

LETTER OF AGREEMENT

Between



Langen FIR (EDLL)

AND



Belux vACC

Version: 2.1.4

Effective from October 7th, 2021

DO NOT USE THIS DOCUMENT FOR REAL WORLD AVIATION! THIS DOCUMENT IS TO BE USED WITHIN THE VATSIM ENVIRONMENT ONLY!

Change Log

| Version | Data | Changes |
|---------|---------|---|
| V2.1.0 | 01/2020 | Complete overhaul from previous version |
| V2.1.1 | 04/2020 | EDGG_T_CTR freq typo corrected |
| V2.1.2 | 04/2020 | Add silent HO section |
| V2.1.3 | 08/2021 | Add multiple HO procedures Changes in EDLL sectors |
| V2.1.4 | 10/2021 | Change EBBU_U_CTR frequency |

1. General notes

- The involved parties shall inform each other of any changes which may affect the procedures specified in this LoA.
- They shall make sure that their controllers have understood the procedures in this LoA and apply them correctly.
- Handoffs (transfer of communication shall be made at least 10 NM or 3 min prior the respective boundary (FIR border, APP airspace, delegated airspace). After handoff, traffic is released for climb, descent and turns.
- Spacing between two aircrafts on same level and same routing shall be at least 5 NM.
- Flight level allocation:
 - from Langen ACC (EDLL) to Brussels ACC on EVEN flightlevels.
 - from Brussels ACC to Langen ACC (EDLL) on ODD flightlevels.
- Traffic shall be handed off at the levels defined in the regulations below. If a specified level restriction cannot be met due to a lower RFL, traffic shall be handed off at RFL, if this does not cause conflict with any other traffic. Otherwise traffic shall be coordinated.
- All in the LoA not listed fights can be transferred in cruise or under consideration of sector boundary.
- Deviations must be coordinated between the concerned sectors.
- Silent handoffs (SHO) are standard. The originating sector must not wait for the digital acceptance of the flight before passing the frequency on to the pilot. The receiving sector will assume the flight when the pilot checks in on the frequency. Adjacent sectors will make every effort to inform each other in good time if they go offline so no more flights are passed.

2. VATSIM position names

| ATS Unit | Sector | Callsign | Freq | Code |
|----------------|-------------|------------------|---------|--------------|
| Maastricht UAC | Olno | Maastricht Radar | 132.850 | EDYY_O_CTR |
| | Ruhr | | 132.620 | EDYY_R_CTR |
| | Münster | | 133.850 | EDYY_M_CTR |
| EuroCenter | Maastricht | | 135.450 | EURM_CTR |
| Brussels ACC | Main / West | Brussels Control | 131.100 | EBBU_(W)_CTR |
| | East | | 129.575 | EBBU_E_CTR |
| | Upper | Maastricht Radar | 126.000 | EBBU_U_CTR |
| Langen ACC | PAD High | Langen Radar | 135.650 | EDGG_P_CTR |
| | HMM | | 118.750 | EDGG_H_CTR |
| | Combined | | 135.725 | EDGG_CTR |
| | DKA | | 135.350 | EDDK_APP |
| | NOR | | 127.370 | EDDK_N_APP |
| | DLA | | 128.550 | EDDL_APP |
| | DUS | | 121.350 | EDDL_D_APP |
| | BOT | | 119.100 | EDDL_B_APP |
| | DLF | | 128.650 | EDDL_F_APP |

3. VATSIM sector definitionse

| Vatsim Sector | Vertical limits | Sector Code | Responsible ATS unit (in order of precedence) |
|-----------------|-------------------------------|-------------|--|
| MUAC - OLNO | FL245 – FL660 | EDYYO | <ol style="list-style-type: none"> 1. EDYY_O_CTR 2. EBBU_U_CTR 3. EBBU_E_CTR 4. EBBU_W_CTR 5. EBBU_CTR 6. EURM_CTR |
| MUAC - RUHR | FL245 – FL660 | EDYYR | <ol style="list-style-type: none"> 1. EDYY_R_CTR 3. EDGG_P_CTR 4. EDGG_H_CTR 5. EDGG_CTR 6. EURM_CTR |
| Brussels CTR | FL95 – FL245 * GND – FL245 | EBBUE | <ol style="list-style-type: none"> 1. EBBU_E_CTR 2. EBBU_W_CTR 3. EBBU_CTR |
| Langen EDDK_APP | GND – FL245 | DKA | <ol style="list-style-type: none"> 1. EDDK_APP 2. EDDK_N_APP 3. EDGG_P_CTR 4. EDGG_H_CTR 5. EDGG_CTR 6. EDYY_R_CTR |
| Langen EDDL_APP | GND – FL245 | DUS | <ol style="list-style-type: none"> 1. EDDL_APP 2. EDDL_B_APP 3. EDDL_D_APP 4. EDDL_F_APP 5. EDGG_H_CTR 6. EDGG_P_CTR 7. EDGG_CTR 8. EDYY_R_CTR |

* See chapter 5.1: Special Areas within the Area of Common Interest, VATSIM Maastricht area.

4. ATS routes, co-ordination points, flight level allocation

Generally aircraft shall be cleared via published ATS routes, STARs and SIDs. Deviations shall be coordinated between the respective sectors. Unless otherwise depicted below, transfer of control takes place as soon as possible when the aircraft is out of any potential conflict or not later than 10 NM or 3 minutes before reaching the boundary of the area of responsibility.

4.1 Flights from Brussels ACC to Langen ACC

Flight Level Allocation: All traffic should be on ODD levels, if possible via airways

Directs can be requested to NVO.

Eastbound handoff procedures summarized

| | Airport | FIX | Level | Handoff to |
|---|--------------------------------------|---|--------------|------------|
| ↘ | EDDK | DENOV IBESA KOGES PODAT PODEN | FL170 | DKA |
| ↘ | EDDG EDLP EDLW | NVO | FL250 | |
| ↘ | EDDL EDLN EDLV | DENOV IBESA KOGES PODAT PODEN | FL210 | |
| | | ROMIN * | FL170 | DUS |
| ↗ | EBBR EBMB EBAW EBCV ELLX | KENUM DENOV | Max FL210 ** | DKA |
| ↗ | EBLG | | Max FL170 ** | |

* Only available at night between 2200LT and 0600LT

** Traffic must be kept below FL245 until clear of the EDYY_O_CTR sector unless coordinated.

4.2 Flights from Langen ACC to Brussels ACC

Flight Level Allocation: All traffic should be on EVEN levels, if possible via airways.

Restrictions: All traffic with routings via Amsterdam FIR or London FIR has to be routed via Brussels VOR (BUB) or Nicky VOR (NIK).

Directs can be requested to BUB or NIK for overflights and LNO or BATTY for traffic with destination inside EBBU FIR.

Westbound handoff procedures summarized

| | Airport | FIX | Level | Handoff to |
|---|--|---|----------|------------|
| ↗ | EDDL EDLV EDDK EDLW | MODRU KENUM NAVAK NETEX ROMIN * | FL200 | EBBUE |
| ↗ | EDDK | NVO | FL160 | |
| ↗ | EDLN | MODRU | FL100 | |
| ↘ | EBBR EBMB EBCI EBAW ELLX EHEH EHGR | AGENI | FL180 | |
| | | GEBSO | FL220 ** | |
| ↘ | EBAW | NETEX via L179 * | FL120 | |
| ↘ | EBLG | AGENI | FL120 | |

* Only available at night between 2200LT and 0600LT and during weekends and holidays due to military airspace in the north of the EBBU FIR. Information about the activation of the military areas can be obtained from the EBBU controller.

** Traffic will be descended in time by Langen to be at max FL240 to be clear of EDYY_O_CTR sector

5. Special Areas within the Area of Common Interest

Delegations of the Responsibility for the Provision of ATS to/from other ATS Units

5.1 VATSIM Maastricht Area

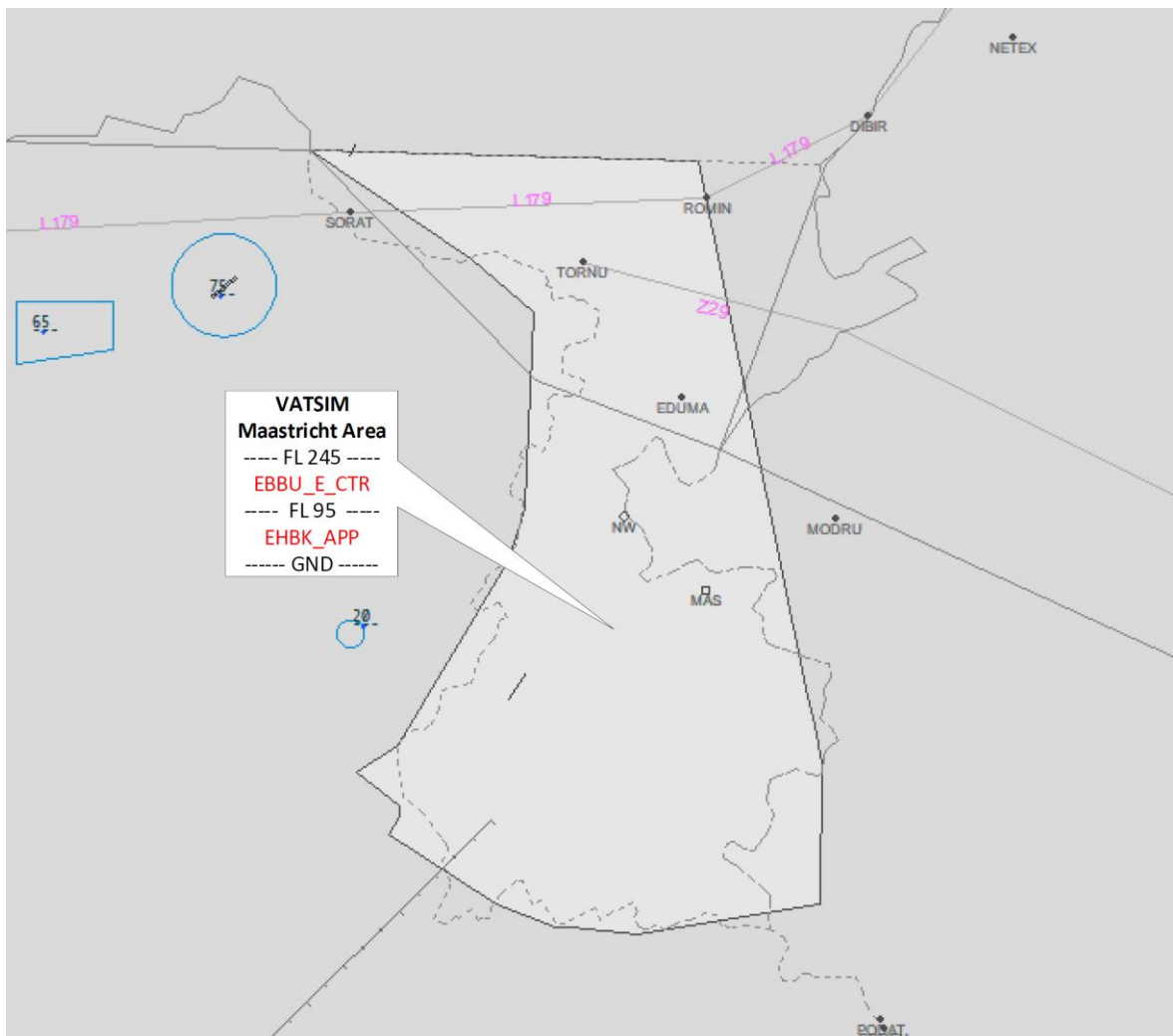
Within the Amsterdam FIR the provision of ATS has been delegated from Amsterdam ACC to Brussels ACC within the following area:

Lateral limits: The part of the Amsterdam FIR that consists of Maastricht TMA 1 and Maastricht TMA 2, as depicted on the picture below.

Vertical limits: FL 095 – FL 245

Remarks: Named "VATSIM Maastricht Area" because lateral limits do not correspond with the "Maastricht Area" used in real world.

VATSIM Maastricht Area



5.2 TORNU Area

In the upper airspace the boundaries of the real MUAC sectors are used:

Lateral limits: According to the OLNO & RUHR MUAC sectors.

Vertical limits: FL 245 – FL 660

