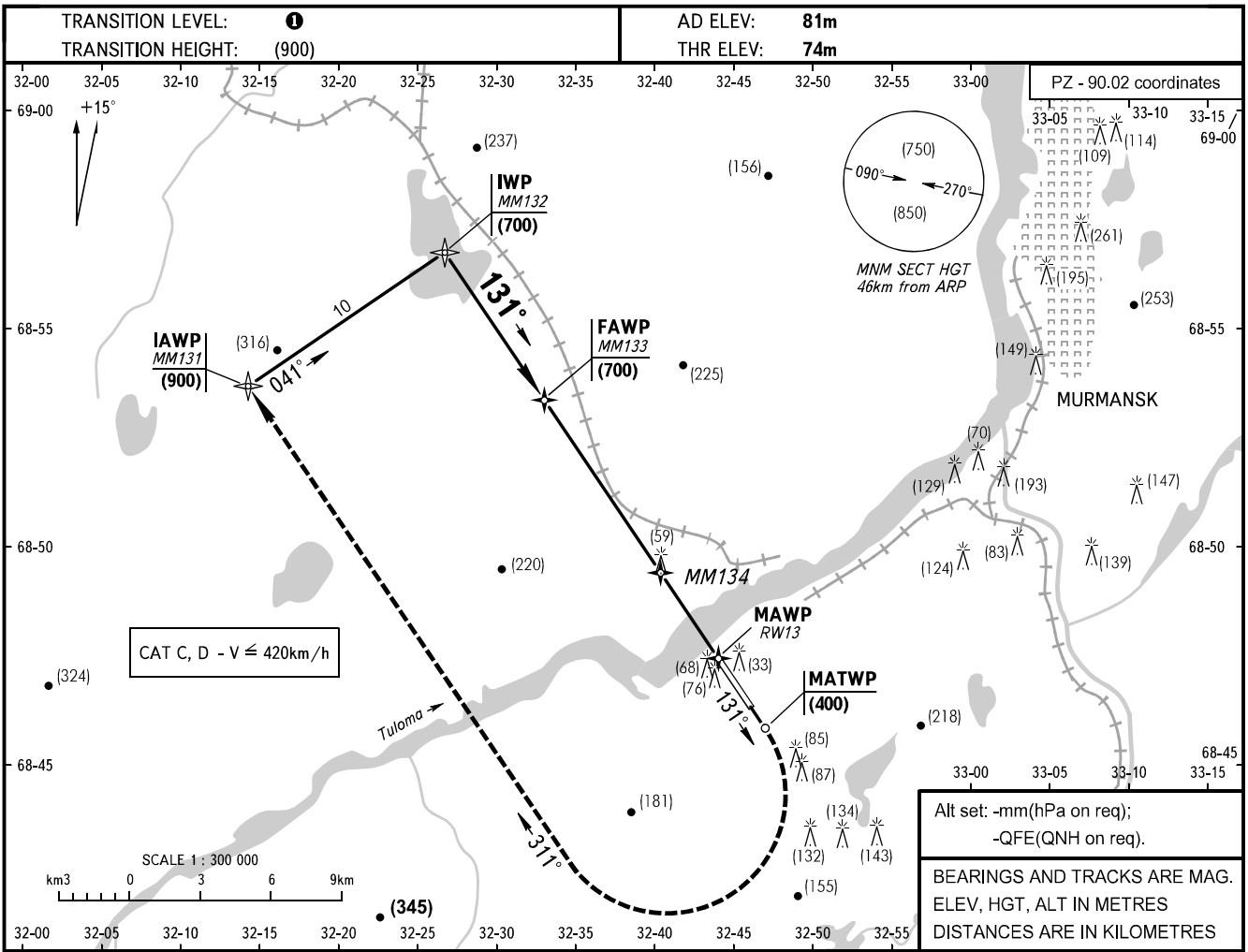


**INSTRUMENT  
APPROACH  
CHART - ICAO**

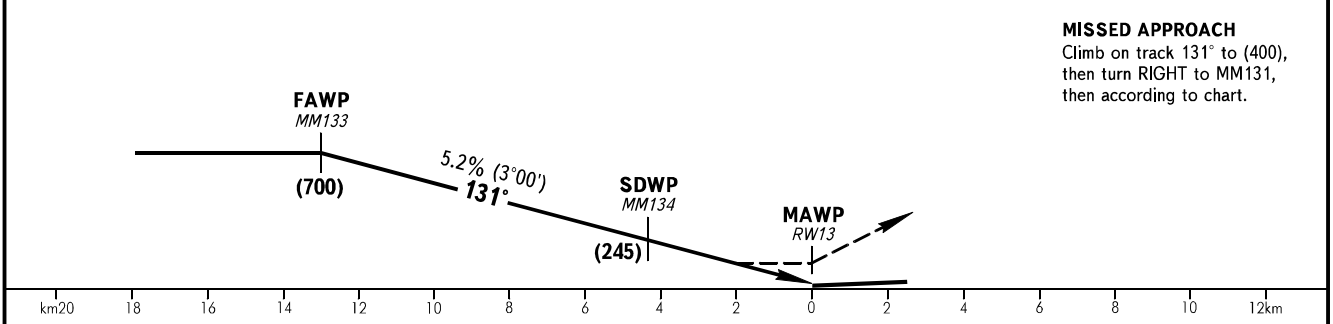
TOWER **120.300**

**MURMANSK, RUSSIA**  
MURMANSK  
GNSS RWY 13



THR DISTANCE	10	9	8	7	6	5	4	3	2	1
ALTITUDE	610	560	505	455	405	350	300	250	195	145
HEIGHT	(535)	(485)	(430)	(380)	(330)	(275)	(225)	(175)	(120)	(70)

Alt set: -mm(hPa on req);  
-QFE(QNH on req).  
BEARINGS AND TRACKS ARE MAG.  
ELEV, HGT, ALT IN METRES  
DISTANCES ARE IN KILOMETRES



OCA/H		A	B	C	D
Straight-in	GNSS	180(104)	180(104)	180(104)	180(104)
	Approach				

**1** TRANSITION LEVEL:  
- FL050 when atmospheric pressure is 753mm mercury column or above;  
- FL060 when atmospheric pressure is 753-726mm mercury column;  
- FL070 when atmospheric pressure is 726mm mercury column or less.

GROUND SPEED	km/h	150	180	210	240	270	300	330	360	390	420	450
LOM-MAPt 2 NDB 1960m	min:sec	0.47	0.39	0.34	0.29	0.26	0.23	0.21	0.20	0.18	0.17	0.16
RATE OF DESCENT	m/s	2.2	2.6	3.0	3.5	3.9	4.4	4.8	5.2	5.6	6.1	6.5

CHANGE: AD ELEV, THR ELEV