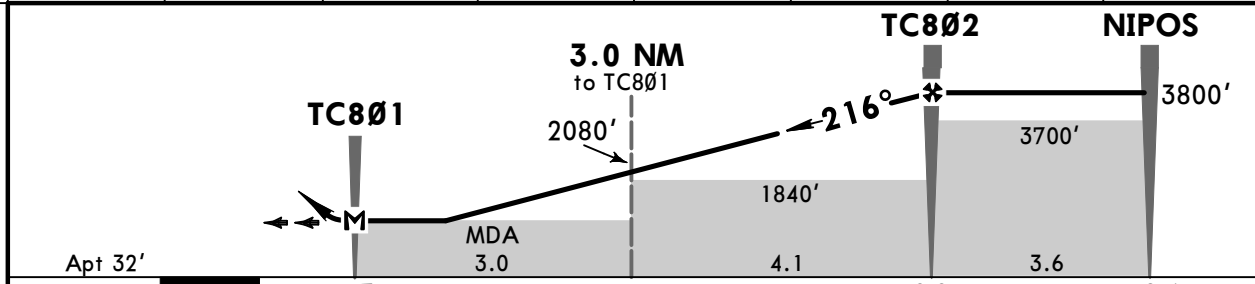
23 OCT 20
Eff 5 Nov (12-3) CAT A & B

TROMSO, NORWAY
RNP A

*ATIS 126.125		*TROMSO Approach 123.750		TROMSO Tower 118.3	
RNAV	Final Apch Crs 216°	TC802 3800' (3768')	MDA(H) Refer to Minimums	Apt Elev 32'	
MISSED APCH: Turn LEFT to intercept and proceed on 184° to TC505, then turn LEFT to TC506. Turn RIGHT direct to ETUTU, climbing to 5000' and hold. Acft may request direct routing to ETUTU after passing 5000'.					7100 MSA ARP
Alt Set: hPa Apt Elev: 1 hPa Trans level: By ATC Trans alt: 7000'					
RNP Apch 1. WARNING: Steep angle approach. 2. Final apch track offset 32° from RCL.					



DIST to TC801	1.0	2.0	3.0	4.0	5.0	6.0	7.0
ALTITUDE	1240'	1660'	2080'	2500'	2920'	3340'	3760'



Gnd speed-Kts	70	90	100	120	140	160	Lighting - Refer to Airport Chart
Descent Angle	4.00°	496	637	708	850	991	

Standard		CIRCLE-TO-LAND	
Not authorized West of airport			
Missed apch climb gradient			
mim 3.5%, 3.0% and 2.5%			
Max Kts	MDA(H)	VIS	
A 100	870' (838')	1	1500m
B 135	890' (858')	2	1600m
C	NOT APPLICABLE		
D	NOT APPLICABLE		

1 After missed apch climb grad mim 3.0%: 930' (898') / mim 2.5%: 1040' (1008').
 2 After missed apch climb grad mim 3.0%: 960' (928') / mim 2.5%: 1060' (1028').

Chart changes since cycle 17-2021

ADD = added chart, REV = revised chart, DEL = deleted chart.

ACT	PROCEDURE IDENT	INDEX	REV DATE	EFF DATE
TROMSO, (LANGNES - ENTC)				

TERMINAL CHART CHANGE NOTICES

No Chart Change Notices for Airport ENTC