Euroscope Setup - Langen FIR EDGG

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General

The Euroscope plugin "Topsky" is used as default in the training of our vControllers in Langen FIR and corresponding profiles are available for download. Since this plugin goes beyond the already complex handling of Euroscope, here are a few words in advance.

What is Topsky and why do we use it?

Topsky is a real ATC system used by more than 100 FIRs worldwide. A very realistic replica of this system has been available for some time as a plugin for Euroscope. The vACCs in Scandinavia as well as our neighbors in Austria have been using this as a standard ATC system for several years.

In order to simplify the coordination between ATC and to use the many additional features (e.g. Datalink, Conflict and Risk Window, Vertical Aid Window, Missed Approach, etc.), we will also use the plugin as standard during our ATC training. This has the advantage for you, that you are already familiar with the system from the beginning and the changeover for the APP training later on will be easier.

First use of the package

The full package is already set up by us, so that it can be used directly without having to make any further changes. Only the use of the plug-in may take some getting used to. Even though this guide is very extensive, don't let it scare you away! It's easy to learn how to use it and our mentors will help you as much as they can. In addition, we will briefly introduce the most important functions here.

To familiarize yourself with the functions of Topsky in detail, you can also use the comprehensive manual (which is included in the package). In addition, our colleagues from Austria have created two very helpful "How To" videos about Topsky in German (Part 1 and Part 2).

Especially as APP and CTR, you should open the radar menu at the beginning. To do this, right-click in the line next to the text so that the menu opens. To make this box fixed, click the small box to the left of the word Radar Menu again. Then you can move the window. This offers various additional tools such as QDM (also an important tool for the tower), SEP-Tool, Maps, Filter, etc..
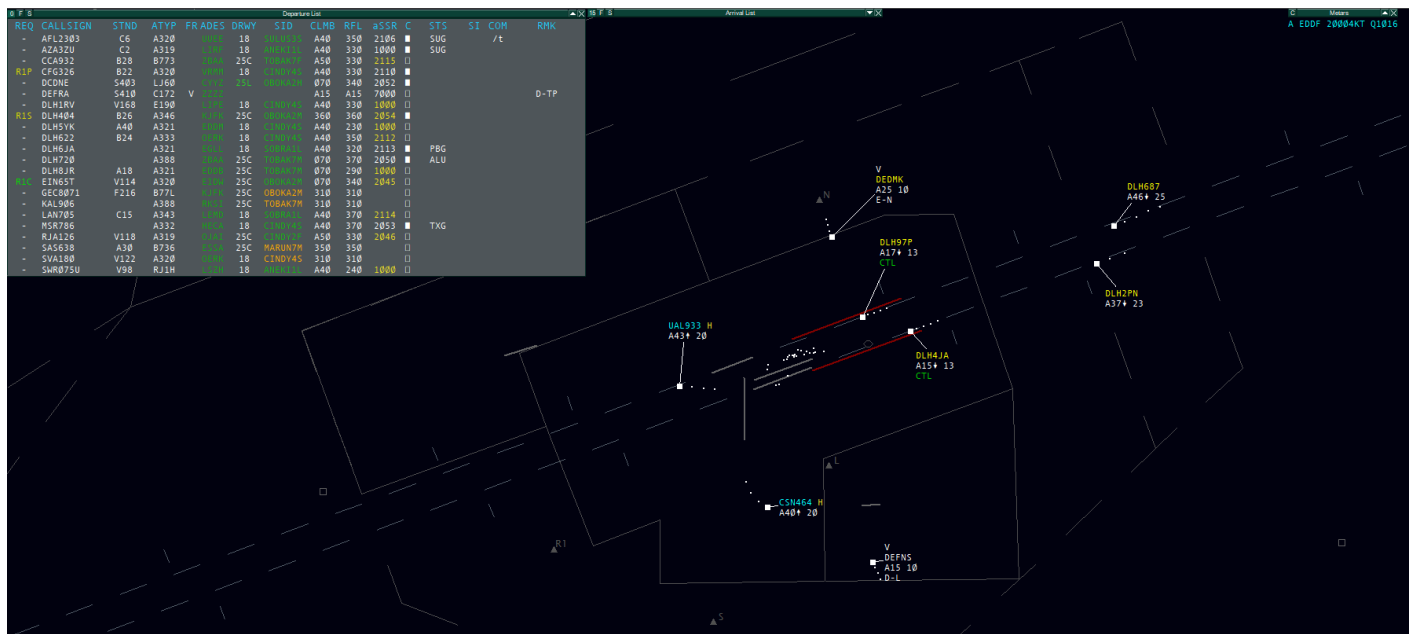
Tower Ground Profile - Tower Radar View Frankfurt

Profile

Profiles offer the possibility to store different configurations and settings in Euroscope. We offer different types of profiles in order to provide controllers with realistic radar screens and benefits of different plugins.

Tower Ground: This profile is used **primary** for all Tower and Ground stations. Tags and Lists are optimised for the Tower and Ground duties. It is recommended to use the different ASR files for Tower and Ground.

EDGG Langen Radar: This profile should be used for all Arrival (APP, DEP) and Center stations within the Langen FIR. All settings have been optimized for the **lower airspace** according to the real world used layout. It should also be used when one station is covering lower and upper sectors.

EDUU Rhein Radar: This Profile should be used for all Rhein Radar stations and is optimized for the **upper airspace** with ASR files for EDUU only!

EDYY Maastricht Radar: This Profile should be used for Maastricht Radar stations Münster and Ruhr only. It is optimized for the **upper airspace** with ASR files for EDYY only!

ASR Files

The different views (whether tower, ground, etc.) are saved in so-called ASR files. These are already set up by us, so that you can use them to control. The tags used are also specially adapted to this representation. We therefore recommend that you use two monitors (if available), one for the final / the control zone and one for the traffic on the ground. If you only have one monitor, it is

best to use the F7 key to quickly switch between the files (much more effective than zooming) or open two Euroscope instances next to each other (option: right-click on the maximize field).

Please do not change any settings!

As you will quickly notice, Euroscope is a software where you can configure a lot. As tempting as it may be, please do yourselves a favor and use the presets. The construct of the settings files has become very extensive and complex (over 100 settings files). It can happen very quickly that one change of yours breaks the whole profile for yourself. And believe us, we know how time-consuming the work with the settings can be, even if you think you know what you are doing.

Frankfurt Ground View

Lists Langen FIR

General

Lists in general offer a lot of useful information and many functions. For some stations working with lists can be a huge benefit, while others do not need them most of the time. Working with the Departure or Startup List is particularly recommended for the tasks of the Delivery Controller. These two lists are the same for every station. Other lists differ between Ground/Tower and Arrival/Center as different information are important.

The grey items in the table below are hidden by default and can be quickly shown via the filter of the respective list (F) if required. By using the right mouse button the filter dialogue will not close after selecting an item.

Departure List

The Departure List shows all departures of an airport which are on the ground. For the tasks of Delivery, the Start-Up List can be used in addition to this list, which is structured similarly.

List Item	Description	Left click	Right click
TIMER	Timer for the current request	--	--
REQ	Current Request + Sequence	Request menu	--
CALLSIGN	Callsign	Callsign menu	Route draw (TS)
TOBT	Target Off-Block Time	TOBT menu	TOBT now
TSAT	Target Startup Approval Time	set ASAT + SUG	Startup Request
AORT	Actual Off-Block Request Time	Offblock Request	reset Off-Block Request
AOBT	Actual Off-Block Time	set AOBT + PBG	reset AOBT
STND	Departure Stand	--	--
ATYP	Aircraft Type	Scratchpad	Communication menu

W	Wake Turbulence Category	WTC Highlight	--
V	VFR Indicator	--	--
ADEP	Departure Airport	Flightplan (ES)	Flightplan (TS)
ADES	Destination Airport	Flightplan (ES)	Flightplan (TS)
RWY	Departure Runway	Runway menu (vSID)	ES SID List (ES)
SID	Departure Route	set suggested SID (vSID)	SID menu (vSID)
CLMB	Initial Altitude	climb menu (vSID)	Final Altitude menu (TS)
RFL	Cruising Altitude	Final Altitude menu (ES)	Final Altitude menu (TS)
FPC	Flightplan checker	Manual FP check	--
aSSR	Assigned Squawk	Auto assign Squawk	Squawk menu
DCL	Datalink Clearance	open DCL window	--
C	Clearance Received Flag	Set Clearance Received	vACDM reset menu
STS	Ground Status	Ground Status menu	Ground Status menu
T	Communication Type	Communication menu	Communication menu
RMK	Remarks	open Scratchpad	open Scratchpad

Startup List

The Startup List shows all departures of an airport with no status, SUG and PBG. As soon as they have the TXG status, they will disappear from this list. It's highly recommended for Delivery to work with this list, sorted by clearance received flag.

List Item	Description	Left click	Right click
TIMER	Timer for the current request	--	--
REQ	Current Request + Sequence	Request menu	--

CALLSIGN	Callsign	Callsign menu	Route draw (TS)
C	Clearance Received Flag	Set Clearance Received	vACDM reset menu
TOBT	Target Off-Block Time	TOBT menu	TOBT now
TSAT	Target Startup Approval Time	set ASAT + SUG	Startup Request
CTOT	Calculated Take-Off Time ("Slot")	--	--
ASRT	Actual Startup Request Time	Startup Request	--
AORT	Actual Off-Block Request Time	Offblock Request	reset Off-Block Request
AOBT	Actual Off-Block Time	set AOBT + PBG	reset AOBT
EXOT	Estimated Taxi-Out Time	modify EXOT	--
ECFMP	ECFMP measures	--	--
STND	Departure Stand	--	--
ATYP	Aircraft Type	Scratchpad	Communication menu
W	Wake Turbulence Category	WTC Highlight	--
V	VFR Indicator	--	--
ADEP	Departure Airport	Flightplan (ES)	Flightplan (TS)
ADES	Destination Airport	Flightplan (ES)	Flightplan (TS)
RWY	Departure Runway	Runway menu (vSID)	ES SID List (ES)
SID	Departure Route	set suggested SID (vSID)	SID menu (vSID)
CLMB	Initial Altitude	climb menu (vSID)	Final Altitude menu (TS)
RFL	Cruising Altitude	Final Altitude menu (ES)	Final Altitude menu (TS)
FPC	Flightplan checker	Manual FP check	--
aSSR	Assigned Squawk	Auto assign Squawk	Squawk menu
DCL	Datalink Clearance	open DCL window	--

STS	Ground Status	Ground Status menu	Ground Status menu
T	Communication Type	Communication menu	Communication menu
RMK	Remarks	open Scratchpad	open Scratchpad

Arrival List (Tower & Radar)

The Arrival List shows all inbounds that are closer than 10 NM to the active airport.

List Item	Description	Left click	Right click
CALLSIGN	Callsign	Callsign menu	Route draw (TS)
ADEP	Departure Airport	Flightplan (ES)	Auto assign Squawk
ATYP	Aircraft type	open Scratchpad	Communication menu
W	Wake Turbulence Category	WTC Highlight	--
ETA	Estimated Time of Arrival (ETA)	--	--
RWY	Arrival Runway	Runway List	--
STND	Assigned Parking Position	Arrival Stand Menu	Ground Status menu
T	Communication Type	Communication Menu	--
RMK	Remarks	open Scratchpad	--

Sector Inbound List (Tower)

The Sector Inbound List shows all aircraft that will fly into the own sector.

List Item	Description	Left click	Right click
CALLSIGN	Callsign of the aircraft	Callsign menu	Assume/Transfer
ATYP	Aircraft Type	Scratchpad	Communication menu

W	Wake Turbulence Category	WTC Highlight	--
ETN	Sector Entry Time	--	--
ARWY	Arrival Runway	Runway List	--
STND	Arrival Stand	Arrival Stand Menu	Ground Status Menu
aSSR	Assigned Squawk	Auto assign Squawk	Squawk menu
ADEP	Departure Airport	Flight Plan (ES)	Flight Plan (TS)
ADES	Arrival Airport	Route draw (TS)	Flight Plan (TS)
SI	Sector Indicator	--	--
T	Communication Type	Communication menu	Communication Menu
RMK	Remarks	Scratchpad	Scratchpad

Sector Inbound List (Radar)

This list shows all flights that will fly through your sector.

List Item	Description	Left click	Right click
CALLSIGN	Callsign of the aircraft	Callsign menu	Assume/Transfer
ATYP	Aircraft Type and WTC	Scratchpad	Communication menu
SSR	Current Squawk Code	Auto assign Squawk	Squawk Menu
aSSR	Assigned Squawk Code	Auto assign Squawk	Send Squawk via CPDLC
ADEP	Origin Airport	Flightplan (ES)	Flightplan (TS)
ADES	Destination Airport	Route draw (autohide)	Flightplan (ES)
SID	Departure Route	SID menu	--
STAR	Arrival Route	STAR menu	--

COPN	Sector Entry Point	Waypoint menu	COPN **point** coordination list
PEL	Planned Entry Level	PEL menu	COPN **altitude** coordination list
ETN	Sector Entry Time	--	--
COPX	Sector Exit Point	Waypoint menu	COPX **point** coordination list
XFL	Sector Exit Level	COPX **altitude** coordination list	COPX **altitude** coordination list
ETX	Sector Exit Time	--	--
SI	Sector Indicator	--	---
COM	Communication Type	Communication menu	Communication menu
RMK	Remarks	Scratchpad	Scratchpad

Sector Exit List (Radar)

This list shows all aircraft that are tracked by yourself.

List Item	Description	Left click	Right click
CALLSIGN	Callsign of the aircraft	Callsign menu	Assume/Transfer
ATYP	Aircraft Type and WTC	Scratchpad	Communication menu
SSR	Current Squawk Code	Auto assign Squawk	Squawk Menu
aSSR	Assigned Squawk Code	Auto assign Squawk	Send Squawk via CPDLC
ADEP	Origin Airport	Flightplan (ES)	Flightplan (TS)
ADES	Destination Airport	Route draw (autohide)	Flightplan (ES)
ARWY	Arrival Runway	Runway menu	Runway menu
STAR	Arrival Route	STAR menu	--
CFL	Cleared Flightlevel	CFL menu	--

RFL	Cruising Altitude	RFL menu	--
COPX	Sector Exit Point	COPX **point** coordination list	COPX **point** coordination list
XFL	Sector Exit Level	COPX **altitude** coordination list	COPX **altitude** coordination list
ETX	Sector Exit Time	--	--
SI	Sector Indicator	Next Controller List	--
COM	Communication Type	Communication menu	Communication menu
RMK	Remarks	Scratchpad	Scratchpad

Plugins

Topsky (TS)

Topsky is a very powerful plugin and is used by default for all radar matters. For details you can have a look at the attached manual inside the package.

Groundradar Plugin (GRP)

Groundradar is a powerful plugin and is used by default for all ground matters. For details you can have a look at the attached manual inside the package.

The most used features are the tags, stand assignment, the additional maps (it depends on the airport) and the second ground view.

> The top menu bar can be unpinned by clicking on the small icon on the left. Thereafter the menus below (e.g. Topsky) can be accessed (slowly and careful). To get the menu back, just hover in the area of the menu bar and it will show up again.

Virtual Controller Helper (VCH)

This plugin offers some useful but minor features like the cleared to land flag.

vACDM Plugin

The vACDM Plugin is designed to assist Delivery with the ACDM procedure to optimize the outbound traffic flow during high traffic situations. It is only available within the Startup List but disabled by default and can be enabled by using the Filter F.

> To use the plugin the command **.vacdm master** need to be entered into the command line. Make sure you have set the active airport and runways!

> vACDM sometimes has some synchronization issues with the server and should be used with care only.

Flightplan Checker (FPC)

Flightplan Checker checks all flightplans regarding SID restrictions, some minor route issues and cruise level (odd/even) depending on the airway used. You will see a red error message if some errors occur or a green "OK!" if everything is fine. No further actions are required to use this plugin. By default it is disabled and can be used within the Departure and Startup list using the filter "F".

Please check your local SOP if it is mandatory to check the pilot's filed route or not. Please be careful with odd/even amendments as this can be a really tricky topic and is solved by step climbs in real life.

vSID

vSID is used to assign the correct SIDs according to all dependencies. Check the vSID manual here.

MAESTRO

MAESTRO is an arrival manager that is included inside the package. By default this plugin is not loaded. If you would like to use it, you have to load it first.

> Right now the plugin seems to be a bit buggy, use on own risk!

AMAN

AMAN is an additional arrival manager that can be displayed with the command ".**aman open**" and closed with ".aman close".

Shortcuts

Euroscope

All Euroscope shortscuts are available **here**. Below you can find the most important one for the daily business.

Shortcut	Description
Strg + arrow up	Copy the last line from the chat into the command line. Select the previous line with multiple clicks.
POS1	Send a "contact me" message: "Please contact me on XXX.XXX"
EINFG	Aircraft select key
F6	Shows the flightstrip
F7	Switches between already opened ASR files
.inf	Shows the tuned-in frequency of the pilot
.break	Indicates that you will go offline soon (undo with **.nobreak**)
.am	Creates or opens the flightplan.
.find + Callsign	Draw line to the aircraft you would like to find (not in combination with GRP).

Topsky Shortcuts

Topsky has some predefined features that are available via shortcuts (check Topsky manual for further details). Additionally, several maps can be displayed by using the shortcuts below.

Shortcut	Description
Maps	

ALT + B	Maximum aircraft size for parking positions (Tower/Ground only)
ALT + B	Borders for upper airspace (EDGG only)
ALT + B	Borders for lower airspace (EDUU only)
ALT + D	Airspace C / D
ALT + M	MVA Langen
ALT + G	Separation Guides **Lower** (Center only)
ALT + H	Separation Guides **Upper**
	VFR Hospital Labels (Tower only)
ALT + W	Heading guides and vectoring T for training, **western operation** for all airports
ALT + O	Heading guides and vectoring T for training, **eastern operation** for all airports
ALT + V	VFR Reporting Point Labels (Tower only)
Tools	
ALT + Q	QDM-Tool
ALT + X	Delete all QDMs
ALT + S	Separation tool
ALT + R	Radar menu
ALT + U	Toggle all Filter (altitude, TSSR and CIJ)
ALT + hover over FIX	Name of waypoint or airport

Tricks and Hints

Create a flightplan for VFR flights

To use all benefits of the Tower Radar it is recommended to create a flightplan for every VFR traffic within the CTR. If origin and/or destination are unknown, ZZZZ should be used.

Creating a flightplan as controller:

> Enter **.am** (like ammend flightplan) into the command line of Euroscope and click on the aircraft you would like to create a flightplan for. The flightplan window will open and you can enter ADEP, ADES and ATYP.

Second Ground View (GND)

At bigger airports or if you need to zoom in a lot, a second ground window might be helpful (e.g. for runway 25R/07L at Frankfurt).

> Ground Radar Manu at the top => Window => 2nd

Display SIDs as Tower in ground view (GND/TWR)

For an efficient departure flow it is important to know which SIDs the departures are going to fly. To have a better overview what is already at the holdingpoint or coming along, you can simply enable the SIDs at the ground tag. So you don't have to keep all SIDs in mind or hover over it all the time if you have several outbounds at different holdingpoints.

> Groundradar Menu at the top => Settings => Labels => Ground -- **DEP X**

Display all Tags at the ground (GND/TWR)

By default all tags without any status (e.g. SUG, PBG) are disabled to keep the scope as clean as possible. If you would like to see all tags you can simply hover over the Groundradar menu at the top or turn on all labels via the menu.

> Groundradar menu at the top => Settings => Labels => Ground => **NoState remove X**

Further Maps via Euroscope

The following maps are additionally available via Other SET => Display settings, but are disabled by default.

> - Cities (Regions)
> - Highways (Geo - EDZZ)
> - River (Geo - EDZZ)

> - all individual Center Lower Sectors and combined as EBG (ARTCC boundary)
> - all neighbouring Center sectors (ARTCC boundary)
> - FIS boundaries (ARTCC boundary)

Topsky predicted traffic window (APP/CTR)

Especially as Radar Controller it can be really helpful to know, how much traffic is going to enter the own sector in the future, when it will happen and how much aircraft are inside. There you have to enter the SI of the station you would like to see the traffic.

> Topsky menu at the top => STS => Supervisory => Predicted Traffic

Topsky Callsign Menu

With a left-click on the callsign of a plane, the so-called callsign menu opens in the tag as well as in the lists. There you will find the options to assume/transfer or release a plane (via more => free). You can also enter a missed approach (MAPP) or highlight a callsign and display the flight plan (FPL). APP and CTR can select a holding (HOLD) for the aircraft, coordinate a heading or speed with the neighboring controller (HOP) and request another controller to do the handoff earlier (ROF). Center controllers offering CPDLC have the possibility to start CPDLC for the aircraft and, if necessary, to send a predefined free text to the pilot.

Euroscope Usage - Tower

This guide is aimed at S1 controllers looking to control the minor airports in the FIR Langen. Below you will find a very basic introduction to the actions required to handle departures and arrivals.

Opening Euroscope and switching airports

When you open Euroscope, you will be met with an *Open profile file* dialog. Open the **Tower Ground.prf** file. If the dialog does not open for you, uncheck the option *Auto load last profile on startup* under *Other SET* in the top taskbar and restart Euroscope.

Once you have opened the correct profile, you will see the following.
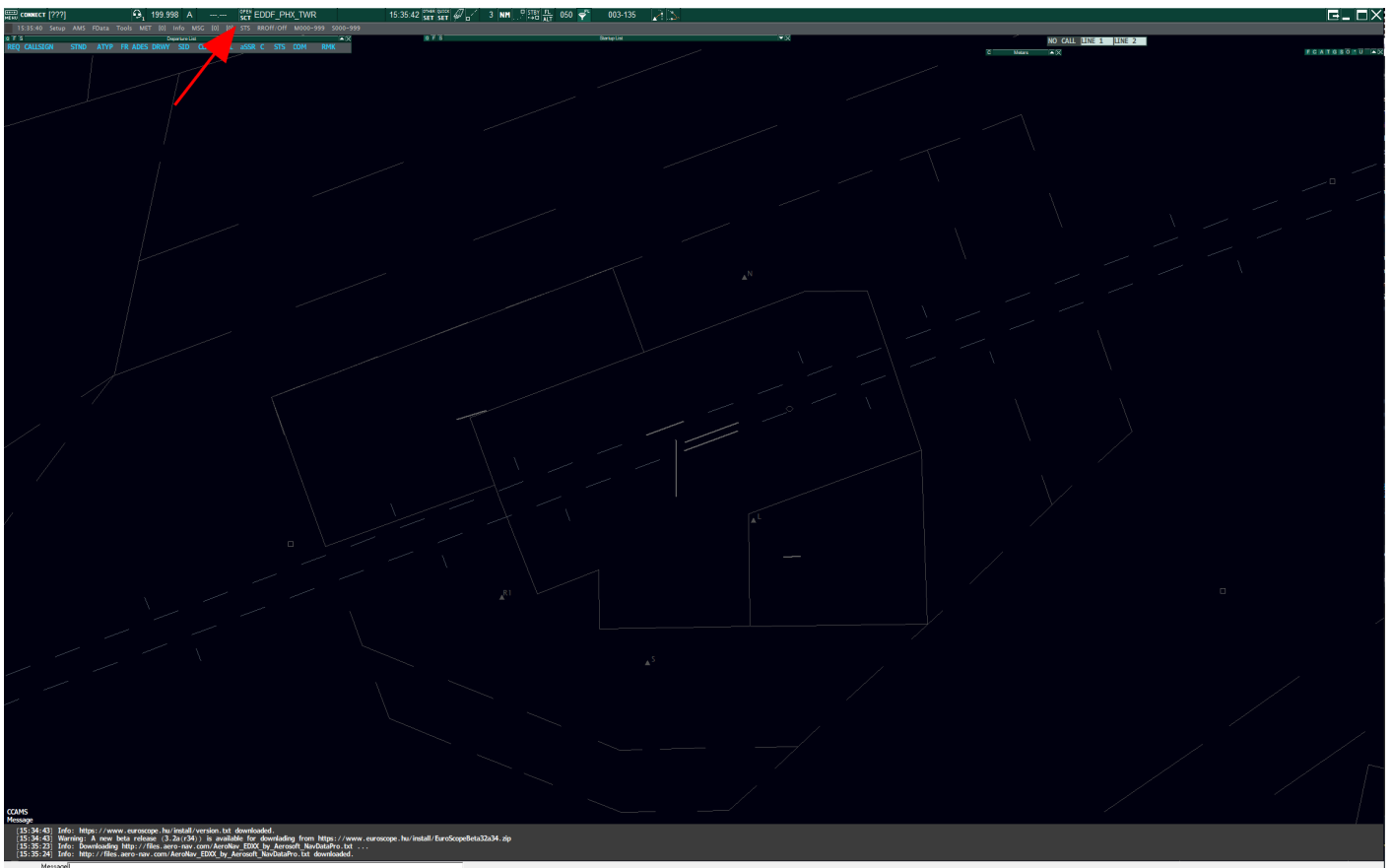
It is the radar view of Frankfurt Tower. However, we would like to switch to a different airport. The way this works in Euroscope is by opening a different **asr** file, which tells Euroscope which lines to draw where. You can do so by clicking on the **Open SCT** button, which is highlighted in the screenshot.

Open SCT opens the depicted menu, where you can select one of the blue highlighted asr files. If your airport is not listed there, you need to click *Open* (red arrow). This will open a Windows file

dialog where you can select the correct asr from the sector files you downloaded for EDGG [EDGG\EDGG\ASR\Ground or Tower].
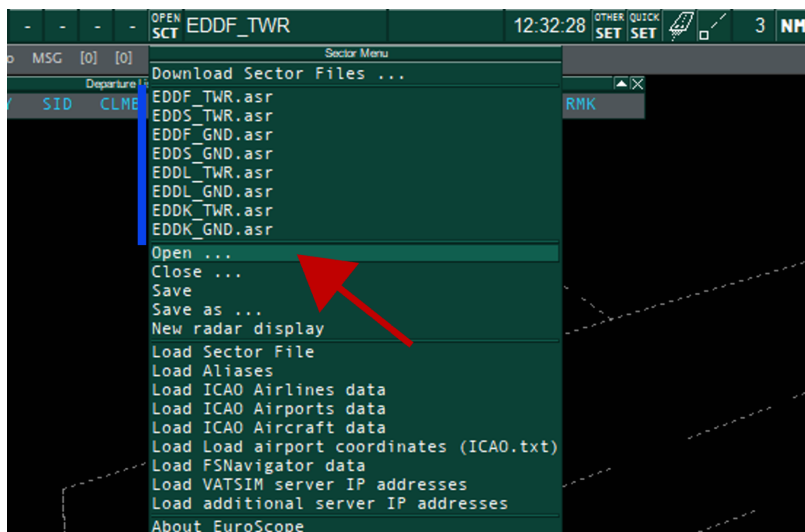

select or open different asr files at Euroscope

You can open multiple asr files and press **F7** to switch between them. Additionally, you can close asr files in the Open SCT menu.

> Additionally, you can **open multiple instances of Euroscope** to have different views on multiple screens. Connect the first instance as normal and then select *To VATSIM via proxy* as *Select connection mode* and enter your credentials.

Connecting to the Network

To connect to the network, click the connect button in the top left. It will open the *Connect dialog*, where you will have to enter your VATSIM credentials. Additionally, select your station from the dropdown menu. If it is not listed, enter it manually and set the correct Facility. Enter Ground/Delivery (STU1) as your rating. You can choose any server except the Sweatbox. Thereafter press Connect.

Euroscope
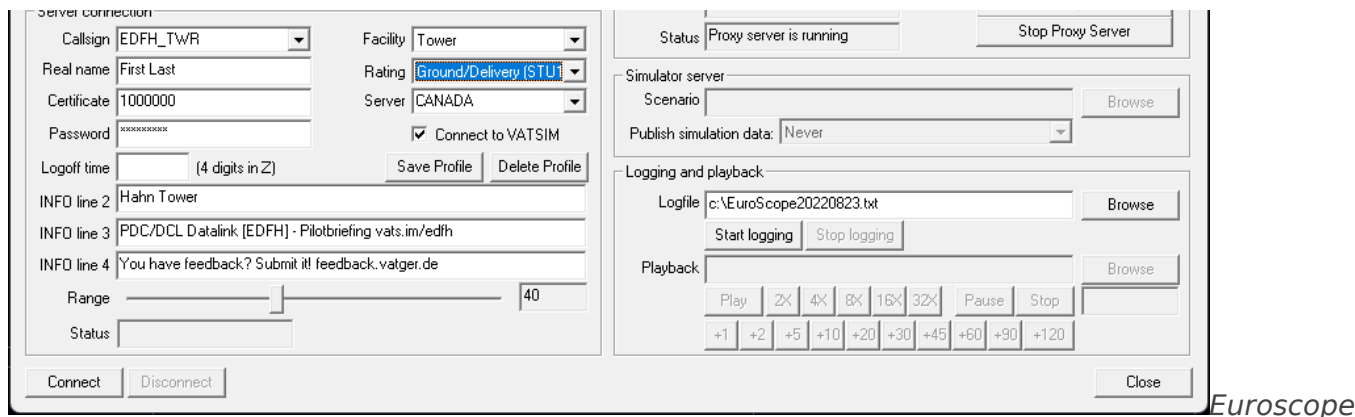
Connect dialog

You will see your station's ID, in this example, EDFH_TWR, as well as the primary frequency (119.650) in the top left corner if you have connected to the network. However, there are a few more things we need to do before we can start:

Datalink (DCL/PDC) Logon

We use the Topsky Plugin to offer PDC clearances. Read the guide here (German only) for further information. In real life, datalink clearances are not offered at small airports like Hahn or Mannheim. If you do not offer it, you should always remove "PDC/DCL Datalink [XXXX] - " from your controller info.

Activate airport and set active runway

Next, we need to choose and set the active airport and runway. Look at the current METAR, the TAF, and the local SOPs to determine the runway in use. Next, in Euroscope, click on the runway icon in the top menu (red arrow). This will open the **Active airport/runway selector dialog**. Here you can activate the airport (left two columns) as well as set the departure and arrival airports (see image).
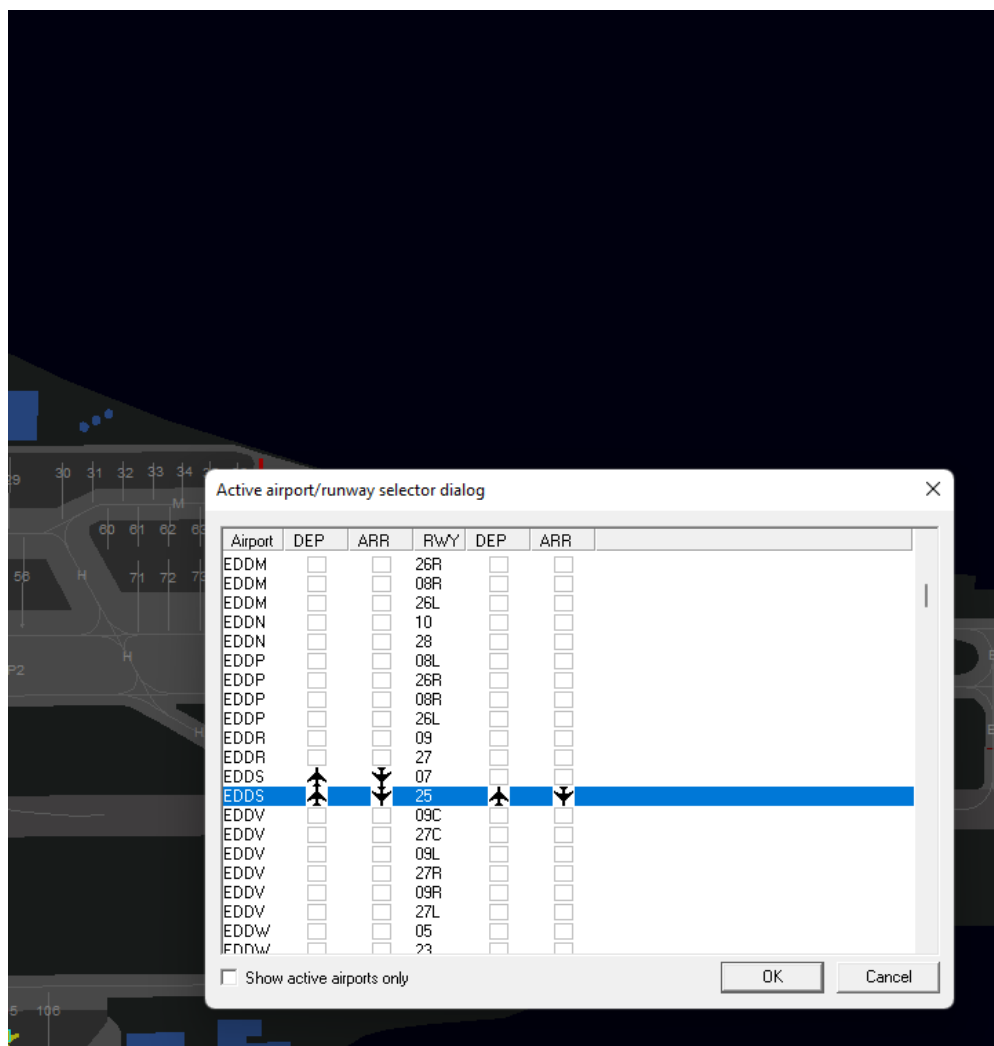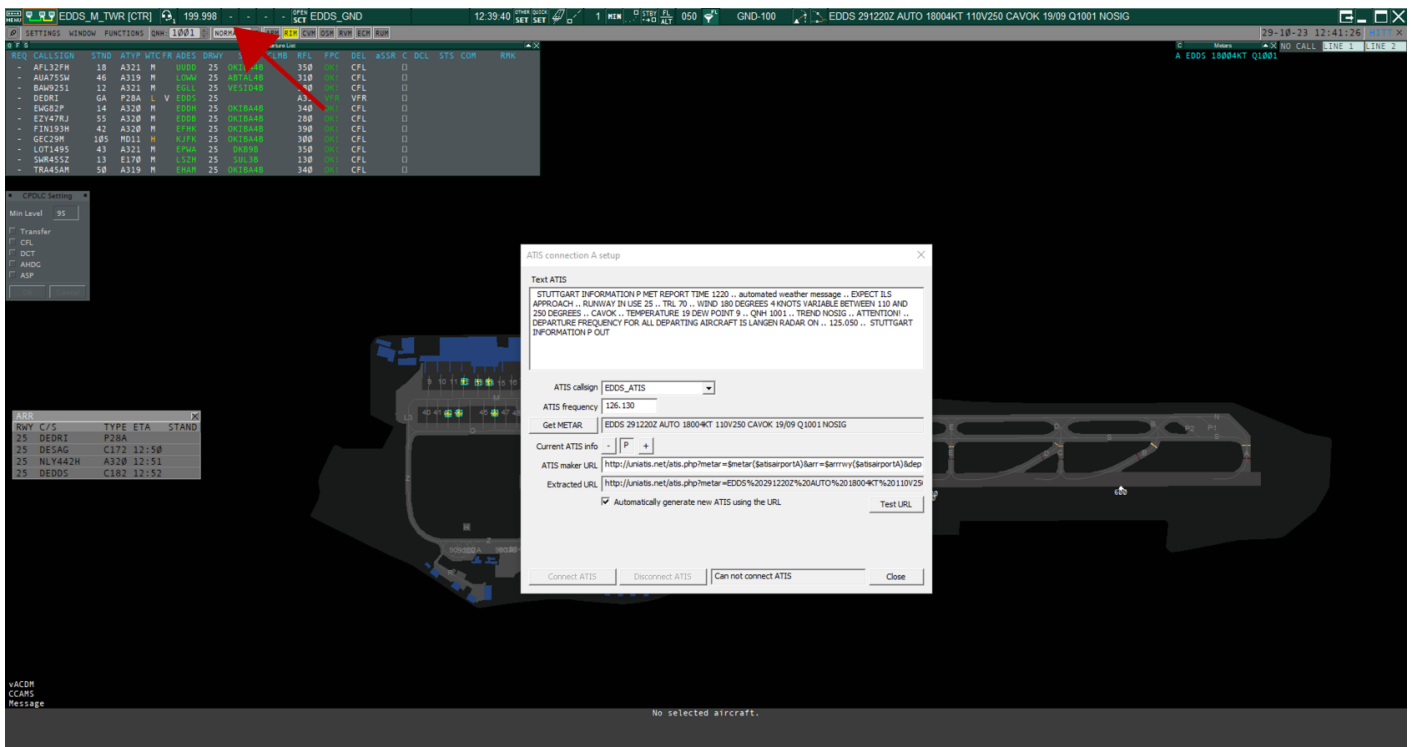
activate airport and set active runways

Set ATIS

We need to set the ATIS (Automatic terminal information service) next. To open the *ATIS Setup Dialog*, press the letter in the top left (red arrow). This letter is the current ATIS letter. Additionally, I have highlighted the *ATIS maker URL*. This URL translates the weather and runway data into the ATIS format. To set the ATIS, you need to

- Enter the airport ICAO **in capital letters** to the *ATIS airport* field
- Press *Get METAR* to get the current weather
- Add the correct departure frequency at airports where pilots are supposed to change frequencies automatically after departure by adding &depfreq= and the frequency, for example, "&depfreq=129.350" for EDFM
- Press the *Test URL* button and check the ATIS in the large text box for errors
- Check the *Automatically generate new ATIS using the URL* box

- Press the *Connect ATIS* button to connect the ATIS

If everything is set up correctly, your *ATIS Setup Dialog* should look like the following. Additionally, the ATIS frequency will be displayed in the top menu bar (red arrow).


ATIS connection A setup   ✕

Text ATIS

STUTTGART INFORMATION P MET REPORT TIME 1220 .. automated weather message .. EXPECT ILS APPROACH .. RUNWAY IN USE 25 .. TRL 70 .. WIND 180 DEGREES 4 KNOTS VARIABLE BETWEEN 110 AND 250 DEGREES .. CAVOK .. TEMPERATURE 19 DEW POINT 9 .. QNH 1001 .. TREND NOSIG .. ATTENTION! .. DEPARTURE FREQUENCY FOR ALL DEPARTING AIRCRAFT IS LANGEN RADAR ON .. 125.050 .. STUTTGART INFORMATION P OUT

ATIS callsign	EDDS_ATIS ▼
ATIS frequency	126.130
Get METAR	EDDS 291220Z AUTO 18004KT 110V250 CAVOK 19/09 Q1001 NOSIG
Current ATIS info	- P +
ATIS maker URL	http://uniatis.net/atis.php?metar=$metar($atisairportA)&arr=$arrrwy($atisairportA)&dep
Extracted URL	http://uniatis.net/atis.php?metar=EDDS%20291220Z%2018004KT%20110V25...

☑ Automatically generate new ATIS using the URL   Test URL

| Connect ATIS | Disconnect ATIS | Connected | Close |

Start Audio for Vatsim

Finally, you need to open Audio for Vatsim and press Connect in the top left. It should automatically dis̶p̶l̶a̶y̶ ̶...̶... ̶...̶... ̶...̶...̶...̶...̶...̶... to listen and speak on̶...̶...
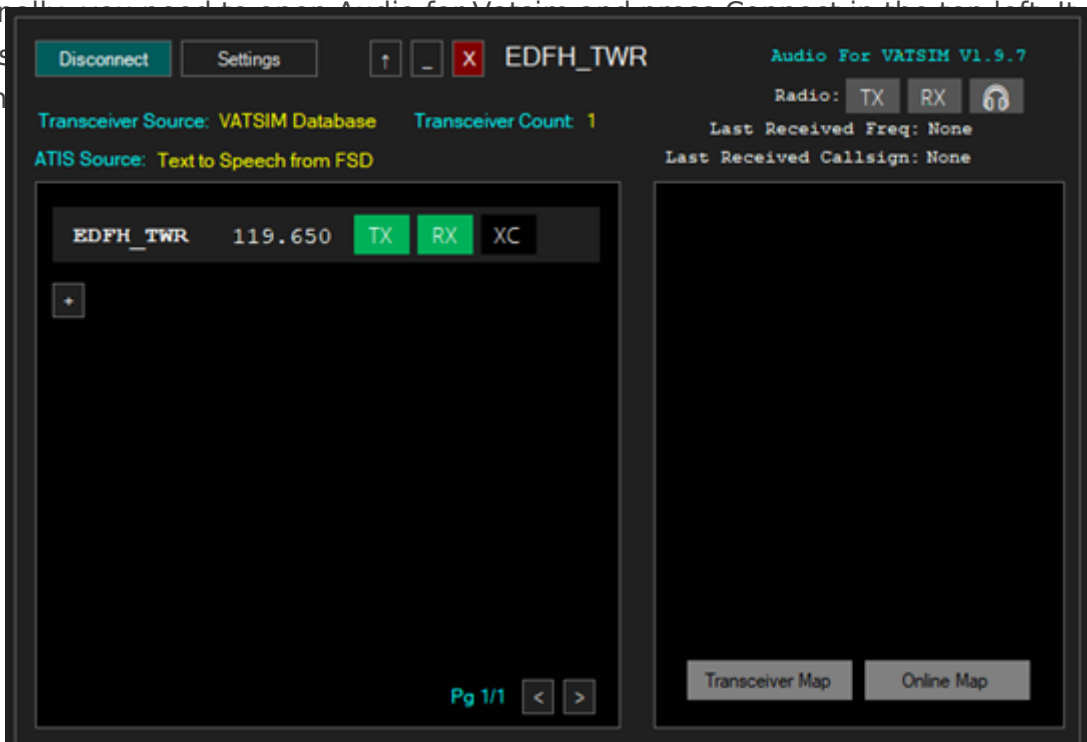
...external Audio for

Vatsim (AfV) software

If for whatever reason your station is not listed, you can press the + button and enter the ID, e.g. EDFH_GND.

Departures

Once you have completed the above steps and have logged onto the network, the relevant lists will start populating with information you will require to manage your aircraft's state. These are required not only for yourself but also for the adjacent controllers so that they are aware of an aircraft's intentions. An aircraft's state consists of ground states, squawk assignments, etc. which will be further explained in this section. Please note that this is an extremely critical part of controlling and is essential for your success in later trainings/examinations and is therefore mandatory for all controllers.

Departure List

Depicted in the image to the left you can see the "Departure List". This list shows all relevant information for aircraft departing out of your aerodrome. In the lesson, you heard previously, the functionality and meaning of this list were explained.

Departure List

SID Assignment

The plugin vSID will suggest a SID (white) according to the current runways in use and other factors according to the SOP. Usually this SID is the correct one, nevertheless it's within the controllers responsibility to check the suggested SIDs! When the manual plugin mode is used (default mode) the controller need to confirm the suggested SID with a left-click, then the SID is written into the flightplan (SID/RWY) and every controller will see this SID. A SID always need to be **green** (default assignment) or **orange** (non-default assignment) when issuing enroute clearance! **When changing the runway manually, the SID need to be confirmed thereafter.**

When the "Auto Mode" is used (".vsid auto") the SIDs will be set by the plugin and do not need to be confirmed anymore.

> vSID is providing several information using different colors. You can find more information regarding the vSID plugin usage in the vSID Controller Manual.

Initial Climb Assignment

vSID suggests (white) the correct initial climb for every SID. It is set when the SID is confirmed. It will also display wether a "climb" (blue) or "climb via SID" (green) instruction is required (e.g. ROTWE SID out of runway 25 in Stuttgart - see image below).

Squawk Assignment

Additionally to completing the SID assignment, you must also assign a squawk to the aircraft. This can be done by simply clicking on the corresponding table row under the "aSSR" header. If you right-click, you can assign a specific squawk code by entering it manually or simply selecting VFR for squawk "7000". Note that yellow squawks are those, that have been assigned, but however not been set by the aircraft yet. After completing this, the list should look similar to that shown in the image.

When using vSID in manual mode, the squawk will automatically be assigned when the SID is confirmed.

REQ	CALLSIGN	STAND	ATYP	W	V	ADES	RWY	SID	CLMB	FPC	aSSR	DCL	C	STS	T	RMK
	AFL32FH	18	A321	M		UUDD	Ø7	OKIBA4H	A5Ø	OK!	2Ø35					
	AFR16ØB	33	E17Ø	M		LFPG	Ø7	VESID2H	A5Ø	OK!	1ØØØ					
	AUA188	1Ø	A32Ø	M		LOWS	Ø7	ABTAL4H	A5Ø	OK!	1ØØØ					
	AUA75SW	45	A319	M		LOWW	Ø7	ABTAL4H	A5Ø	OK!	1ØØØ					
	BAW9251	12	B738	M		EGLL	Ø7	VESID2H	A5Ø	OK!	2Ø11					
	CFG1876	9A	B763	M		LFMN	Ø7	ROTWE1K	A5Ø	OK!	1ØØØ					
	DEDRI	GA	P28A	L	V	EDDS	---	VFR	---	VFR						
	EJU84QA	41	A319	M		LIPZ	Ø7	KUNOD2H	A5Ø	OK!	1ØØØ					
	EWG2Ø88	62	DH8D	M		EDDL	Ø7	TAGIK2H	A5Ø	OK!	1ØØØ					
	EWG2478	16	A32Ø	M		LHBP	Ø7	ABTAL4H	A5Ø	OK!	1ØØØ					
	EWG3LV	11	A319	M		EDDP	Ø7	DKB4H	A5Ø	OK!	1ØØØ					

All Squawk Codes have been assigned

After completing the above steps, the list should look similar to the one above.

Enroute Clearance

Once you have issued the pilot with an enroute clearance, you set the so-called "clearance received flag" as shown in the image. This can be done by simply left-clicking on the corresponding checkbox. This checkbox acts as a reminder for yourself and for other controllers in the event of a handover to another controller.

REQ	CALLSIGN	STAND	ATYP	W	V	ADES	RWY	SID	CLMB	FPC	aSSR	DCL	C	STS	T	RMK
C1	AFL32FH	18	A321	M		UUDD	Ø7	OKIBA4H	A5Ø	OK!	2Ø35					
	AFR16ØB	33	E17Ø	M		LFPG	Ø7	VESID2H	A5Ø	OK!	1ØØØ	OK	■			
	AUA188	1Ø	A32Ø	M		LOWS	Ø7	ABTAL4H	A5Ø	OK!	1ØØØ					
	AUA75SW	45	A319	M		LOWW	Ø7	ABTAL4H	A5Ø	OK!	1ØØØ					
S1	BAW9251	12	B738	M		EGLL	Ø7	VESID2H	A5Ø	OK!	2Ø11	OK	■			
	CFG1876	9A	B763	M		LFMN	Ø7	ROTWE1K	A5Ø	OK!	1ØØØ					
	DEDRI	GA	P28A	L	V	EDDS	Ø7	VFR	---	VFR	7ØØØ	OK	■			
	EJU84QA	41	A319	M		LIPZ	Ø7	KUNOD2H	A5Ø	OK!	1ØØØ					
	EWG2Ø88	62	DH8D	M		EDDL	Ø7	TAGIK2H	A5Ø	OK!	1ØØØ	OK	■			
	EWG2478	16	A32Ø	M		LHBP	Ø7	ABTAL4H	A5Ø	OK!	1ØØØ	OK	■			
	EWG3LV	11	A319	M		EDDP	Ø7	DKB4H	A5Ø	OK!	1ØØØ					

All aircraft with the "clearance flag" have received the enroute clearance

Ground States

Ground states are an important aspect of keeping the "big picture" - a phrase you will hear many times throughout your training as a controller. These states not only help you to remember which clearances have been issued to which aircraft but also help the surrounding controllers by informing them of your plan, allowing for a more efficient and coordinated flow of traffic at your aerodrome. These states are propagated to all surrounding controllers making them inevitable for controlling.

Ground states menu

Should you forget to set a ground state, EuroScope will warn you about this by displaying the error above the tag. Please take care and ensure that these states are always up to date.
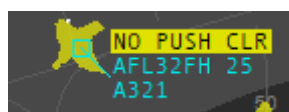
SUG - Startup Given

Assuming you are able to provide the pilot with a startup clearance you now set the ground state to SUG (Start Up Given). This can be achieved, by clicking on the corresponding row under the "STS" (Status) header. A menu, as shown in the image, will open allowing you to select the appropriate ground state.

PBG - Pushback Given

Once the pilot requests pushback and the clearance has been granted, the ground state is no longer required to be in the SUG state. Instead, we select the PBG (PushBack Given) state which indicates that the aircraft has been cleared for pushback.
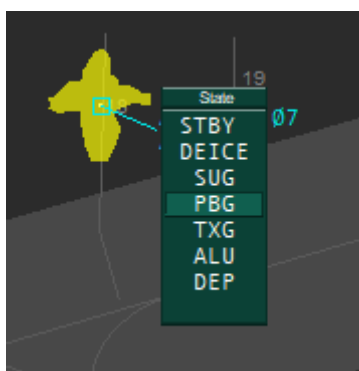
Ground Status menu access through the aircraft tag

Note: As you can see in the image, we aren't using the departure list to assign the corresponding ground state. This can also be done directly through the tag!

TXG - Taxi Given

After an aircraft has been issued its taxi clearance the state, once again, changes. In this instance, since the aircraft has been cleared to taxi, the TXG (TaXi Given) state would be selected.

ALU - Approved Lineup

The aircraft has now taxied to its assigned holding point and has been cleared to line up (*no takeoff clearance given*). The ground state is once again adapted to reflect the current situation of the pilot and is thus set to ALU (Approved LineUp). Note that this step can be ignored if the aircraft has been cleared for takeoff before requiring an explicit lineup clearance.

DEP - Departure

Once the aircraft has been cleared for takeoff, the final state is set. The DEP (DEParture) state shows that this specific aircraft has been cleared for takeoff.

Arrivals

Finally, let's look at handling arrivals. We will look at the tower view first, this is where you will see the arrivals while they are still in the air. You can find it by opening the corresponding XXXX_TWR.asr file.
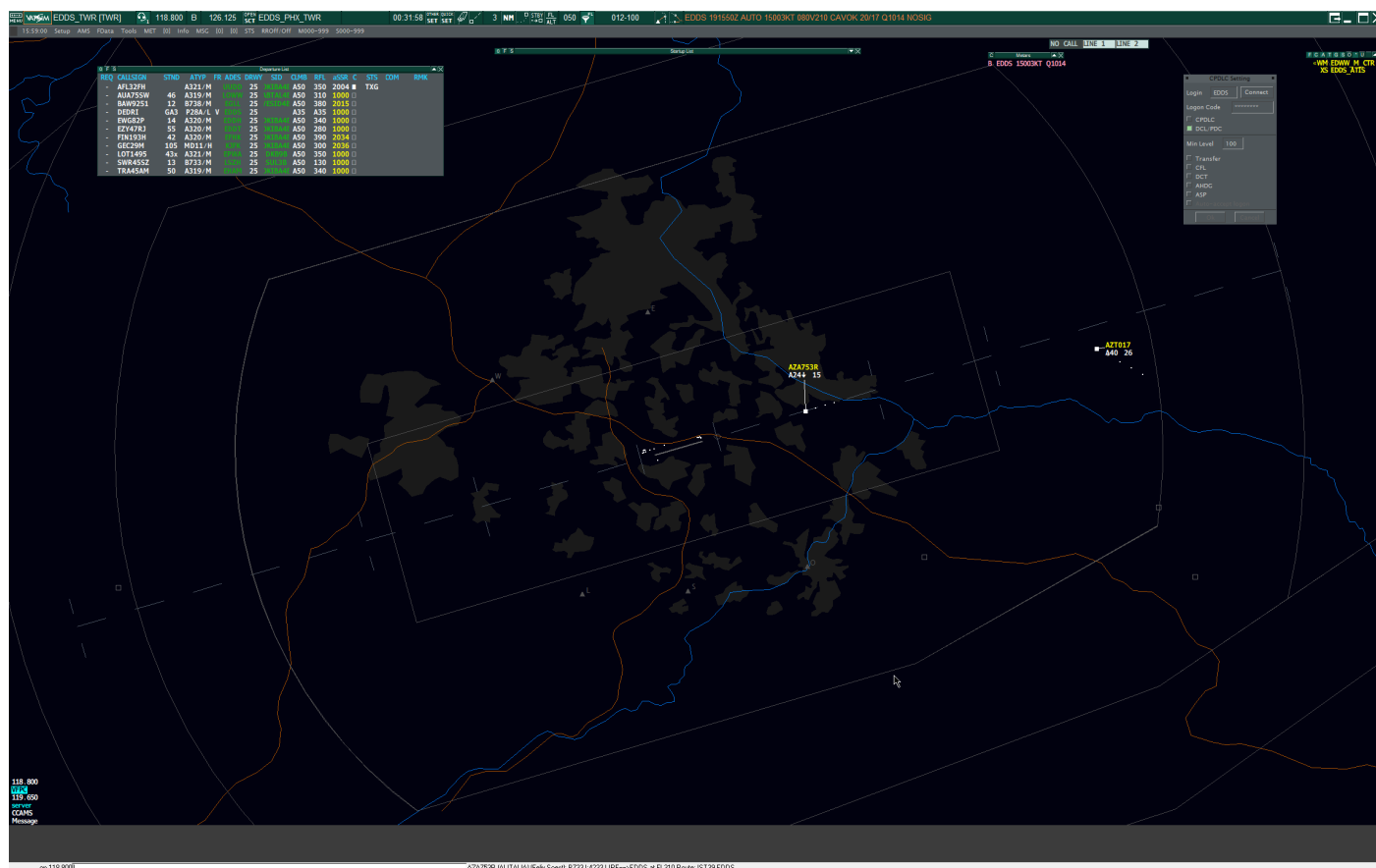
Once you have given the landing clearance, you can press on the current altitude in the Tag, which will set the cleared-to-land (CTL) flag. This will remind you that you have given the landing

clearance.
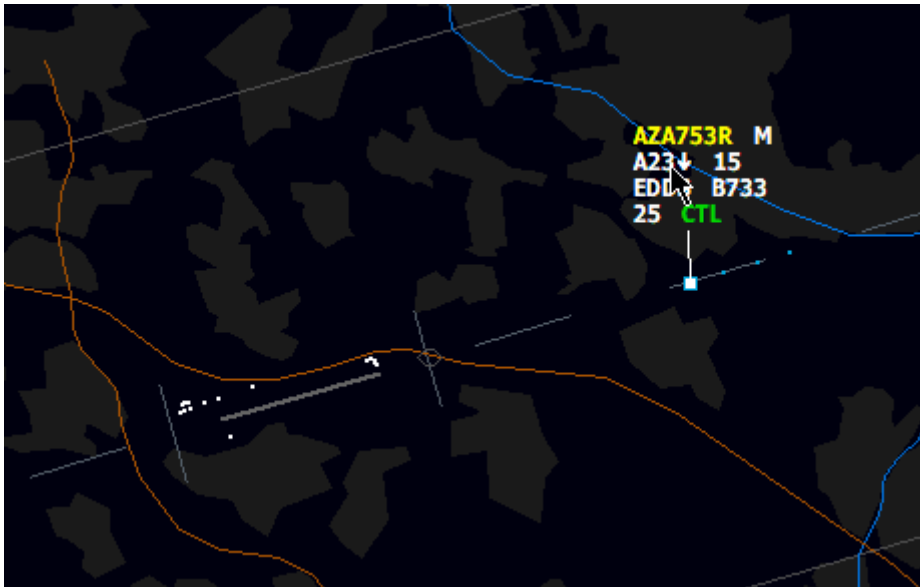
On the ground screen, you will see the aircraft shortly before it lands. A plugin will determine the arrival stand, it is shown in the aircraft's tag as well as in the arrival list (red arrows). If no stand is set, you can request one by clicking STAND -> AUTO in the aircraft tag. It is recommended to do that before landing, in case the inbound needs to vacate to a specific direction (e.g. south) for a specific stand, and the controller has to inform the pilot prior to landing.

Alias

As there are several ways for a pilot to communicate with ATC, Euroscope has implemented a way to communicate with pilots quickly via text only.

The Alias function allows you to send a predefined message to a pilot by entering a specific command in the command line. For example:

> .ctl => Wind 270/8, runway 25 cleared to land.

When you type an alias in the command line, it appears in the following format after pressing the space bar.

> .clrv => Cleared to $arr, $sid departure, flight planned route, climb via SID to $temp, squawk $squawk.
>
> .t => Taxi to holding point runway $deprwy via $uc($1).

There are two different parameters in the aliases.

- $ followed by certain information, for example, $winds. Euroscope enters the current wind automatically
- $ followed by a number, for example, $1. In this case, you have to do a manual input.

Let's make an example:

DLH123 is ready to taxi and is writing on your frequency. To respond, click on the aircraft, type ".t" in the command line, and press the spacebar. You now have the raw alias code that needs to be edited.

DLH123, Taxi to holding point runway $deprwy via $uc($2).

While Euroscope fills in the departure runway automatically by copying the departure list, we have to enter the taxi route manually. Replace the "$2" with the taxi route and press the TAB key. The result should look like this.

DLH123, Taxi to holding point runway $deprwy via $uc(M, L2, K). => DLH123, Taxi to holding point runway 07 via M, L2, K.

Now all you have to do is press Enter to send the clearance to the pilot.

> You can find a list of all available alias codes in the sector files you downloaded for EDGG [EDGG\EDGG\Alias\alias.txt].

Phoenix Tower Tags - OLD

> The Tag has changed with AIRAC 2401 (25. January 2024) for harmonisation within all three FIRs. Detailed documentation will follow by ATD. Most of the items are still the same as discribed below.

Colors

Color	State	Meaning
	Arrival	A/C flying to Aerodrome selected as Arrival in Runway setup
	Departure	A/C flying to Aerodrome selected as Departure in Runway setup
	Urgency	STCA-, MTCD-Alerts, Equipment-Warnings
	Warning	Risk, APW, not confirmed STAR/SID/RWY

Phoenix-Tags

There is no difference between untagged and tagged in the tower profile.

Untagged / Tagged

```
SQI WARNINGS
CALLSIGN WTC ATYP
AFL↓ GS
DIAS ADES CTL
```

Item	Name	Meaning
SQI	Squawk Indicator	Decodes SQUAWK into an abbreviation that indicates sth

Warnings		> TopSky-Documentation
Callsign	Callsign	
WTC	Wake-Turbulence Category	L, H and J shown in warning color, M only when toggled
ATYP	Aircraft-Type	only shown when toggled
AFL	Actual Flight Level	
↓	Descend/Climb Indicator	
GS	Groundspeed	
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin)
CTL	CTL Flag	shown when set

Detailed

```
SQI WARNINGS
CALLSIGN WTC ATYP SI
AFL  GS ASP
DIAS ADES STAND
SID ARWY CTL
```

Item	Name	Meaning	Left-Click	Right-Click
SQI	Squawk Indicator	Decodes SQUAWK into an abbreviation that indicates sth	Open CCAMS Squawk assign popup	Open flight plan
Warnings		> TopSky-Documentation		
Callsign	Callsign	in departure/arrival color	Open callsign menu	Toggle route draw (with autohide)
WTC	Wake-Turbulence Category	always shown in departure/arrival color	Open CCAMS Squawk assign popup	Open communication type popup
ATYP	Aircraft-Type		Edit remarktext	Toggle ATYP display

SI	Sector Identifier	Shows current unit that has track assumed	Open next controller popup list	Toggle SI and frequency
AFL	Actual Flight Level		Toggle CTL-Flag	Open CFL menu
↓	Descend/Climb Indicator			
GS	Groundspeed		Open ASP menu	Clear AHDG menu
ASP	Assigned Speed		Open ASP menu	Clear ASP value
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin)	Open reported IAS menu	Clear reported IAS
ADES	Aerodrome Destination		Open flight plan	Toggle route draw (no autohide)
Stand	Arrival Stand	only shown for arriving aircrafts	Open Stand menu	
ARWY	Arrival Runway	Shown in green confirmed color, if set (only shown for arriving aircrafts)	Open RWY Setup List	Open Stand menu
CTL	CTL Flag	shown when set	Toggle CTL-Flag	
SID		only shown for departing aircrafts	Open SID setup list	

Langen Radar Tags

Colors

Color	State	Meaning
⬛	Assumed Transfer initiated	Track is assumed Track is being transferred to the next controller
🟦	Notified Coordinated	Track will enter the active sector (> 15 min) Track will enter the active sector (< 15 min)
⬛	Redundant	Track has been transferred to the next controller but is still inside the active sector
🟪	Unconcerned	Track will not enter the active sector
🟥	Urgency	STCA-, MTCD-Alerts, Equipment-Warnings
🟧	Warning	Risk, APW, not confirmed STAR/SID/RWY
🟧	AIW	Airspace Intrusion Warning
🟨	Information	
🟨	Proposition outgoing	Outgoing coordination requests
🟪	Proposition incoming	Incoming coordination requests

Center-Tags

Untagged

```
SQI
CALLSIGN SI ATYP WTC GS
AFL⬇CRC
DIAS ADES
DMACH DHDG
```

Item	Name	Meaning
SQI	Squawk Indicator	Decodes SQUAWK into an abbreviation that indicates sth
Callsign	Callsign	
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed
ATYP	Aircraft-Type	only shown when toggled
WTC	Wake-Turbulence Category	L, H and J shown in warning color, M only when toggled
GS	Groundspeed	
AFL	Actual Flight Level	
↓	Descend/Climb Indicator	
CRC	Computed Rate of Climb/Descent	
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin) / only shown when toggled
ADES	Aerodrome Destination	only shown when toggled
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server

Tagged


```
SQI WARNINGS
CALLSIGN SI ATYP WTC GS
AFL↓CRC ARC CFL/PEL COP
DIAS ASP AHDG XFL ADES
DMACH DHDG
```

Item	Name	Meaning

SQI	Squawk Indicator	Decodes SQUAWK into an abbreviation that indicates sth
NSSR	Assigned Squawk	Only shown if unequal to transmitted Squawk
Warnings		> TopSky-Documentation
Callsign	Callsign	
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed
ATYP	Aircraft-Type	only shown when toggled
WTC	Wake-Turbulence Category	L, H and J shown in warning color, M only when toggled
GS	Groundspeed	
AFL	Actual Flight Level	
↓	Descend/Climb Indicator	
CRC	Computed Rate of Climb/Descent	
ARC	Assigned Rate of Climb/Descent	only shown if assigned
CFL/PEL	Cleared Flight Level / Planned Entry Level	In all states: only shown when unequal to AFL IF concerned/notified: Shows planned entry level All other states: shows cleared flight level
COP	Coordinated Point	IF assumed: shows exit COP All other states: shows entry COP
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin)
ASP	Assigned Speed	only shown if assigned
AHDG	Assigned Heading	only shown if assigned
XFL	Exit Flight Level	Only in assumed state and only when unequal to CFL or AFL
ADES	Aerodrome Destination	only shown when toggled
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server

Detailed

```
SQI WARNINGS
CALLSIGN SI ATYP WTC GS +
AFL↓CRC ARC CFL/PEL COP
DIAS ASP AHDG XFL ADES
DMACH DHDG TRACK STAR
```

Item	Name	Meaning	Left-Click	Right-Click
SQI	Squawk Indicator	Decodes SQUAWK into an abbreviation that indicates sth		
NSSR	Assigned Squawk	Only shown if unequal to transmitted Squawk	Open CCAMS Squawk assign popup	Send Squawk via CPDLC
Warnings		> TopSky-Documentation		on DUPE-Warning = auto assign squawk
Callsign	Callsign		Open Callsign Menu	Toggle route draw (NO autohide)
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed	Open next controller popup list	Assume/Transfer
ATYP	Aircraft-Type		Edit remarktext	Toggle ATYP display
WTC	Wake-Turbulence Category	L, H and J shown in warning color	Open CCAMS Squawk assign popup	Toggle WTC highlight
GS	Groundspeed		Open ASP menu	Clear ASP value
+			Open extended tag	
AFL	Actual Flight Level		Open CFL menu	Toggle Route draw (WITH autohide)
↓	Descend/Climb Indicator		Open ARC menu	
CRC	Computed Rate of Climb/Descent		Open ARC menu	
ARC	Assigned Rate of Climb/Descent	only shown if assigned	Open ARC menu	

Item	Name	Meaning	Left-click	Right-click
CFL/PEL	Cleared Flight Level / Planned Entry Level	In all states: only shown when unequal to AFL IF concerned/notified: Shows planned entry level All other states: shows cleared flight level	Open CFL/PEL menu	Open ARC menu
COP	Coordinated Point	IF assumed: shows exit COP All other states: shows entry COP	Open waypoint menu	Toggle route draw (NO autohide)
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin)	Open reported IAS menu	Toggle calculated IAS display
ASP	Assigned Speed		Open ASP menu	Clear ASP value
AHDG	Assigned Heading		Open AHDG menu	Open waypoint menu
XFL	Exit Flight Level	Only in assumed state	Open XFL menu	Open RFL menu
ADES	Aerodrome Destination		Open flight plan	Toggle ADES display
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled	Open reported MACH menu	Toggle calculated MACH display
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server		Toggle DHDG display
TRACK	True Groundtrack			
STAR	Standard Arrival Route			

Extended

```
SQI WARNINGS
CALLSIGN SI ATYP WTC GS +           TSSR
AFL↓CRC ARC CFL/PEL COP             ADEP ADES ALTN RFL
DIAS ASP AHDG XFL ADES              COMPANY C/S
DMACH DHDG TRACK STAR               SID STAR ARWY
```

Item	Name	Meaning	Left-click	Right-click

TSSR	Transmitted SSR		Auto assign squawk	Open SQUAWK assign popup
ADEP	Departure Aerodrome		Open flight plan	
ADES	Destination Aerodrome		Open flight plan	
ALT1	First Alternate Aerodrome		Open flight plan	
RFL	Requested Flight Level		Open RFL menu	
Company C/S	Radiotelephony Callsign	e.g. EWG = Eurowings		
SID			Open SID popup list	
STAR			Open STAR popup list	
ARWY	Arrival Runway		Open ARWY popup list	

Difference in Approach-Tags

Only differences are explained. The extended-label does not differ from the Center-Tag.

Untagged

```
SQI
CALLSIGN SI ATYP WTC GS
AFL↓CRC CFL ARWY
ASP ADES
DHDG
```

Item	Name	Meaning
CFL	Cleared Flight Level	Shown when unequal to AFL
ARWY	Arrival Runway	Shown in green confirmed color, if set
ASP	Assigned Speed	Shown if set
DMACH		Mach can't be displayed

Tagged

```
SQI WARNINGS
CALLSIGN SI ATYP WTC GS
AFL↓CRC ARC CFL/PEL COP ARWY
DIAS ASP AHDG XFL ADES
DHDG
```

Item	Name	Meaning
ARWY	Arrival Runway	Shown in green confirmed color, if set
ADES	Destination Aerodrome	Always shown for EDDS and EDDL stations
DMACH		Mach can't be displayed

Detailed

```
C SQI WARNINGS
CALLSIGN SI ATYP WTC GS +
AFL↓CRC ARC CFL/PEL COP ARWY
DIAS ASP AHDG XFL ADES
DHDG TRACK SID
```

Item	Name	Meaning	Left-click	Right-click
C	Clearance Indicator	Shown for aircraft flying to small airports for some stations: EDDL_APP: EDLV, EDLN, ETNG EDDK_APP: ETNN, EDKB	Clears C-Flag	
ARWY	Arrival Runway	Shown in green confirmed color, if set	Open RWY popup list	Toggle ADES display
DMACH		Mach can't be displayed		
SID		only for departures	Open SID popup list	

Rhein Radar Tags

Colors

Color	State	Meaning
■■■	Assumed Transfer initiated	Track is assumed Track is being transferred to the next controller
■■■	Notified Coordinated	Track will enter the active sector (> 15 min) Track will enter the active sector (< 15 min)
■■■	Redundant	Track has been transferred to the next controller but is still inside the active sector
■■■	Unconcerned	Track will not enter the active sector
■■■	Urgency	STCA-, MTCD-Alerts, Equipment-Warnings
■■■	Warning	Risk, APW, not confirmed STAR/SID/RWY
■■■	AIW	Airspace Intrusion Warning
■■■	Information	
■■■	Proposition outgoing	Outgoing coordination requests
■■■	Proposition incoming	Incoming coordination requests

EDUU-Tags

Untagged

```
CALLSIGN SI ATYP WTC
AFL↓CRC
GS ADES AHDG
DMACH DHDG
```

Item	Name	Meaning
Callsign	Callsign	
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed
ATYP	Aircraft-Type	only shown when toggled
WTC	Wake-Turbulence Category	L, H and J shown in warning color, M only when toggled
AFL	Actual Flight Level	
↓	Descend/Climb Indicator	
CRC	Computed Rate of Climb/Descent	
GS	Groundspeed	
ADES	Aerodrome Destination	only shown when toggled
AHDG	Assigned Heading or next waypoint	shows next waypoint or assigned heading
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server

Tagged

```
WARNINGS
CALLSIGN SI ATYP WTC
AFL↓CRC ARC CFL/PEL COP
GS ASP AHDG XFL ADES
DMACH DHDG
```

Item	Name	Meaning
NSSR	Assigned Squawk	Only shown if unequal to True Squawk

Warnings		> TopSky-Documentation
Callsign	Callsign	
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed
ATYP	Aircraft-Type	only shown when toggled
WTC	Wake-Turbulence Category	L, H and J shown in warning color, M only when toggled
AFL	Actual Flight Level	
↓	Descend/Climb Indicator	
CRC	Computed Rate of Climb/Descent	
ARC	Assigned Rate of Climb/Descent	only shown if assigned
CFL/PEL	Cleared Flight Level / Planned Entry Level	In all states: only shown when unequal to AFL IF concerned/notified: Shows planned entry level All other states: shows cleared flight level
COP	Coordinated Point	IF assumed: shows exit COP All other states: shows entry COP
GS	Groundspeed	
ASP	Assigned Speed	only shown if assigned
AHDG	Assigned Heading	shows next waypoint or assigned heading
XFL	Exit Flight Level	Only in assumed state and only when unequal to CFL or AFL
ADES	Aerodrome Destination	only shown when toggled
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server

Detailed

WARNINGS

CALLSIGN SI ATYP WTC +
AFL↓CRC ARC CFL/PEL COP
GS ASP AHDG XFL ADES
DMACH DIAS DHDG TRACK

Item	Name	Meaning	Left-Click	Right-Click
NSSR	Assigned Squawk	Only shown if unequal to True Squawk	Open CCAMS Squawk assign popup	Send Squawk via CPDLC
Warnings		> TopSky-Documentation		on DUPE-Warning = auto assign squawk
Callsign	Callsign		Open Callsign Menu	Toggle route draw (NO autohide)
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed	Open next controller popup list	Assume/Transfer
ATYP	Aircraft-Type		Edit remarktext	Toggle ATYP display
WTC	Wake-Turbulence Category	L, H and J shown in warning color	Open CCAMS Squawk assign popup	Toggle WTC highlight
+			Open extended tag	
AFL	Actual Flight Level		Open CFL menu	Toggle Route draw (WITH autohide)
↓	Descend/Climb Indicator		Open ARC menu	
CRC	Computed Rate of Climb/Descent		Open ARC menu	
ARC	Assigned Rate of Climb/Descent	only shown if assigned	Open ARC menu	

CFL/PEL	Cleared Flight Level / Planned Entry Level	In all states: only shown when unequal to AFL IF concerned/notified: Shows planned entry level All other states: shows cleared flight level	Open CFL/PEL menu	Open ARC menu
COP	Coordinated Point	IF assumed: shows exit COP All other states: shows entry COP	Open waypoint menu	Toggle route draw (NO autohide)
GS	Groundspeed		Open ASP menu	Clear ASP value
ASP	Assigned Speed		Open ASP menu	Clear ASP value
AHDG	Assigned Heading	shows next waypoint or assigned heading	Open AHDG menu	Open waypoint menu
XFL	Exit Flight Level	Only in assumed state	Open XFL menu	Open RFL menu
ADES	Aerodrome Destination		Open flight plan	Toggle ADES display
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled	Open reported MACH menu	Toggle calculated MACH display
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin)	Open reported IAS menu	Toggle calculated IAS display
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server		Toggle DHDG display
TRACK	True Groundtrack			

Extended

```
WARNINGS
CALLSIGN SI ATYP WTC +           TSSR
AFL↓CRC ARC CFL/PEL COP          ADEP ADES ALTN RFL
GS ASP AHDG XFL ADES             COMPANY C/S
DMACH DIAS DHDG TRACK            SID STAR ARWY
```

Item	Name	Meaning	Left-click	Right-click

TSSR	Transmitted SSR		Auto assign squawk	Open SQUAWK assign popup
ADEP	Departure Aerodrome		Open flight plan	
ADES	Destination Aerodrome		Open flight plan	
ALT1	First Alternate Aerodrome		Open flight plan	
RFL	Requested Flight Level		Open RFL menu	
Company C/S	Radiotelephony Callsign	e.g. EWG = Eurowings		
SID			Open SID popup list	
STAR			Open STAR popup list	
ARWY	Arrival Runway		Open ARWY popup list	

Maastricht Radar Tags

Colors

Color	State	Meaning
	Assumed Transfer initiated	Track is assumed Track is being transferred to the next controller
	Notified Coordinated	Track will enter the active sector (> 15 min) Track will enter the active sector (< 15 min)
	Redundant	Track has been transferred to the next controller but is still inside the active sector
	Unconcerned	Track will not enter the active sector
	Urgency	STCA-, MTCD-Alerts, Equipment-Warnings
	Warning	Risk, APW, not confirmed STAR/SID/RWY
	AIW	Airspace Intrusion Warning
	Information	
	Proposition outgoing	Outgoing coordination requests
	Proposition incoming	Incoming coordination requests

EDYY-Tags

Untagged

EMERGENCIES
ATYP
AFL↓
GS ADES
DMACH DHDG

Item	Name	Meaning
Emergency		Squawks 7600 / 7700
ATYP	Aircraft-Type	only shown when toggled
AFL	**Actual Flight Level**	**only item on default**
↓	Descend/Climb Indicator	displayed when descending/climbing
CRC	Computed Rate of Climb/Descent	
GS	Groundspeed	only shown when toggled
ADES	Aerodrome Destination	only shown when toggled
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server, only shown when toggled

Tagged

WARNINGS
CALLSIGN SI ATYP WTC
AFL↓CRC ARC CFL/PEL COP
GS ASP AHDG XFL ADES
DMACH DHDG

Item	Name	Meaning
NSSR	Assigned Squawk	Only shown if unequal to True Squawk

Warnings		> TopSky-Documentation
Callsign	Callsign	
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed
ATYP	Aircraft-Type	only shown when toggled
WTC	Wake-Turbulence Category	L, H and J shown in warning color, M only when toggled
AFL	Actual Flight Level	
↓	Descend/Climb Indicator	
CRC	Computed Rate of Climb/Descent	
ARC	Assigned Rate of Climb/Descent	only shown if assigned
CFL/PEL	Cleared Flight Level / Planned Entry Level	In all states: only shown when unequal to AFL IF concerned/notified: Shows planned entry level All other states: shows cleared flight level
COP	Coordinated Point	IF assumed: shows exit COP All other states: shows entry COP
GS	Groundspeed	only shown when toggled
ASP	Assigned Speed	only shown when assigned
AHDG	Assigned Heading	shows next waypoint or assigned heading
XFL	Exit Flight Level	Only in assumed state and only when unequal to CFL or AFL
ADES	Aerodrome Destination	only shown when toggled
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server

Detailed

```
WARNINGS
CALLSIGN SI ATYP WTC +
AFL↓CRC ARC CFL/PEL COP
GS ASP AHDG XFL ADES
DMACH DIAS DHDG TRACK
```

Item	Name	Meaning	Left-Click	Right-Click
NSSR	Assigned Squawk	Only shown if unequal to True Squawk	Open CCAMS Squawk assign popup	Send Squawk via CPDLC
Warnings		> TopSky-Documentation		on DUPE-Warning = auto assign squawk
Callsign	Callsign		Open Callsign Menu	Toggle route draw (NO autohide)
SI	Sector Identifier	IF assumed: shows next stations indicator / 3 minutes prior sector entry shows next frequency All other states: Shows current unit that has track assumed	Open next controller popup list	Assume/Transfer
ATYP	Aircraft-Type		Edit remarktext	Toggle ATYP display
WTC	Wake-Turbulence Category	L, H and J shown in warning color	Open CCAMS Squawk assign popup	Toggle WTC highlight
+			Open extended tag	
AFL	Actual Flight Level		Open CFL menu	Toggle Route draw (WITH autohide)
↓	Descend/Climb Indicator		Open ARC menu	
CRC	Computed Rate of Climb/Descent		Open ARC menu	
ARC	Assigned Rate of Climb/Descent	only shown if assigned	Open ARC menu	

CFL/PEL	Cleared Flight Level / Planned Entry Level	In all states: only shown when unequal to AFL IF concerned/notified: Shows planned entry level All other states: shows cleared flight level	Open CFL/PEL menu	Open ARC menu
COP	Coordinated Point	IF assumed: shows exit COP All other states: shows entry COP	Open waypoint menu	Toggle route draw (NO autohide)
GS	Groundspeed		Open ASP menu	Toggle GS display
ASP	Assigned Speed		Open ASP menu	Clear ASP value
AHDG	Assigned Heading	shows next waypoint or assigned heading	Open AHDG menu	Open waypoint menu
XFL	Exit Flight Level	Only in assumed state	Open XFL menu	Open RFL menu
ADES	Aerodrome Destination		Open flight plan	Toggle ADES display
DMACH	Calculated MACH	Simulates MODE-S readout MACH (IASsure-plugin) / only shown above FL245 and when toggled	Open reported MACH menu	Toggle calculated MACH display
DIAS	Calculated IAS	Simulates MODE-S readout IAS (IASsure-plugin)	Open reported IAS menu	Toggle calculated IAS display
DHDG	Mode-S readout heading	Heading A/C is currently flying, readout from server		Toggle DHDG display
TRACK	True Groundtrack			

Extended

```
WARNINGS
CALLSIGN SI ATYP WTC +           TSSR
AFL CRC ARC CFL/PEL COP          ADEP ADES ALTN RFL
GS ASP AHDG XFL ADES             COMPANY C/S
DMACH DIAS DHDG TRACK            SID STAR ARWY
```

Item	Name	Meaning	Left-click	Right-click

TSSR	Transmitted SSR		Auto assign squawk	Open SQUAWK assign popup
ADEP	Departure Aerodrome		Open flight plan	
ADES	Destination Aerodrome		Open flight plan	
ALT1	First Alternate Aerodrome		Open flight plan	
RFL	Requested Flight Level		Open RFL menu	
Company C/S	Radiotelephony Callsign	e.g. EWG = Eurowings		
SID			Open SID popup list	
STAR			Open STAR popup list	
ARWY	Arrival Runway		Open ARWY popup list	