EHBK — MAASTRICHT/MAASTRICHT AACHEN

Note: the following sections in this chapter are intentionally left blank: AD 2.16, AD 2.21.

EHBK AD 2.1 AERODROME LOCATION INDICATOR AND NAME

EHBK — MAASTRICHT/Maastricht Aachen

EHBK AD 2.2 AERODROME GEOGRAPHICAL AND ADMINISTRATIVE DATA

1	ARP co-ordinates and site at AD	50°54'57"N 005°46'37"E 081° GEO 599 m from TWR.		
2	Direction and distance from (city)	5 NM NE from Maastricht.		
3	Elevation/reference temperature	375 ft AMSL/21.7°C (JUL).		
4	Geoid undulation at AD ELEV PSN	150 ft.		
5	MAG VAR/annual change	0°E (2010)/8'E.		
6	AD operator, postal address, telephone, telefax, email, AFS, website	Post: Maastricht Aachen Airport P.O. Box 1 6199 ZG Maastricht Airport The Netherlands		
		Tel: +31 (0)43 358 9999		
		Fax: +31 (0)43 358 9977 (OPS) +31 (0)43 358 9955 (commercial MHS)		
		Email: info@maa.nl		
		AFS: EHBKYDYX		
7	Types of traffic permitted (IFR/VFR)	IFR/VFR		
8	Remarks	Airport for use by national and international civil air transport with all types of aircraft.		

EHBK AD 2.3 OPERATIONAL HOURS

1	AD operator	MON-SUN: 0500-2200 (0400-2100).		
2	Customs and immigration	Customs: H24. Immigration: MON-SUN: 0500-2200 (0400-2100).		
3	Health and sanitation	MON-SUN: 0500-2200 (0400-2100) 1 HR PN1).		
4 AIS briefing office Self-briefing, MON-SUN: 05		Self-briefing, MON-SUN: 0500-2200 (0400-2100);		
		Tel: +31 (0)20 406 2323		
		Fax: +31 (0)20 648 4417		
5	ATS reporting office (ARO)	Competent ATS unit: ARO Schiphol, see EHAM AD 2.3.		
6	MET briefing office	OPR HR, outside OPR HR: MWO De Bilt (see EHBK AD 2.11).		
7	ATS	MON-SUN: 0500-2200 (0400-2100).		
8	Fuelling	MON-SUN: 0500-2200 (0400-2100).		
9	Handling	AVBL, for details see EHBK AD 2.23.		
10	Security	AVBL		
11	De-icing	AVBL		
12	Remarks	PN means permission from and/or in case of customs etc. notification other than by (VFR) flight plan to aerodrome authority as appropriate.		

EHBK AD 2.4 HANDLING SERVICES AND FACILITIES

1	Cargo-handling facilities	All modern facilities.	
2	Fuel/oil types	100LL, Jet A1/80, W80, W100, 15W50.	
3	Fuelling facilities/capacity Unlimited during OPR HR.		
4	De-icing facilities	AVBL	
5	Hangar space for visiting aircraft	6000 m ²	
6	Repair facilities for visiting aircraft	Limited O/R.	
7	Remarks	NIL	

EHBK AD 2.5 PASSENGER FACILITIES

1	Hotels Hotel 124 beds; accommodation unlimited in Maastricht.		
2	Restaurants	Near the airport; 100 meals/HR.	
3	Transportation	sportation Bus and taxi.	
4	Medical facilities First aid treatment, hospitals in Maastricht (7 NM) and Sittard (8		
5	Bank and post office AVBL		
6	Tourist office AVBL		
7	Remarks	NIL	

EHBK AD 2.6 RESCUE AND FIRE FIGHTING SERVICES

1	AD category for fire fighting	CAT 7 AVBL: MON-SUN: 0500-2200 (0400-2100). CAT 8 - 9 PAX flights; after 48 HR prior request on fax: +31 (0)43 358 9977 or e-mail: airportauthorities@maa.nl. CAT 8 - 9 cargo flights; O/R.
		CAT 8 - 9 Cargo iligints, OTK.
2	Rescue equipment	AVBL
3	Capability for removal of disabled aircraft	Mobile jack for ACFT up to MTOW 2000 kg. Other equipment via contractors.
4	Remarks	NIL

EHBK AD 2.7 SEASONAL AVAILABILITY - CLEARING

1	Types of clearing equipment	5 snowsweepers, 5 snowploughs, 1 snowblower, 2 ureum spreaders.	
2	Clearance priorities	Information not AVBL.	
3	Remarks	Snow clearance information promulgated by SNOWTAM.	

EHBK AD 2.8 APRONS, TAXIWAYS AND CHECK LOCATIONS/POSITIONS DATA

1	Apron surface and strength	Surface: ASPH, CONC. Strength: PCN 71/F/C/X/T.			
2	Taxiway width, surface and strength	All TWYs except TWY T TWY T			
		Width 23 m 7.5 m		7.5 m	
		Surface	ASPH, CONC	ASPH, CONC	
		Strength	PCN 71/F/C/X/T	PCN 12/F/C/X/T	
3	Altimeter checkpoint location and elevation	r checkpoint location and elevation Location: apron. Elevation: 375 ft AMSL.			
4	VOR checkpoints	Not AVBL/See AD 2.EHBK-APDC.			
5	INS checkpoints	Not AVBL/See AD 2.EHBK-APDC.			
6	Remarks	NIL			

EHBK AD 2.9 SURFACE MOVEMENT GUIDANCE AND CONTROL SYSTEM AND MARKINGS

1	Use of aircraft stand ID signs, TWY guide	Taxiing guidance system:
	lines and visual docking/parking guidance system at aircraft stands	illuminated information signs to RWY 03 and RWY 21. illuminated mandatory instruction signs supplementing all runway holding positions.
		On aprons and TWYs:
		 follow-me cars are AVBL on request for guidance on aprons and TWYs. guidance to the parking position on all aprons is executed by marshallers.
		General use of aprons:
		A-apron: commercial PAX ACFT and general aviation ACFT. Jet ACFT with MTOW > 50 000 kg park nose-in. B-apron: cargo ACFT. Jet ACFT park nose-in. C-apron: general aviation ACFT and all ACFT requiring maintenance.
		Note: ACFT requiring maintenance need 6 HR PPR from airport authority.
2	RWY and TWY markings and LGT	THR, transverse stripe, arrows, aiming point, RWY side stripe, TDZ, RWY turnpads, RWY designation, RWY centre line.
		RWY: Edge lights, centre line lights, THR lights, TDZ lights (RWY 21 only), RWY-end lights. Blue tumpad edge lights, green tumpad centre line lights (at end of RWY 21 only).
		RWY HLDG positions (pattern A: E1, E2, W1, W3 and W4; pattern B: E1A, E2A, W1A, W2, W3A and W4A), TWY centre line. Red/white mandatory instruction signs at RWY HLDG positions.
		All TWYs except TWY T: edge lights. TWY T provided with retroreflective edge markers. Green centre line lights on TWYs behind stop bars 1 except E2 and W2. Alternating green/yellov centre line lights on exits E1, W1 and W4.
3	Stop bars	Each active runway entry and ILS critical/sensitive area is safeguarded by a stop bar (see AD 2.EHBK-ADC). Stop bars shall be illuminated during:
		 Low visibility circumstances when visibility <= 2000 m, or RVR <= 1500 m and/or cloud base <= 300 ft. OPR HR at intensive runway crossings to avoid runway incursio in all visibility circumstances.
		Crossing of illuminated stop bars is prohibited. Aircraft and vehicles may proceed further only when ATC gives permission and the stop bar lights are switched off (ref. Annex 2, item 3.2.2.7.3).

EHBK AD 2.10 AERODROME OBSTACLES

All obstacles are marked and lighted day and night. For obstacles in take-off area see AD 2.EHBK-AOC-03-21.

EHBK AD 2.11 METEOROLOGICAL INFORMATION PROVIDED

Remarks

1	Associated MET office	De Bilt
2	Hours of service MET office outside hours	H24 -
3	Office responsible for TAF preparation Periods of validity	De Bilt 30 HR
4	Trend forecast Interval of issuance	TREND MON-SUN: 0455-2155 (0355-2055)
5	Briefing/consultation provided	Self-briefing; briefing on request from MWO-De Bilt by telephone after self-briefing (see item 10).
6	Flight documentation Language(s) used	Reports, forecasts, charts. English, Dutch.

Green centre line lights behind stop bar RWY HLDG position E1A and W1A till RWY centre line. Green centre line lights behind stop bar RWY HLDG position W3A and W4A for a distance of 90 m.

7 Charts and other information available for $\,$ S, P, W, T briefing or consultation 8 Supplementary equipment available for WXR, APT providing information ATS units provided with information Beek TWR, Beek APP Additional information (limitation of service, 10 Tel: 0900 202 etc.) Briefing low level flights (IFR/VFR). 3341 Tel: 0900 202 Briefing IFR flights above FL 100. 3343 Tel: 0900 202 Briefing balloon flights within Amsterdam FIR. 3340 **Note:** charge for tel. briefings and consultations is € 0,50/min. Weather bulletin (Dutch language) and METARs via Dutch public television 'Teletekst' page 707.

EHBK AD 2.12 RUNWAY PHYSICAL CHARACTERISTICS

Designat RWY N		Dimensions of RWY (m)	Strength (PCN) and surface of RWY and SWY	THR co-ordinates RWY end co-ordinates THR GUND	THR elevation and highest elevation of TDZ of precision APCH RWY
1	2	3	4	5	6
03	032.62°	2500 x 45	71/F/C/X/T ASPH	50°54'06.61"N 005°45'36.18"E INFO not AVBL 150 ft	365.5 ft INFO not AVBL
21	212.63°	2500 x 45	71/F/C/X/T ASPH	50°55'07.98"N 005°46'38.32"E INFO not AVBL 150 ft	370.7 ft INFO not AVBL

Designations RWY NR	Slope of RWY-SWY	SWY dimensions (m)	CWY dimensions (m)	Strip dimensions (m)	OFZ
1	7	8	9	10	11
03	Not AVBL	NIL	NA	2870 x 300	AVBL
21	Not AVBL	NIL	NA	2870 x 300	AVBL

Remarks

12

When temperature is 18°C or higher, 180° turn not allowed on RWY 03/21 for ACFT with MTOW >= 50 000 kg. Turnpad at THR RWY 03 is only AVBL during UDP for ACFT with MAX wingspan 52 m.

Jet ACFT doing a 180° turn on turnpad (at runway extremity) must keep power setting below breakaway thrust to avoid damaging RWY 21 LOC antenna with their jet blast.

Jet ACFT departing from RWY 03 must not select take-off power until reaching the start position RWY 03 to avoid damaging RWY 21 LOC antenna with their jet blast.

EHBK AD 2.13 DECLARED DISTANCES

RWY Designator	TORA (m)	TODA (m)	ASDA (m)	LDA (m)	Remarks
1	2	3	4	5	6
03	2500	2500	2650	2500	DTHR 250 m.
21	2500	2500	2750	2500	DTHR 250 m.

EHBK AD 2.14 APPROACH AND RUNWAY LIGHTING

	WY gnator	APCH LGT type, length, INTST	THR LGT colour, WBAR	VASIS (MEHT) PAPI	TDZ LGT length	RWY centre line LGT length, spacing, colour, INTST	RWY edge LGT length, spacing, colour, INTST	RWY end LGT colour, WBAR	SWY LGT length, colour
	1	2	3	4	5	6	7	8	9
03		CAT I 608 m LIH	G -	PAPI left/3° (66 ft)	NIL	2500 m 15 m <u>1)</u> LIH	2500 m 60 m <u>2)</u> LIH	R	NIL
21		CAT III 855 m LIH	G -	PAPI left/3° (67 ft)	900 m	2500 m 15 m <u>1)</u> LIH	2500 m 60 m <u>2)</u> LIH	R	NIL

Remarks 10

White from THR to 900 m from RWY-end; white/red from 900 m from RWY-end to 300 m from RWY-end; red from 300 m

from RWY-end to RWY-end.

Red BTN beginning of RWY pavement and DTHR; white BTN DTHR and 600 m from RWY-end; last 600 m to RWY-end.

EHBK AD 2.15 OTHER LIGHTING, SECONDARY POWER SUPPLY

1	ABN/IBN location, characteristics and hours of operation	NIL
2	LDI location and LGT Anemometer location and LGT	NIL Anemometers: GEN 3.5 paragraph 3.
3	TWY edge and centre line lighting	Edge lights: all TWYs except TWY T. Centre line: green centre line lights on TWYs behind stop bars (see EHBK AD 2.9) except E2 and W2.
4	Secondary power supply Switch-over time	AVBL 0 seconds.
5	Remarks	NIL

1	Designation and lateral limits	MAASTRICHT CTR:
		In Amsterdam FIR:
		51°02'00.74"N 005°52'37.81"E;
		along Dutch-German border to
		50°54'41.50"N 006°05'06.12"E;
		50°54'45.26"N 005°58'40.31"E;
		50°51'24.51"N 005°55'13.17"E;
		along clockwise arc (radius 6.5 NM, centre
		50°54'57.00"N 005°46'37.00"E) to
		50°48'29.24"N 005°45'37.93"E;
		50°46'36.93"N 005°43'42.97"E;
		50°47'25.59"N 005°41'44.54"E;
		along Dutch-Belgian border to 50°59'55,80"N 005°46'01,10"E;
		51°03'16.99"N 005°49'32.07"E;
		to point of origin.
		In Langen FIR:
		51°02'00,74"N 005°52'37,81"E:
		51°00'46.92"N 005°55'37.48"E:
		51°00'45.89"N 005°57'37.54"E:
		50°58'59.61"N 005°57'37.54"E:
		along Dutch-German border to point of origin.
		along batter comman border to point or origin.
2	Vertical limits	_
		In Amsterdam FIR: GND to 3000 ft AMSL.
		In Langen FIR: GND up to and including 3000 ft AMSL.
3	Airspace classification	
"	All space classification	In Amsterdam FIR: C
		In Langen FIR: D
4	ATS unit call sign	Beek Tower
_	Language(s)	English
5	Transition altitude	IFR: 3000 ft AMSL; VFR: 3500 ft AMSL.
6	Remarks	NIL

EHBK AD 2.18 ATS COMMUNICATION FACILITIES

Service designation	n Call sign	Channel/ Frequency (MH	Hours of operation z)	Remarks
1	2	3	4	5
APP	Beek Approach	123.975 278.500	MON-SUN: 0500-2200 (0400- 2100)	TAR. Communication may only be established after prior permission from ATC.
		120.200	O/R	O/R or at ATC discretion.
TWR	Beek Tower	119.475 362.300	MON-SUN: 0500-2200 (0400- 2100)	Primary. VDF. Bearings 'Class B'.
		121.500		Emergency VDF.
		119.700	O/R	Regional Guard. O/R or at ATC discretion.
	Beek Delivery	121.825	MON-SUN: 0500-2200 (0400- 2100)	Start-up control and clearance delivery. Pre-flight information. IFR/VFR traffic (incl. training flights).
ATIS	Maastricht Information	124.575	MON-SUN: 0500-2200 (0400- 2100)	NIL

EHBK AD 2.19 RADIO NAVIGATION AND LANDING AIDS

Type of aid, MAG VAR, Type of supported OPS (VOR/ILS/MLS: declination)	ID	Frequency	Hours of operation	Position of transmitting antenna co- ordinates	Elevation of DME transmitting antenna	Remarks
1	2	3	4	5	6	7
VOR/DME (0°E/2010)	MAS	108.600 MHz CH23X	H24	50°58'18.99"N 005°57'37.54"E	300 ft	Designated operational coverage: 40 NM/FL 250.
NDB	EHN	397 kHz	H24	51°28'04.27"N 005°23'41.50"E	NA	Designated operational range: 25 NM.
NDB	GUL	383.5 kHz	H24	50°48'26.36"N 005°53'43.66"E	NA	Designated operational range: 25 NM.
LOC 03 ILS CAT I/C/1 (0°E/2010)	BKZ	111.550 MHz	H24	50°55'19 .41"N 005°46'49.91"E	NA	NIL
DME 03	BKZ	CH52Y	H24	50°55'20.63"N 005°46'47.19"E	400 ft	NIL
GP 03	-	332.750 MHz	H24	50°54'17.42"N 005°45'39.83"E	NA	NIL
L 21	NW	373 kHz	H24	51°01'09.71"N 005°52'42.04"E	NA	Designated operational range: 15 NM.
LOC 21 ILS CAT III/E/4 (0°E/2010)	BKN	111.550 MHz	H24	50°53'56.74"N 005°45'26.18"E	NA	NIL
DME 21	BKN	CH52Y	H24	50°55'20.63"N 005°46'47.19"E	400 ft	NIL
GP 21	-	332.750 MHz	H24	50°55'02.11"N 005°46'25.09"E	NA	NIL

EHBK AD 2.20 LOCAL TRAFFIC REGULATIONS

1 RESTRICTIONS

Flights with non noise certificated aircraft are not allowed.

So called 'short approaches' to RWY 21 are not allowed within a distance of 4 NM.

ATC is not allowed to approve deviations from the SIDs except:

In emergency.

When the aircraft has reached an altitude of 3500 ft AMSL for propeller aircraft and FL 060 for jet aircraft.

Flights during night hours (2200-0500 (2100-0400)) are not allowed without prior permission from the airport authority.

Visual approaches are not allowed during night hours (2200-0500 (2100-0400)). ATC may allow or offer a visual approach:

In case of emergency.

If no instrument approach is available.

In exceptional cases to avoid a complicated air traffic flow.

2 TRAINING FLIGHTS

Military training flights not allowed.

Circuit training only allowed MON-FRI (except HOL) between 0800-1800 (0700-1700).

Additionally, circuit training for propeller powered aircraft with a MTOW <= 6000 kg, is allowed on MON-FRI (except HOL) 1800-2200 (1700-2100) after prior ermission from airport authority

Local IFR training flights shall file in item 15 the route description: DCT GUL or DCT NW.

3 BANNER TOWING FLIGHTS

Dropping or picking-up banners is not allowed.

4 TAXI PROCEDURES

4.1 Traffic on the apron and taxiways

Before starting their engines pilots shall request start-up clearance from Beek Delivery

Pilots of aircraft intending to taxi on the taxiways shall obtain a clearance from Beek TWR.

Aircraft not maintaining two-way radio communication and intending to taxi on the apron must obtain prior permission from the airport authority.

5 GROUND HANDLING

Due to security reasons, handling is compulsory for all non based aircraft at Maastricht Aachen Airport,

For handling request general aviation (MTOW <= 4000 kg) please contact Air Service Limburg; commercial passengers and cargo (MTOW > 4000 kg) please contact Maastricht Handling Services (see EHBK AD 2.23 for contact information).

EHBK AD 2.22 FLIGHT PROCEDURES

1 INSTRUMENT DEPARTURE PROCEDURES MAASTRICHT AACHEN AIRPORT

1.1 Introduction

The instrument departure procedures are based on ICAO Annex 2 and on ICAO Documents 4444-ATM/501 (PANS-ATM), 7030 (SUPPS) and 8168-OPS/611 (PANS-OPS). With respect to procedures extending outside the Maastricht TMA special arrangements have been made between Beek APP/TWR and the appropriate German and Belgian ATC units.

1.2 Instrument departure procedures

1.2.1 Start-up permission

Pilots of aircraft must have obtained start-up permission from ATC before starting their engines. A request for start-up shall be made to Beek Delivery after all preparations for departure have been made (doors closed etc.) and shall include:

aircraft identification (e.g. TRA2345). position (e.g. opposite tower). ATIS information (e.g. information 'J'). flight rules (e.g. IFR). destination (e.g. Malaga). request start-up (request start-up).

Due to the short flying time to the FIR boundary, pilots of aircraft departing direction Belgium and Germany may request start-up permission before all preparations have been made, indicating the time at which they will be ready to start engines: '..... destination ready to start engines at ..

Permission for start-up will be issued as soon as possible after the request has been made to Beek Delivery. The pilot shall be able to comply with the start-up and taxi permission, since ATC planning of outbound traffic (involving en route clearance and co-ordination with adjacent ATC units) is based on the start-up time. Any delay in start-up or taxiing shall be immediately reported to ATC. In case of indefinite delay the probable duration of the delay will be given.

During the hours of the ATIS broadcast no MET information will be issued to departing aircraft except RVR (see EHBK AD 2.18).

1.2.2 En route clearance

1.2.2.1 Contents

The en route clearance will be issued after start-up clearance has been given by Beek Delivery. An en route clearance contains:

Clearance limit: airport of destination. Standard instrument departure (SID). Level instructions if applicable. SSR code.

Departure instructions if applicable

CTOT if applicable.

Example of an en route clearance: TRA2345 cleared to Malaga, OLNO 2A Departure FL 090, squawk 0121, CTOT 25',

1.2.2.2 Standard instrument departures

The instrument departure procedures are laid down in standard instrument departures (SIDs). SIDs are designated in accordance with ICAO Annex 11. SID designation is composed of the following elements:

a basic indicator, i.e. a significant point.

a validity indicator, i.e. a number from 1 to 9 indicating the valid version of a specific SID.

a route indicator, i.e. a letter representing the runway where the SID begins

SIDs are published for RWY 03 and 21.

1.2.2.3 Departure instructions (1.2.2.1, item e.)

Instructions containing deviations from the standard instrument departure may be added to the en route or take-off clearance. These instructions may comprise an opposite turn after take-off, maintaining a specified heading or temporary altitude restrictions; they amend the relevant part of the SID only.

Climb as rapidly as practicable to at least 2000 ft AMSL.

VOR radial interception angle: in principle 45°. If the indicated angle exceeds 45° initiate turn in due time in order not to overshoot the radial.

1.2.3 Taxi procedures

Aircraft shall request taxi clearance on the TWR frequency (see EHBK AD 2.18).

1.2.4 En route communication

Pilots shall contact the adjacent ATC unit as soon as possible after they have been so instructed by Beek ATC.

1.3 Communication failure

See ENR 1.3.

1.4 SID descriptions

1.4.1 General remarks

Transition altitude: 3000 ft AMSL.

Pilots of departing aircraft shall remain on the TWR frequency until passing 2000 ft AMSL. When passing 2000 ft AMSL pilots shall change to the APP frequency and report the altitude in order for ATC to verify mode C.

Turn radii based on a 25° bank angle. Radial interception angle: 45°.

The SIDs are based on an average climb rate of 2000 ft/min.

SIDs have to be considered as minimum noise routings which shall be strictly adhered to. MAX speed below FL 100: 250 KT IAS.

Initiate turns in due time in order not to overshoot radials.

RNAV: the Netherlands highly recommends the use of pre-programmed (RNAV) routes. Within the TMAs these RNAV routes shall be considered as overlays of conventional routes. An RNAV route may result in a different path (vertically: turn altitudes and/or laterally: turn anticipation effects) compared to the conventional route. By making use of the FMS route functionalities, a significant part of the noise production is shifted to less sensitive noise areas. Therefore, using RNAV will not result in route violations.

The descriptions of the Maastricht Aachen SIDs are extended with additional information intended for database coding only. The SIDs are provided with:

EH-waypoints. These points define unnamed intersections, turning points, positions etc.
Route definition by means of publishing the sequence of relevant waypoints. It is prohibited to code other waypoints.

Furthermore:

Connect FMS/autopilot as early as possible.

Turn anticipation is mandatory for all waypoints except those which are underlined. These waypoints shall be overflown.

The EH-waypoints shall not be used in RTF procedures.

2 Specific remarks

Pilots unable to comply with the crossing condition 2.5 MAS 251 at or above 3500 ft AMSL, have to inform Beek ATC before departure. The minimum climb gradient of 10.3 percent is required due to glider activities in ATZ and SRZ Schinveld.

Pilots unable to comply with the crossing condition ULPEN at FL 060, have to inform Beek ATC before departure. The minimum climb gradient of 5.8 percent

(OLNO 2A) or 6.6 percent (OLNO 2B) is required due to the airspace structure. Only for aircraft with destination EHGG, MAX FL 095. Only for aircraft with destination EHTW, MAX FL 095.

Only for aircraft with destination EHAM, MAX FL 075. Only for aircraft with destination EDDK.

1,4,3 SIDs RWY 03

DESIGNATOR	RWY 03 (see chart	AD 2.EHBK-SID-03	-	DEDARTURE
[ARINC code]/ specific remarks applicable (see	ROUTE Lateral (RNAV: sequence of relevant waypoints; see	Vertical	Contact	DEPARTURE Climb to maintain
EHBK AD 2.22 paragraph 1.4.2)	general remarks in EHBK AD 2.22 paragraph 1.4.1)			
NETEX 1A [NETE1A] / 1	Minimum climb gradient 10.3% to 3500 ft AMSL. Track 033° MAG. At 750 ft AMSL turn right to track 048° MAG to intercept MAS 251 inbound to MAS VOR to intercept MAS 029 to NETEX (24.4 MAS). RNAV: THR 03 / At 750 ft AMSL turn right / EH315 / EH317 / MAS / PIMIP / NETEX	2.5 MAS 251 / EH317 at or above 3500 ft AMSL. 4.7 MAS 029 / PIMIP at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060
NORVENICH 1A [NOR1A] /	Track 033° MAG. At 750 ft AMSL turn right to track 071° MAG. At 5.6 MAS turn right to track 158° MAG (turn MAX 220 KT IAS) to intercept NOR 268 inbound to NOR VOR. RNAV: THR 03 / At 750 ft AMSL turn right / EH316 / EH319 / ELBED / NOR	5.6 MAS or EH316 at or above 2000 ft AMSL. 24.3 NOR / ELBED at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060
OLNO 2A [LNO2A] / <u>2</u>	Minimum climb gradient 5.8% to FL 060. Track 033° MAG. At 750 ft AMSL turn right to track 071° MAG. At 5.6 MAS turn right to track 158° MAG (turn MAX 220 KT IAS) to intercept LNO 040 inbounce to LNO VOR. RNAV: THR 03 / At 750 ft AMSL turn right / EH316 / EH318 / ULPEN / LNO	2000 ft AMSL. I 13.1 LNO / ULPEN at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060
OSGOS 1A (OSGO1A] / 1	Minimum climb gradient 10.3% to 3500 ft AMSL. Track 033° MAG. At 750 ft AMSL turn right to track 048° MAG to intercept MAS 251 inbound. At 2.5 MAS turn left to intercept MAS 353 to OSGOS (12.8 MAS). RNAV: THR 03 / At 750 ft AMSL turn right / EH315 / EH317 / MAS / OSGOS	2.5 MAS 251 / EH317 at or above 3500 ft AMSL. 12.8 MAS 353 / OSGOS at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060
PESER 2A PESE2A] / 1, <u>5</u>	Minimum climb gradient 10.3% to 3500 ft AMSL. Track 033° MAG. At 750 ft AMSL turn right to track 048° MAG to intercept MAS 251 inbound. At 2.5 MAS turn left to intercept MAS 353 to OSGOS to SOPVI. At SOPVI track 305° MAG (QDM EHN 305°) to EHN NDB to intercept HSD 106 inbound to BREDA (20.7 EHV) to PESER (33.3 EHV). RNAV: THR 03 / At 750 ft AMSL turn right / EH315 / EH317 / MAS / OSGOS / SOPVI / EHN / BREDA / PESER	2.5 MAS 251 / EH317 at or above 3500 ft AMSL. 12.8 MAS 353 / OSGOS at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060
REKKEN 2A RKN2A] / 1, <u>4</u>	Minimum climb gradient 10.3% to 3500 ft AMSL. Track 033° MAG. At 750 ft AMSL turn right to track 048° MAG to intercept MAS 251 inbound. At 2.5 MAS turn left to intercept MAS 353 to OSGOS to SOPVI. At SOPVI track 358° MAG to RUMER to intercept MAS 356 to intercept RKN 249 inbound to RKN VOR. RNAV: THR 03 / At 750 ft AMSL turn right / EH315 / EH317 / MAS / OSGOS / SOPVI / RUMER / BASGU / RKN	2.5 MAS 251 / EH317 at or above 3500 ft AMSL. 12.8 MAS 353 / OSGOS at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060
VEROR 4A [VERO4A] / 1, <u>3</u>	Minimum climb gradient 10.3% to 3500 ft AMSL. Track 033° MAG. At 750 ft AMSL turn right to track 048° MAG to intercept MAS 251 inbound. At 2.5 MAS turn left to intercept MAS 353 to OSGOS to SOPVI. At SOPVI track 358° MAG to RUMER to intercept MAS 356 to intercept RKN 249 inbound. At 24 RKN turn left to track 001° MAG to TENLI (57.2 EEL). Continue track 001° MAG to intercept EEL 213 inbound to VEROR (18.8 EEL). RNAV: THR 03 / At 750 ft AMSL turn right / EH315 / EH317 / MAS / OSGOS / SOPVI / RUMER / BASGU / EH523 / TENLI / EH521 / VEROR	FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060

1.4.4 SIDs RWY 21

DESIGNATOR	RWY 21 (see chart AD 2.EHBK-SID-21)									
[ARINC code]/ specific remarks	ROUTE		AFTER I	DEPARTURE						
applicable (see EHBK AD 2.22 paragraph 1.4.2)	Lateral (RNAV: sequence of relevant waypoints; see general remarks in EHBK AD 2.22 paragraph 1.4.1)	Vertical	Contact	Climb to maintain						
NETEX 1B [NETE1B] / -	Track 213° MAG. At 9.5 MAS turn left to intercept MAS 219 inbound to intercept MAS 029 to NETEX (24.4 MAS). RNAV: THR 21 / EH320 / MAS / PIMIP / NETEX	MAS at or above FL 045. 4.7 MAS 029 / PIMIP at FL 060.	ft AMSL: 123.975 MHz	FL 060						
NORVENICH 1B [NOR1B] /	Track 213° MAG. At 9.5 MAS turn left to track 109° MAG to intercept NOR 268 inbound to NOR VOR. RNAV: THR 21 / EH321 / EH319 / ELBED / NOR	24.3 NOR / ELBED at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060						
OLNO 2B [LNO2B] / 2	Minimum climb gradient 6.6% to FL 060. Track 213° MAG. At 9.5 MAS turn left to track 109° MAG. At LNO 028 turn right to intercept LNO 040 inbound to LNO VOR. RNAV: THR 21 / EH321 / EH323 / ULPEN / LNO	13.1 LNO / ULPEN at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060						
OSGOS 1B [OSGO1B] / -	Track 213° MAG. At 9.5 MAS turn left to intercept MAS 219 inbound to intercept MAS 353 to OSGOS (12.8 MAS). RNAV: THR 21 / EH320 / MAS / OSGOS	MAS at or above FL 045. 12.8 MAS 353 / OSGOS at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060						
PESER 2B [PESE2B] / <u>5</u>	Track 213° MAG. At 9.5 MAS turn left to intercept MAS 219 inbound to intercept MAS 353 to OSGOS to SOPVI. At SOPVI track 305° MAG (QDM EHN 305°) to EHN NDB to intercept HSD 106 inbound to BREDA (20.7 EHV) to PESER (33.3 EHV). RNAV: THR 21 / EH320 / MAS / OSGOS / SOPVI / EHN / BREDA / PESER	MAS at or above FL 045. 12.8 MAS 353 / OSGOS at FL 060.	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060						
REKKEN 2B [RKN2B] / 4	Track 213° MAG. At 9.5 MAS turn left to intercept MAS 219 inbound to intercept MAS 353 to OSGOS to SOPVI. At SOPVI track 358° MAG to RUMER to intercept MAS 356 to intercept RKN 249 inbound to RKN VOR. RNAV: THR 21 / EH320 / MAS / OSGOS / SOPVI / RUMER / BASGU / RKN	12.8 MAS 353 /	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060						
VEROR 4B [VERO4B] / 3	Track 213° MAG. At 9.5 MAS turn left to intercept MAS 219 inbound to intercept MAS 353 to OSGOS to SOPVI. At SOPVI track 358° MAG to RUMER to intercept MAS 356 to intercept RKN 249 inbound. At 24 RKN turn left to track 001° MAG to TENLI (57.2 EEL). Continue track 001° MAG to intercept EEL 213 inbound to VEROR (18.8 EEL). RNAV: THR 21 / EH320 / MAS / OSGOS / SOPVI / RUMER / BASGU / EH523 / TENLI / EH521 / VEROR	12.8 MAS 353 /	Passing 2000 ft AMSL: 123.975 MHz Beek APP	FL 060						

2 INSTRUMENT APPROACH PROCEDURES MAASTRICHT AACHEN AIRPORT

2.1 Introduction

The arrival, instrument approach and holding procedures are based on ICAO Annex 2 and on ICAO Documents 4444-ATM/501 (PANS-ATM), 7030 (SUPPS) and 8168-OPS/611 (PANS-OPS). During initial and intermediate approach to Maastricht Aachen Airport radar services may be provided by Beek APP. With respect to procedures extending outside the Maastricht TMA special arrangements have been made between Beek APP/TWR and the appropriate German and Belgian ATC units.

2.1.1 Specific remarks

OSGOS STAR only for departures within Amsterdam FIR. TENLI STAR only for departures from EHTW. RUMER STAR only for departures from EHGG. MODRU STAR only for departures from EDLN.

2.2 Arrival

2.2.1 Inbound clearance

Upon initial contact at or before entering the TMA, Beek APP will issue an inbound clearance containing:

Standard arrival route (STAR, see AD 2.EHBK-STAR.1 and AD 2.EHBK-STAR.2). Level (flight level or altitude). Approach instructions (see 2.3.2). Expected approach time (EAT), when a delay of 30 minutes or more is expected.

2.3 Initial approach

2.3.1 Holding and entry procedures

Holding and entry procedures and the calculations of the associated protected areas are in accordance with PANS-OPS Volume II, part 4. Since separation is based on the calculated areas, compliance with these in-flight procedures is essential.

2.3.2 Approach instructions

Approach instructions are included in the inbound clearance issued on initial contact (see 2.2.1). Approach instructions will contain as applicable:

Additional instructions with respect to clearance limit, route and level. Approach procedure. Runway in use¹⁾.

EAT, if holding procedures are applied. ONH.

Transition level $\frac{1}{2}$. MET information $\frac{1}{2}$. Runway condition $\frac{1}{2}$.

during the hours of ATIS broadcast (see EHBK AD 2.18), item may be omitted as far as it is included in the ATIS broadcast.

2.4 Intermediate approach

2.4.1 RNAV approach procedures

Special approaches based on RNAV can be initiated by ATC in order to reduce noise nuisance, fuel consumption, and to provide flexible and efficient ATC dispatch.

2.4.2 General

The RNAV operations in the Maastricht TMA are developed in accordance with ICAO PANS-OPS criteria with the following safeguards:

The RNAV section of the inbound route is situated above the initial segment of the initial approach procedure above MSA/MFA/MRVA.

The RNAV part is complete on entering the intermediate segment in which ILS-LOC interception takes place. The operations are strictly radar monitored by ATC.

2.4.2.1 RNAV approach procedures

On initiative of ATC, aircraft may be instructed to intercept the ILS via an RNAV initial approach segment. Clearances and altitudes:

These approaches start at a RNAV waypoint provided with a pronounceable five-letter designator.

The RNAV procedures provide a lateral route onto the final approach.

Altitudes and IAS will be as instructed by ATC.

The approach clearance includes clearance to execute the ILS approach and intercept the glide path from the last instructed altitude.

At ATC discretion only.

Further details are published in paragraph 2.8.2 and on the relevant instrument approach charts.

2.4.2.2 Aircraft requirements

-RNAV in line with TGL-10 is an advantage but is not yet explicitly required.

P-RNAV equipment shall be certified to TGL Nos. 2 (rev. 1), 3 (rev. 1) or 10. The navigation system shall make use of a database in which the fixed route structure is stored in advance and available to the pilot during flight.

The navigation equipment must be capable of applying turn anticipation at fly-by waypoints

The navigation equipment must be capable of handling fly-by as well as fly-over waypoints in a mixed sequence.

Aircraft unable to met the mentioned requirements shall react with the phraseology "UNABLE RNAV" if instructed to fly RNAV approach procedures. These aircraft will be guided by radar vectors or rerouted via conventional navigation aids.

2.5 Final approach

2.5.1 Final approach procedure

In principle the final approach will be conducted on the ILS of the main landing runway.

Instrument approaches to RWY 03 and 21 can be made with the assistance of ILS/DME or NDB/DME

2.5.3 ILS operations

2,5,3,1 Clearances

ATC will apply safeguards and procedures for ILS operations in relation to weather conditions to facilitate CAT I, CAT II and CAT III operations. However, it will be applied irrespective of the actual category of operations flown, which is on pilot's decision. As a consequence the approach clearance provided by ATC is based on traffic only. During the approach pilots will be informed of:

any known unserviceabilities of aids and/or downgrading when applicable.

significant changes in surface wind (speed and direction).

changes in RVR.

2.5.3.2 Practice ILS appraoches

Pilots who wish to practise ILS CAT II or CAT III approaches have to request this on intitial contact with Beek APP using the phrase: "Request practice CAT II or CAT III approach".

Due to damage on the ground caused by aircraft on short final RWY 21, it is emphasized that no instrument and/or visual approach shall be made at an angle less than the ILS glidepath or less than 5.2% (3 DEG) if no ILS is available.

2.5.5 Visual approach

A visual approach will only be allowed or offered if the visibility is at least 5 km and the cloud base at least 1500 ft AMSL. To minimize noise nuisance aircraft executing a visual approach shall intercept the final approach leg at an altitude of at least 1400 ft AMSL, unless residential areas can be avoided. Visual approaches during night hours are not allowed, see EHBK AD 2.20 paragraph 1

For each available landing runway at Maastricht Aachen Airport a circling approach may be allowed or offered. For OCA (OCH) see relevant instrument approach chart AD 2.EHBK-IAC-xx.x.

2.6 Missed approach procedure

2.6.1 General

All turns shall be the shortest turn and in case of a 180° turn that turn shall be to the left, unless otherwise specified below or instructed by ATC.

2.6.2 Missed approach procedure during instrument approach

See relevant instrument approach chart AD 2,EHBK-IAC-xx,x

2.6.3 Missed approach procedure during visual approach

Turn to the intended landing runway, intercept the runway track MAG of that runway while:

When visual:

remain visual and inform ATC or

When unable to remain visual: climb to 2000 ft AMSL and inform ATC.

2.6.4 Missed approach while circling to land

Note: This procedure is different from ICAO Doc 8168 Volume I (PANS-OPS)

Inform ATC immediately. Start climbing and complete the turn to the intended landing runway (see figure).

Intercept the MAG track of that runway while climbing to 2000 ft AMSL



2.7 Communication failure

The pilot of an IFR flight shall follow the general procedures for IFR flights (see ENR 1.3 paragraph "Communication Failure"). In addition, for arriving flights, the following communication failure procedures apply

2.7.2 Inbound clearance not received

Proceed according the current flight plan to locator NW.

Maintain the last cleared and acknowledged flight level.

After arrival over locator NW, intercept the holding pattern.

Commence descent to 3000 ft AMSL (transition allittude) as near as possible to the ETO over locator NW.

After reaching 3000 ft AMSL leave locator NW and carry out an instrument approach procedure to the received and acknowledged runway, or to the landing

runway according ATIS (see AD 2.EHBK-IAC-xx.x).

2,7,3 Inbound clearance received

2.7.3.1 Traffic via standard arrival route

Proceed according the current flight plan to locator NW.

Maintain the last cleared and acknowledged flight level.

After arrival over locator NW, intercept the holding pattern.

Commence descent to 3000 ft AMSL (transition altitude), if applicable, at the EAT last received and acknowledged.

When no EAT has been received and acknowledged, commence descent to 3000 ft AMSL at or as near as possible to the ETO over locator NW. After reaching 3000 ft AMSL leave locator NW and carry out an instrument approach procedure to the assigned runway, or to the landing runway according ATIS (see AD 2.EHBK-IAC-xx.x).

2.7.3.2 Traffic outside standard arrival route

Proceed to locator NW along the route specified in the inbound clearance.

Maintain the last cleared and acknowledged flight level After arrival over locator NW, intercept the holding pattern.

Commence descent to 3000 ft AMSL (transition altitude), if applicable.

After reaching 3000 ft AMSL leave locator NW and carry out an instrument approach procedure to the assigned runway, or to the landing runway according ATIS (see AD 2.EHBK-IAC-xx.x).

3 Traffic on a transition

With clearance for approach, execute the cleared approach. Without clearance for approach:

Maintain the last cleared and acknowledged flight level.

RWY 03:

BAXIM, BOBMO, MODRU and OLNO transition: proceed direct to locator NW.

OSGOS and RUMER transition: proceed to BOGRU, at or after BOGRU direct to locator NW. RWY 21, all transitions: continue on transition via BOGRU to locator NW.

After arrival over locator NW, intercept the holding pattern.

Commence descent to 3000 ft AMSL (transition altitude), if applicable.

After reaching 3000 ft AMSL, leave the holding and carry out an instrument approach procedure to the runway concerned (see AD 2.EHBK-IAC-xx.x).

2.7.3.4 Traffic vectored to final approach

Maintain the last cleared and acknowledged level or climb to 3000 ft AMSL (minimum flight altitude), if applicable.

Proceed to the locator NW. When over locator NW descend in the holding to 3000 ft AMSL (transition altitude), if applicable.

After reaching 3000 ft AMSL leave the holding fix and carry out an instrument approach procedure to the assigned runway or to the landing runway according ATIS (see AD 2.EHBK-IAC-xx.x).

2.7.4 Missed approach procedure in case of communication failure

2.7.4.1 General

All turns shall be the shortest turn and in case of a 180° turn that turn shall be to the left, unless otherwise specified below or instructed by ATC.

2.7.4.2 Missed approach procedure during instrument approach

See relevant instrument approach chart AD 2.EHBK-IAC-xx.x.

2.7.4.3 Missed approach procedure during visual approach

Turn to the intended landing runway, intercept the runway track MAG of that runway while:

When visual:

remain visual and execute another circuit for that runway or

When unable to remain visual: climb to 3000 ft AMSL.

when passing 2300 ft AMSL start the shortest climbing turn to locator NW.

cross locator NW at 3000 ft AMSL and hold or execute an instrument approach procedure as depicted on the relevant instrument approach chart AD 2 FHBK-IAC-xx x

2.7.4.4 Missed approach while circling to land

Note: This procedure is different from ICAO Doc 8168 Volume I (PANS-OPS)

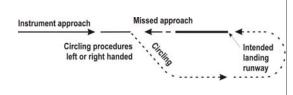
Start climbing and complete the turn to the intended landing runway (see figure)

Intercept the MAG track of that runway while

climbing to 3000 ft AMSL When passing 2300 ft AMSL start the shortest

climbing turn to locator NW.

Cross locator NW at 3000 ft AMSL and hold or execute the instrument approach procedure again.



2.8 Instrument approach descriptions

2.8.1 General remarks

Between the IAF and interception of final approach navigation is based on radar vectors provided by ATC, except in case of an RNAV procedure. Both ILS systems are not equipped with markers.

2.8.2 RNAV procedures

(see also EHBK AD 2.22 paragraph 2.4)

Navigation in the initial and intermediate approach segment is primarily based on radar vectors provided by ATC. However RNAV approaches to the main landing runways are available. The use of RNAV approaches is at ATC discretion and ILS/DME must be available

In order to minimise noise nuisance on the ground the so-called transitions have been developed through which low-noise continuous descents can be executed. The transitions provide lateral guidance only. The transitions begin at BAXIM, BOBMO, MODRU, OLNO, OSGOS or RUMER. Altitude and speed will be as instructed by ATC. For various positions along the route, minimum altitudes and fixed speeds are given on the instrument approach charts which must be respected. A published speed shall be reached at or before the position where the speed value applies.

The example of ATC instruction "Cleared for BOGRU approach RWY 21" implies clearance to fly the published route and ILS approach to the relevant runway. In this case the pilot is free to optimise the vertical and/or speed profile.

2.8.3 Instrument approach segments

Note: for positions of EH waypoints see relevant instrument approach charts.

Depends upon the RNAV system. Final segment is the only place in the procedure where a CF coding may be used. The use of this EH waypoint depends on the RNAV system used.

2.8.3.1 BEMTI 1A approach RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	BEMTI		IF			+3000		305° / 4.9
	EH302	IF	TF		R		210	033° / 1.6
	EH303	FAF	TF			1800		033° / 1.8
	Additional	information final ap	proach and initia	al misse	ed appro	ach		

ВЕМП	EH310		TF (CF)1)2)			033° / 2.6	
	THR 03	MAPt	TF (CF)1)	Υ	ELEV 365.5	033°	
		Initial missed approach	FM		2000		

2.8.3.2 BAXIM 1A transition RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	BAXIM	IAF	IF			ATC		226° / 10.3
	EH309		TF		L	+3500		214° / 4.7
	BERIR		TF		R	+3000		305° / 5.0
	EH302	IF	TF		R		210	033° / 1.6
BAXIM	EH303	FAP	TF			1800		033° / 1.8
BAXIVI	Additional	information final a	proach and init	ial misse	ed appro	oach		
	EH310		TF (CF) ¹⁾²⁾					033° / 2.6
	THR 03		TF (CF)1)	Υ		ELEV 365.5		033°
	_	Initial missed approach	FM			2000		

2.8.3.3 BOBMO 1A transition RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	вовмо	IAF	IF			ATC		198° / 17.4
	EH309		TF		R	+3500		214° / 4.7
	BERIR		TF		R	+3000		305° / 5.0
	EH302	IF	TF		R		210	033° / 1.6
ВОВМО	EH303	FAP	TF			1800		033° / 1.8
DODIVIO	Additional	information final a	pproach and initi	ial miss	ed appro	oach		
	EH310		TF (CF) ¹⁾²⁾					033° / 2.6
	THR 03		TF (CF) ¹⁾	Υ		ELEV 365.5		033°
	_	Initial missed approach	FM			2000		

2.8.3.4 MODRU 1A transition RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM to next WPT
	MODRU	IAF	IF			ATC		220° / 14.1
	EH309		TF		L	+3500		214° / 4.7
	BERIR		TF		R	+3000		305° / 5.0
	EH302	IF	TF		R		210	033° / 1.6
MODRU	EH303	FAP	TF			1800		033° / 1.8
VIODRO	Additional	information final a	proach and init	ial miss	ed appro	oach		
	EH310		TF (CF) ¹⁾²⁾					033° / 2.6
	THR 03		TF (CF) ¹⁾	Υ		ELEV 365.5		033°
	_	Initial missed approach	FM			2000		

2.8.3.5 OLNO 1A transition RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	OLNO		IF			ATC		015° / 11.5
	BERIR	IAF	TF		L	+3000		305° / 5.0
	EH302	IF	TF		R		210	033° / 1.6
	EH303	FAP	TF			1800		033° / 1.8
OLNO	Additional	information final ap	proach and initi	al misse	ed appro	oach		
	EH310		TF (CF) ¹⁾²⁾					033° / 2.6
	THR 03		TF (CF) ¹⁾	Υ		ELEV 365.5		033°
		Initial missed approach	FM			2000		

2.8.3.6 OSGOS 1A transition RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	OSGOS	IAF	IF		R			181° / 7.9
	BOGRU		TF		R			190° / 13.1
	EH309		TF		R	+3500		214° / 4.7
	BERIR		TF		R	+3000		305° / 5.0
	EH302	IF	TF		R		210	033° / 1.6
osgos	EH303	FAP	TF			1800		033° / 1.8
	Additional	information final ap	proach and initi	ial misse	ed appro	oach		
	EH310		TF (CF) ¹⁾²⁾					033° / 2.6
	THR 03		TF (CF) ¹⁾	Υ		ELEV 365.5		033°
		Initial missed approach	FM			2000		

2.8.3.7 RUMER 2A transition RWY 03

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	RUMER	IAF	IF		R	ATC		178° / 22.3
	SOPVI		TF		L			173° / 4.0
	OSGOS		TF		R			181° / 7.9

	BOGRU		TF	R	:			190° / 13.1	
	EH309		TF	R	:	+3500		214° / 4.7	
	BERIR		TF	R	:	+3000		305° / 5.0	
RUMER	EH302	IF	TF	R	:		210	033° / 1.6	
	EH303	FAP	TF			1800		033° / 1.8	
	Additiona	I information final a	pproach and init	tial missed	appr	oach			
	EH310		TF (CF) ¹⁾²⁾					033° / 2.6	
	THR 03		TF (CF)1)	Υ		ELEV 365.5		033°	
		Initial missed approach	FM			2000			

2.8.3.8 BAXIM 1B transition RWY 21

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	BAXIM	IAF	IF			ATC		334° / 4.0
	EH305		TF		L	+4000		303° / 3.9
	BOGRU	IF	TF		L		210	213° / 3.0
	EH306	FAP	TF			2500		213° / 2.3
BAXIM	Additional	information final ap	proach and initi	al misse	ed appro	oach		
	EH311		TF (CF) ¹⁾²⁾					213° / 4.2
	THR 21		TF (CF) ¹⁾	Υ		ELEV 370.7		213°
		Initial missed approach	FM			2000		

2.8.3.9 BOBMO 1B transition RWY 21

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	вовмо	IAF	IF			ATC		221° / 4.8
	BOGRU	IF	TF		L		210	213° / 3.0
	EH306	FAP	TF			2500		213° / 2.3
вовмо	Additional	information final ap	proach and initi	al misse	d appro	ach		
ВОВІЛІО	EH311		TF (CF)1)2)					213° / 4.2
	THR 21		TF (CF)1)	Υ		ELEV 370.7		213°
	_	Initial missed approach	FM			2000		

2.8.3.10 MODRU 1B transition RWY 21

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	MODRU	IAF	IF			ATC		287° / 7.0
	BOGRU	IF	TF		L		210	213° / 3.0
	EH306	FAP	TF			2500		213° / 2.3
MODRU	Additional	information final a	oproach and initi	al misse	ed appro	oach		
INIODRO	EH311		TF (CF) ¹⁾²⁾					213° / 4.2
	THR 21		TF (CF) ¹⁾	Υ		ELEV 370.7		213°
	_	Initial missed approach	FM			2000		

2.8.3.11 OLNO 1B transition RWY 21

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	OLNO		IF			ATC		015° / 11.5
	BERIR	IAF	TF		R			030° / 16.8
	EH305		TF		L	+4000		303° / 3.9
	BOGRU	IF	TF		L		210	213° / 3.0
OLNO	EH306	FAP	TF			2500		213° / 2.3
OLINO	Additional	information final a	oproach and initi	al misse	ed appro	oach		
	EH311		TF (CF)1)2)					213° / 4.2
	THR 21		TF (CF) ¹⁾	Υ		ELEV 370.7		213°
		Initial missed approach	FM			2000		

2.8.3.12 OSGOS 1B transition RWY 21

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	osgos	IAF	IF			ATC		181° / 7.9
	BOGRU	IF	TF		L		210	213° / 3.0
	EH306	FAP	TF			2500		213° / 2.3
osgos	Additional	information final ap	proach and initi	al misse	ed appro	pach		
03603	EH311		TF (CF)1)2)					213° / 4.2
	THR 21		TF (CF) ¹⁾	Υ		ELEV 370.7		213°
		Initial missed approach	FM			2000		

2.8.3.13 RUMER 2B transition RWY 21

Designator	WPT	Function in approach	Path terminator	Fly over	Turn	Altitude (ft AMSL)	Speed (KT IAS)	Track (MAG)/Distance (NM) to next WPT
	RUMER	IAF	IF		R	ATC		178° / 22.3
	SOPVI		TF		L			173° / 4.0
	OSGOS		TF		R			181° / 7.9
	BOGRU	IF	TF		L		210	213° / 3.0

RUMER	R EH306	FAP	TF		2500	213° / 2.3	
		information fi	nal approach and init	ial mis	ssed approach		
	EH311		TF (CF) ¹⁾²⁾			213° / 4.2	
	THR 21		TF (CF) ¹⁾	Υ	ELEV 370.7	213°	
		Initial misse approach	d FM		2000		

3 LOW VISIBILITY PROCEDURES

During periods of limited visibility the overall ATC capacity is reduced. To guarantee aircraft safety and optimal use of ATC capacity, Maastricht Aachen Airport uses ATC low visibility procedures. These procedures are based on ICAO DOC 9476/1 (Surface Movement Guidance and Control Manual) and ECAC DOC 17 (Ground operations in limited visibility conditions)

The ATC low visibility procedures are categorised in four phases (A, B, C and D), that are based on visibility or RVR values and cloud base.

Phase	Limits
Α	550 m <= visibility <= 2000 m (or 550 m <= RVR <= 1500 m) and/or 200 ft <= cloud base <= 300 ft (Lowest RVR of landing runway in use)
В	350 m <= RVR < 550 m and/or cloud base < 200 ft (Lowest RVR of landing runway in use)
С	200 m <= RVR < 350 m (Lowest RVR of landing runway in use)
D	RVR < 200 m (Lowest RVR of landing runway in use)

The ATC low visibility procedures become effective when the general visibility equals or drops below 2000 m or when the lowest RVR of the landing runway in use equals or drops below 1500 m and/or the cloud base is equal to or less than 300 ft. First, the minimum separation for arriving aircraft and the departure interval will be increased. Next, runway use will be restricted.

Pilots should not request start-up permission unless the RVR values for the take-off runway are above the take-off limits for the flight. Pilots should be informed about the RVR minima that apply to their flight, so that they can readily respond to requests about these minima.

If the runway stop bars are out of service, additional restricitions apply.

During LVP all runway entries and runway crossings are safeguarded by switchable (remote controlled) or fixed stop bars (see <u>AD 2.EHBK-ADC</u>). Crossing of activated stop bars is prohibited. Traffic may proceed only after ATC clearance and when the stop bar lights are switched off (ICAO Annex 2).

4 VFR FLIGHT PROCEDURES AND REGULATIONS

Note: for visual approach chart and visual traffic circuits see AD 2.EHBK-VAC.1 and AD 2.EHBK-VAC.2

4.1 General

All VFR flights within the Maastricht CTR and the Maastricht TMA 1 and 2 shall submit a flight plan (see ENR 1.10).

Flying within the Maastricht CTR and the Maastricht TMA 1 and 2 is restricted to aircraft maintaining two-way radio communication with Beek ATC, unless prior permission from Beek ATC has been obtained. Such permission will only be given in extraordinary cases. Prior permission is required from Beek APP for all VFR operations in Maastricht TMA 1 and 2.

rior permission is required from Beek TWR for all VFR operations in the CTR.

VFR flights to and from Maastricht Aachen airport shall be carried out via the approach/departure routes unless otherwise instructed by ATC or when approved by ATC on pilot's request.

Noise abatement has been included in the procedures.

Built-up areas shall be avoided as much as possible

Marked areas shall be avoided.

.S areas: VFR flights within the CTR may be instructed by ATC to stay clear of the specified ILS area. These areas are indicated on AD 2.EHBK-VAC VFR traffic instructed by Beek ATC to squawk a specific SSR transponder code, shall maintain this squawk within the lateral limits of Maastricht TMA 1 and 2.

Note: pilots operating outside the CTR should avoid crossing the final approach area of the instrument RWY 21 at altitudes at or near the initial approach altitude (3000

Note: pilots are urgently requested not to execute VFR flights in the vicinity of the published instrument arrival and departure routes within the Maastricht TMA, which

Visual departure procedures for light aircraft

Pilots must have obtained start-up clearance from ATC before starting engines. A request for start-up shall be made to Beek Delivery; clearance for start-up will either be issued immediately or at a specified time depending on traffic. A request for start-up shall include:

aircraft identification and type (e.g. PHGON Cessna 172).

position (e.g. hangar 1).
ATIS information (e.g. information 'P').

flight rules (e.g. VFR).

destination (e.g. Rotterdam). request start-up (request start-up).

Taxiing on taxiways: pilots of aircraft intending to taxi on the taxiways shall obtain a clearance from Beek TWR.

Taxiing on the apron: aircraft not maintaining two-way communication and intending to taxi on the apron must obtain prior permission from the airport authority. Departing aircraft shall climb as soon as possible and do not turn before passing the departure end of the runway.

Leave the CTR via an indicated route at 1300 ft AMSL.

RWY 03 BRAVO Departure After take-off turn left towards the canal and follow the VFR route to SIERRA and BRAVO. After take-off turn left and follow the VFR route via GOLF to MIKE. Do not report over GOLF unless otherwise instructed by ATC. MIKE Departure UNIFORM Departure After take-off turn right to follow the high tension line to HOTEL, then continue the route to UNIFORM. **RWY 21** BRAVO Departure After take-off turn right and follow the VFR route via GOLF to BRAVO. Do not report over GOLF unless otherwise instructed by ATC. After take-off turn right towards the canal and follow the VFR route to INDIA and MIKE. MIKE Departure UNIFORM Departure After take-off turn left and follow the VFR route via ROMEO to UNIFORM. Do not report over ROMEO unless otherwise instructed by ATC.

4.3 Visual approach procedures for light aircraft

Contact Beek TWR in time for an entry clearance for the CTR.

Enter the CTR at 1800 ft AMSL and maintain this altitude, proceed via an indicated VFR route (BRAVO, MIKE or UNIFORM) unless otherwise instructed. Pilots may be instructed to hold over the points SIERRA, HOTEL or INDIA.

Join the circuit as instructed by ATC.

In case of a missed approach climb straight ahead to 1300 ft AMSL and inform ATC.

Visual traffic circuits for single-engine propeller aircraft (MTOW < 2000 kg) RWY 03: righthand circuit at 1300 ft AMSL. RWY 21: lefthand circuit at 1300 ft AMSL.

Note: western traffic circuit must be avoided as much as possible due to noise abatement; for traffic reasons pilots may be instructed to fly a western circuit.

Visual traffic circuits for small jets (MTOW < 5700 kg) and multi-engine propeller aircraft

RWY 03: righthand circuit at 1800 ft AMSL.

www.ais-netherlands.nl/aim/120126-120308/eAIP/html/index-en-GB.html

RWY 21: lefthand circuit at 1800 ft AMSL. 4.5 Communication failure procedures

4.5.1 General

Select SSR code 7600.

4.5.2 VFR outbound

In case of communication failure adhere to the departure instructions if the departure instructions contain a clearance limit in the CTR, act in accordance with paragraph 4.5.4.

4.5.3 VFR inbound

Via BRAVO and MIKE Arrival

In case of communication failure before joining the circuit leave the CTR according to the BRAVO or MIKE Departure and divert to an appropriate aerodrome. In case of communication failure over or after a position from where to join the circuit (this is past the compulsory reporting point GOLF) execute a circuit for the last received and acknowledged runway as short as practicable. Make a full stop landing and vacate as soon as possible. In case of go around execute a similar circuit (be aware of the fact that your flightpath could interfere with the flightpath of other aerodrome traffic).

4.5.3.2 Via UNIFORM Arrival

In case of communication failure before joining the circuit leave the CTR according to the UNIFORM Departure and divert to an appropriate aerodrome. In case of communication failure over or after a position from where to join the circuit (this is past compulsory reporting point ROMEO) act in accordance with paragraph 4.5.3.1 item b.

4.5.3.3 Via a different route to the aerodrome

In case of communication failure before joining the circuit act in accordance with paragraph 4.5.4.

In case of communication failure over or after a position from where to join the circuit act in accordance with paragraph 4.5.3.1 item b.

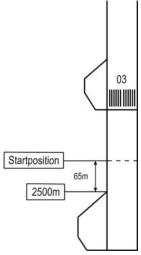
In case of communication failure leave the CTR via the shortest route, maintain altitude until outside the CTR, do not cross runway centre lines or the ILS areas of RWYs 03 and 21 and proceed to an appropriate aerodrome.

EHBK AD 2.23 ADDITIONAL INFORMATION

1 CAUTIONS AND ADDITIONAL INFORMATION

1.1 Determination of datum line for start position take-off RWY 03

The loss of runway length due to alignment of the aircraft prior to take-off shall be taken into account for the calculation of the aircraft's take-off weight.



1.2 Runway turnpad

A runway tumpad is situated at the threshold RWY 03 and at the end of RWY 21.

The turnpad at the threshold RWY 03 shall be used: during UDP;

aircraft with MAX wingspan 52 m;

when LVP are not in operation; in case of rejected take-off RWY 21;

after landing RWY 21.

The turnpad at the threshold RWY 03 is marked by a yellow guidance line and blue edge lights outside the edge of the turnpad. In the area of the turnpad, the edge of the runway is equipped with white inset edge lights.

The turnpad at the end of RWY 21 shall be used (with power setting below breakaway thrust) in case of:

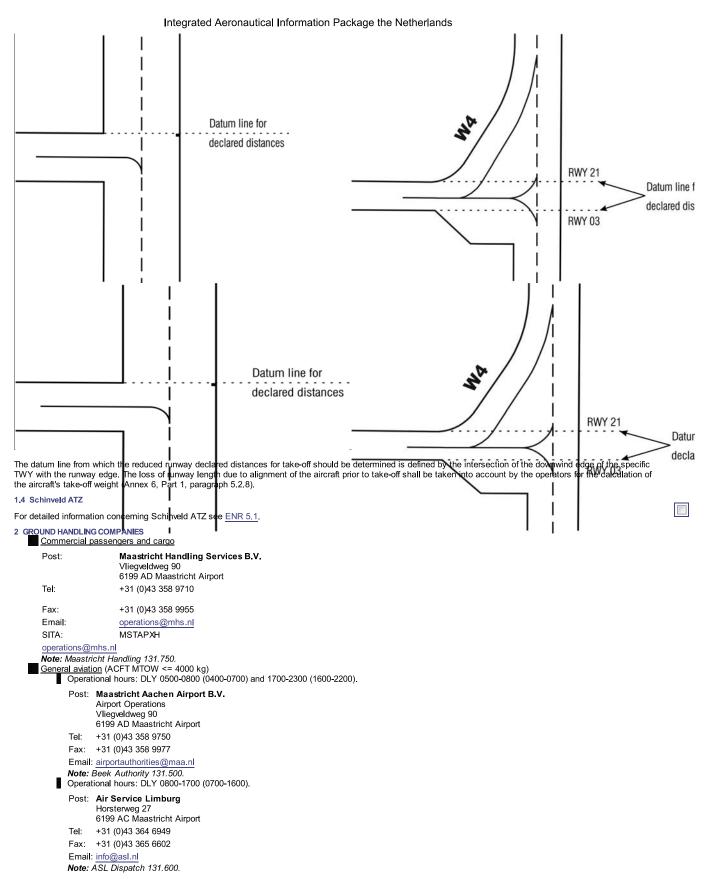
rejected take-off RWY 21 and missing the turnpad at threshold RWY 03; rejected take-off RWY 21 and preferring this turnpad to the turnpad at threshold RWY 03;

landing RWY 21 and preferring this turnpad to the turnpad at threshold RWY 03;

full length take-off RWY 03.

The turnpad at the end of RWY 21 is marked by a yellow guidance line, unidirectional green centre line lights and blue edge lights outside the edge of the turnpad. In the area of the turnpad, the edge of the runway is equipped with white inset edge lights.

1.3 Determination of datum line for intersection take-off



EHBK AD 2.24 CHARTS RELATED TO AN AERODROME

Type of chart	Page
Aerodrome chart	AD 2.EHBK-ADC ./graphics/eAIP/EH-AD-2.EHBK-ADC.pdf
Aircraft parking / docking chart	AD 2.EHBK-APDC
Aerodrome obstacle chart type A RWY 03/21	AD 2.EHBK-AOC-03-21
Precision approach terrain chart RWY 21	AD 2.EHBK-PATC-21 ./graphics/eAIP/EH-AD-2.EHBK-PATC- 21.pdf
Standard instrument departure chart	AD 2.EHBK-SID-OVERVIEW ./graphics/eAIP/EH-AD-2.EHBK-SID-OVERVIEW.pdf

Standard instrument departure chart RWY 03 AD 2.EHBK-SID-03 ../graphics/eAIP/EH-AD-2.EHBK-SID-03.pdf
AD 2.EHBK-SID-21 Standard instrument departure chart RWY 21 ./graphics/eAIP/EH-AD-2.EHBK-SID-21.pdf Standard arrival chart AD 2.EHBK-STAR.1 ../graphics/eAIP/EH-AD-2.EHBK-STAR-1.pdf Standard arrival chart AD 2.EHBK-STAR.2 ../graphics/eAIP/EH-AD-2.EHBK-STAR-2.pdf Instrument approach chart RWY 03 ILS/DME and BEMTI approach AD 2.EHBK-IAC-03.1 ../graphics/eAIP/EH-AD-2.EHBK-IAC-03-1.pdf Instrument approach chart RWY 03 BAXIM, BOBMO, MODRU, OLNO, RUMER and OSGOS RNAV transitions ILS/DME AD 2.EHBK-IAC-03.2 n/graphics/eAIP/EH-AD-2.EHBK-IAC-03-2.pdf Instrument approach chart RWY 03 NDB/DME and BEMTI AD 2.EHBK-IAC-03.3 ./graphics/eAIP/EH-AD-2.EHBK-IAC-03-3.pdf approach Instrument approach chart RWY 21 ILS/DME AD 2 EHBK-IAC-21.1 ../graphics/eAIP/EH-AD-2.EHBK-IAC-21-1.pdf Instrument approach chart RWY 21 BAXIM, BOBMO, MODRU, OLNO, RUMER and OSGOS RNAV transitions ILS/DME AD 2.EHBK-IAC-21.2 📆 ../graphics/eAIP/EH-AD-2.EHBK-IAC-21-2.pdf Instrument approach chart RWY 21 NDB/DME AD 2.EHBK-IAC-21.3 __/graphics/eAIP/EH-AD-2.EHBK-IAC-21-3.pdf AD 2.EHBK-VAC.1
./graphics/eAIP/EH-AD-2.EHBK-VAC-1.pdf Visual approach chart Visual approach chart VFR traffic circuits AD 2.EHBK-VAC.2 ./graphics/eAIP/EH-AD-2.EHBK-VAC-2.pdf