

PSXseeconTraffic

Manual



Version 9.28
for Windows 10

February 23, 2018

by Nico Kaan



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1 Introduction

1.1 Welcome to PSXseeconTraffic

With PSXseeconTraffic you can fly with Real Live Traffic in P3D and FSX. There is also a special version for the [Aerowinx PSX Simulator](#).

PSXseeconTraffic injects the aircraft within range of your aircraft in your Flight Simulator. For these aircraft the liveries are created by PSXseeconTraffic in your Simulator as real as possible, depending on how many different AI aircraft you have installed in P3D/FSX.

A list of the liveries that you have installed is input for PSXseeconTraffic and can be created with my [VMRGenerator](#) application.

PSXseeconTraffic makes the AI traffic look very smooth. It calculates a position for each live AI aircraft 25 times per second by computing latitude, longitude, height, bank and 0pitch. It also takes care of setting the throttles, strobes, lights, flaps and it handles the landing gear at take-off and landing.

It also provides a mechanism to put AI aircraft at parking positions at your origin and destination airports.

In the version for PSX, PSXseeconTraffic sends information to PSX about nearby aircraft to be displayed in the Navigational Displays (TCAS) at the FlightDeck. In other versions this happens automatically.

The live traffic information is provided by [RealTraffic](#). The data from RealTraffic is based on ADS-B transponder data of aircraft. When airborne this gives very good results, on the ground it depends on airport policy. At some airports pilots must have their transponder on, while on other airports they have to switch off their transponder after landing. At those airports there will be not much taxiing traffic to see. But on the other airports you may follow the aircraft after landing taxiing to the gate or from the gate to the take-off runway.

You may also notice a difference in quality of their ADS-B equipment, the newest aircraft have the best while older ones need replacement. The good news is that these replacements will take place soon (within a few years).

RealTraffic allows playback of historical flight data up to 48h into the past (in real time), as well as injecting your own aircraft into the real world, allowing others to see where your aircraft is flying and showing up in their traffic feed.

Co-existence with 3d party traffic, such as VATSIM, IVAO, MyTraffic

PSXseeconTraffic can coexist with other 3d party traffic, or better phrased, it will not be disturbed by other traffic. What the effect of PSXseeconTraffic aircraft on the third party will be, I don't know. See section 5.9 for parameters that may support such a merge.

Do note that there is no collision detection between third party aircraft and live- or parked aircraft.

1.2 System Requirements

PSXseeconTraffic is a C++, 32 or 64bit Windows application for **Windows 10** (only).

You need Microsoft Visual C++ Redistributable for Visual Studio 2015. The standalone installers for x86 (vc_redist.x86.exe) and x64 (vc_redist.x64.exe) can be [downloaded here at Microsoft](#).


The 32bit version of PSXseeconTraffic depends on (side-by-side-configuration) the Microsoft Simconnect Client version **10.0.61259**.

The installation file **SimConnect.msi** can be found in

..\Prepar3D v3\redist\interface\FSX-SP2-XPACK\retail\lib\SimConnect.msi

and in FSX at a similar location. Install the SimConnect Client at the PC running PSXseeconTraffic.

The 64bit version has no side-by-side dependencies

	The 64bit version is for Prepar3D v4.2 only!
---	--

1.3 Disclaimer

The RealTraffic stream gives position updates of all aircraft around you every nine seconds. In order to correct for internet transmission lags, and to be able to vectorise the traffic, PSXseeconTraffic buffers the input for thirty seconds. The traffic you see is therefore **thirty seconds behind real time**. If you would consult apps such as [FlightRadar24](#), or would listen to a real ATC channel, this has to be taken into account.

The data coming from RealTraffic is not always correct. This may lead to the following issues:

- Sometimes aircraft do not land at the runway but in the fields ...
- Some airlines/aircraft-types always seem to land besides the runway; as-if their ADS_B equipment is not sending the right info.
- Sometimes aircraft disappear from the RealTraffic stream for more than 30 seconds which will lead to disappearance from your Flight Simulator while popping up again (a little) later.
- Runways that lay higher than the surroundings, such as KFSO and LPMA (with the sea) may cause problems with landings at certain QNHs. They may come in too low, due to the incorrect height above ground measurements, just before the runway.
- Some airlines perform much better than other airlines.

Some add-on airports have runways that are not at the exact spot. For example EHAM of Aerosoft. Aircraft land and take-off way off the centre line.

1.4 Forum and FAQ

For questions & answers and discussions use my Forum at [MyCockpit.org forum](#). or (preferable) my [Support Forum at AVSIM](#)

In my MyForum you will find an [FAQ](#).

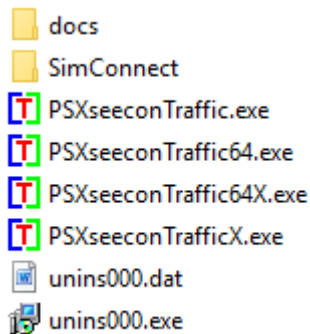
2 Installation

2.1 Download and install

Download from www.lekseecon.nl/PSXseeconTraffic.html. Unzip and run the installer.

You may install PSXseeconTraffic at any Windows 10 PC in your local network. However, do not install it in the C:\Program Files\ folder!

After installation, you will have a PSXseeconTraffic folder containing the following files and folders:



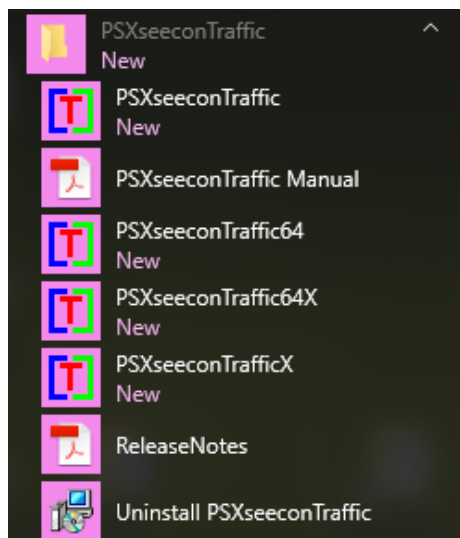
PSXseeconTraffic.exe is the 32bit application to be used with any user aircraft in FSX or P3D (v3 or v4). PSXseeconTraffic64.exe is the 64bit application to be used with any user aircraft in Prepar3D v4.2 only!

PSXseeconTrafficX.exe is the 32bit application to be used with the Aerowinx PSX with FSX or P3D (v3 or v4). PSXseeconTraffic64X.exe is the 64bit application to be used the Aerowinx PSX with Prepar3D v4.2 only!

If you choose a DesktopIcon you will get this:

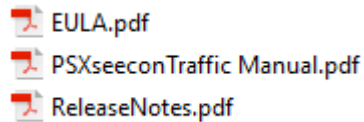


This short-cut refers the 32bit **PSXseeconTraffic.exe**! If you do not want that version or if you are using PSX you should make your own desk-top short cut or choose one of the options in the Windows Start menu:



Note that for all versions the configuration and log files are named **PSXseeconTraffic.cfg** and **PSXseeconTraffic.log**.

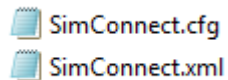
The **docs** folder contains the following files:



Documentation is provided by means of the pdf files PSXseeconTraffic Manual and ReleaseNotes.

The EULA is the End-User License Agreement. This is a legally enforceable contract between you and the Author. By accepting the installation you agree to be bound by the terms of this EULA.

The **SimConnect** folder contains the following files:



For the use of these files see section 3.2.

A **separate** download provides folder **parked** with 5398 airport files, see section 3.3. Unzip and put the folder parked inside PSXseeconTraffic.

2.2 Update and removal

Download PSXseeconTraffic_vx.y.zip, unzip and simply run the installer. It will first uninstall your previous version and then install the new one. PSXseeconTraffic.cfg and SimConnect.cfg (if in use) will not be touched, same for your parked folder.

Removing PSXseeconTraffic from your PC can be done running the uninstaller, just like any other Windows program.

3 Preparations

3.1 Create an AI_liveries.txt file

PSXseeconTraffic does not come with AI aircraft, you must install these yourself. I find the liveries from FSPXAI and FAIB the best you can get, the only drawback being that it is time consuming to install liveries one by one. You can of course also use packages such as from UTL, MT6, and what have you, but make sure that they are compatible with your Sim. P3Dv4.1 for instance does not work with FS9 based liveries.


On the internet you may find lots of sites describing how to install AI aircraft, for instance [this step-by-step guide for FSX](#)

Don't forget to add the correct entries for your installed freeware and payware aircraft in
 P3D v2: <appdata> Prepar3D.cfg
 P3D v3: C:\ProgramData\Lockheed Martin\Prepar3D v3\SimObjects.cfg
 P3D v4: C:\ProgramData\Lockheed Martin\Prepar3D v4\SimObjects.cfg
 FSX: <appdata> FSX.cfg.

If you forget it your AI aircraft will not be activated in your Simulator and you will see no traffic and you will find lots of "**cannot create messages**" in the log of PSXseeconTraffic. At the end of the day this may result in error 81.

When you're satisfied with the number and diversity of the AI aircraft in your Flight Simulator, you should create a file with all the AI liveries that you have installed. You must do that with my tool [VMRGenerator](#). How VMRGenerator detects a livery is described in the VMRGenerator Manual. How you should treat private aircraft (PVT) and governmental aircraft (GOV) is described in the VMRGenerator Manual too.

Download and install VMRGenerator according to the instructions at my website. Run it, it will create the file **AI_liveries.txt**.

	<p>Copy the file AI_liveries.txt into your PSXseeconTraffic folder or enter a full path to the VMRGenerator folder in the User Interface, see section 5.1</p>
---	--

3.2 Configure SimConnect [networked use of PSXseeconTraffic only]

If you run PSXseeconTraffic and your Flight Simulator at different computers in your local area network you have to configure SimConnect. If so perform the following two steps:

Configure SimConnect.cfg

Open the file SimConnect.cfg with Notepad and change the IP address in the line **Address=192.168.1.105** to show the IP address of the computer running your Flight Simulator and put the file in the PSXseeconTraffic folder!

Configure SimConnect.xml

PSX users: If you already have VisualPSX running remotely from your Flight Simulator you do not have to change the SimConnect.xml file at the Flight Simulators computer, because PSXseeconTraffic uses the same Port (29764) as VisualPSX.

Open the file SimConnect.xml, that comes with PSXseeconTraffic, with *NotePad* and change the IP address in the line **<Address>192.168.1.105</Address>** to show the IP address of the computer running your Flight Simulator.

If you have no other applications using SimConnect with P3D/FSX you will need to install SimConnect.xml as follows:

P3D: Copy or move SimConnect.xml to the computer running P3D and place it in the folder C:\Users\\AppData\Roaming\Lockheed Martin\Prepar3D v3

FSX: similar

Otherwise, if you do have other applications using Simconnect with P3D, such as AS16/ASNNext, you will need to **append** the lines starting with <SimConnect.Comm> and ending with </SimConnect.Comm>, **to your existing Simconnect.xml** above the line </SimBase.Document>. The location of your SimConnect.xml file is given above.

So add this block of code, with of course the IP address of your FlightSim PC, see above:

```
<SimConnect.Comm>
  <Disabled>False</Disabled>
  <Protocol>IPv4</Protocol>
  <Scope>global</Scope>
  <MaxClients>64</MaxClients>
  <Address>192.168.1.105</Address>
  <Port>29764</Port>
  <MaxRecvSize>8192</MaxRecvSize>
  <DisableNagle>False</DisableNagle>
</SimConnect.Comm>
```

3.3 Install or generate parking positions for your simulator

In order to get rid of empty airports PSXseecontraffic provides a mechanism to park aircraft at parking positions at your origin and destination.

At my website you can download a folder **parked** with some **5400** airport files, put these files in PSXseeconTraffic's parked folder.

However, you can also generate all files for **your airports** with my **ParkPosGenerator** tool. Download ParkPosGenerator from my website and unzip it to your FlightSim PC. See the ParkPosgenerator Manual for further instructions.


When you start a session at the ground at an (origin) airport for which there are parking positions defined, PSXseeconTraffic will generate parked aircraft. When you fly away from the origin airport, the parked aircraft will be removed when you are more than 5 nm from the airport. When a destination airport comes into sight (40 nm or closer), PSXseeconTraffic will place aircraft at the specified parking positions of the new airport.

How many parking positions will get a parked aircraft depends on the percentage parked value. If you do not want parked aircraft, just specify 0% percentage parked in the airport file.

The livery matching is slightly different from the matching for live aircraft (see section 4.6), while if no suitable livery is found the gate will not get a parked aircraft.

The call sign of a parked aircraft is **ICAO Airlinecode + sequence number + _**

Other advantages of having parking positions defined for an airport is that it makes it possible to put departing live traffic at gates at the right position with the right heading. Even so, a live aircraft ending its session at a gate can be placed right and "promoted" to a parked aircraft instead of disappearing.

	<p>Always use airport files with parking positions, while even with percentage parked = 0, you may see parked aircraft!</p>
---	---

4 Operations

4.1 Start and configure Flight Simulator

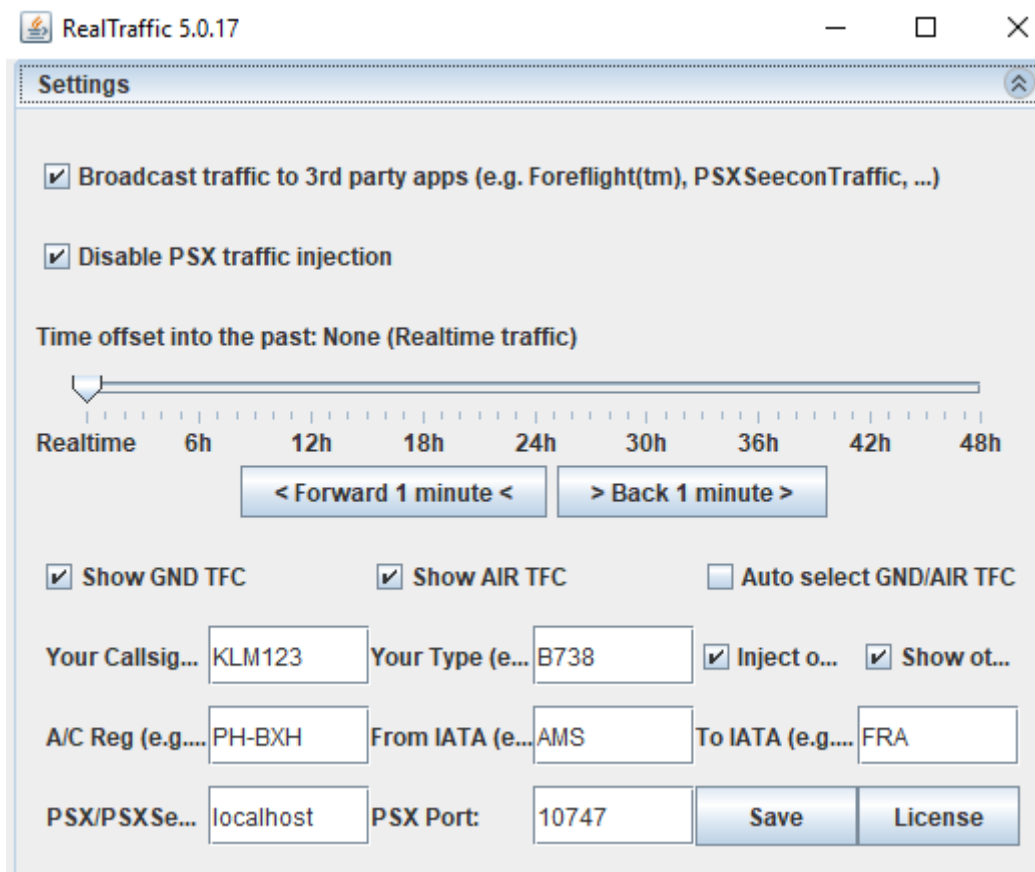
- Prepar3D versions 2.5 or later or Microsoft FSX SP2
- Make sure the Airline Traffic density and General aviation traffic density is set at **0%**.
- Set the day/time to system time, and fly in 1x mode (no acceleration).
- FSX: Do not select "Aircraft cast shadows on the ground"

4.2 Start and configure PSX (PSX only of course!).

- Make sure you have real-live / real-time weather in PSX.
- Connect PSX with your Flight Simulator, by using [VisualPSX](#) or [PSX.NET P3D ExternalSim](#) for visuals.

4.3 Start and configure RealTraffic

Make sure you are using **Windows** version **5.0.17** or later.



Always tick the **check boxes** (except Inject own and Show others) **exactly** as shown above and always use **localhost** and port **10747**.

With the slider you can go back in time (up to 48 hours) and fly with historical data. You can set the slider back and then start PSXseeconTraffic or put the slider back on the fly (while PSXseeconTraffic is running). In the latter case, the aircraft from the previous time frame will gradually disappear within 30 seconds, and the aircraft from the new time frame will appear after 30 seconds.

You can also choose to inject your user aircraft position into the RealTraffic live data stream, and you can select to see the aircraft of other Simmers in your environment. Do

note that, just like live aircraft, your virtual user aircraft will always be 30 seconds behind (in time) to yourself in your Sim. Others see your position 30 seconds later. Fill in your callsign, type, registration, origin and destination.

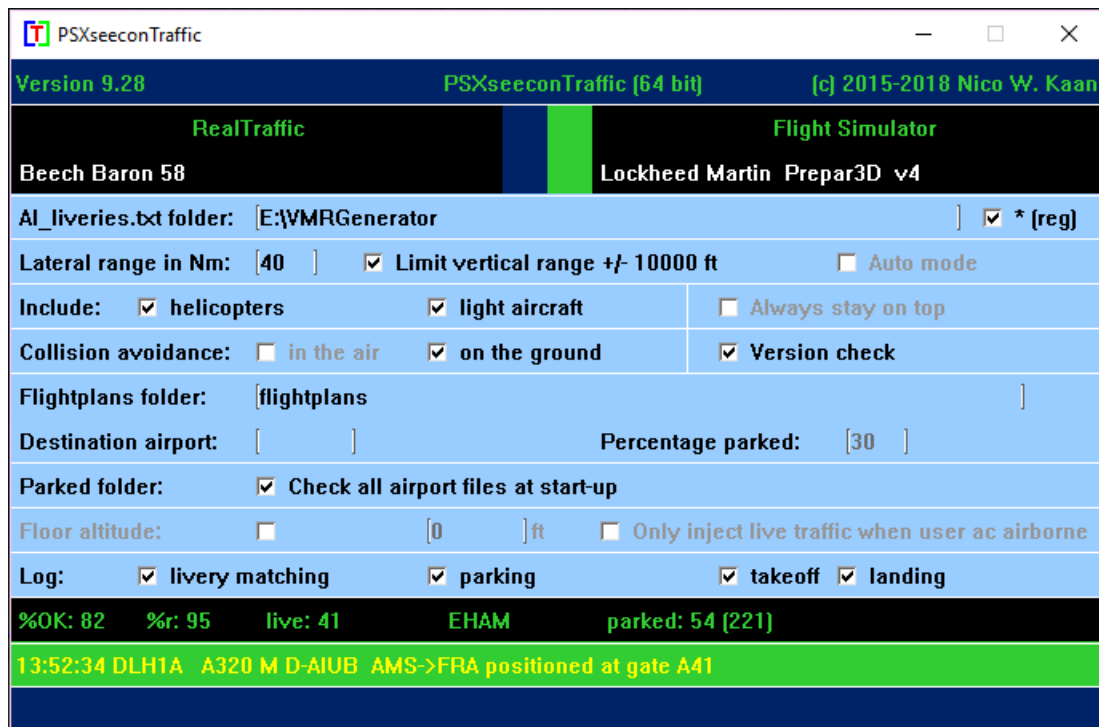
Other simulator users are shown with a leading [S] in the callsign, and [FLIGHT SIM USER] in the nearest 7 traffic list. The current (based on the time slider) weather is always shown for the nearest airport in the traffic list, as an easy reminder to always have the correct QNH and landing/takeoff runways available.

Note that injection of user aircraft is only available when flying real time, not with historical data.

The actual situation of PSXseeconTraffic users flying with live traffic and with "Inject own aircraft" selected is given at this [RealTraffic page](#).

4.4 Start and configure PSXseeconTraffic

Out of the box, PSXseeconTraffic may show up like this:



The header line gives information about the version, program name (32/64 bit) and copyright.

At each start-up when version check (see section 5.6) is ticked, – but not more than once a day- PSXseeconTraffic will check if there is a new version available. If so the normally green version message in the main window will turn yellow, and the new version number will be indicated. This is just a reminder, you should download and install the new version yourself.

The black box below the header is divided into two sections. The right section is always about your Flight Simulator (P3D or FSX), it shows in white font its version.

The left section depends on the version. In non-PSX version it is titled RealTraffic, it shows in white what aircraft you are flying in your Flight Simulator.

In the version for PSX the left section will be titled RealTraffic + PSX, and in white the Aerowinx PSX version is shown.

In the middle there are two adjacent coloured vertical status bars. The left one indicates the status of RealTraffic, the right one indicates the status of Flight Simulator.

If the right one is red, Flight Simulator is not connected. If the right one is yellow, Flight Simulator is connected but not running, maybe you are loading a flight or browsing in the menu items.

If the left one is red: Real Traffic is not connected, or for the PSX version, PSX is not connected. If the left one is yellow: Real Traffic (or for the PSX version: PSX) is connected but PSXseeconTraffic is not yet connected to the Foreflight datastream provided by RealTraffic.

If the left one is **dark blue** and the right one **green**, the necessary programs for that version are successfully connected!

4.5 Log file

During each session a file **PSXseeconTraffic.log** will be written in the same folder as PSXseeconTraffic.exe. The previous version will be renamed to PSXseeconTraffic0.log.

Of interest are the warning messages about liveries that could not be created in your Flight Simulator. You should at least remove these from your AI_liveries.txt file, or better remove the respective AI aircraft in your Flight Simulator, by changing the aircraft.cfg file.

At the end of the log file a summary is given about the liveries used for live traffic.

4.6 Livery matching process for live aircraft

From the information coming from RealTraffic:

```
Total traffic in area: 148. Nearest 7 are:
BRG  Dist  C/S  (Type  Reg)  From -> To
325° 0.6NM  KLM980 ( RJ85  EI-RJH) LCY -> AMS
123° 1.1NM   KV3 ( GRND  KV3)  ->
123° 1.4NM  ACA824 ( B763  C-FCAB) YYZ -> AMS
112° 1.6NM  BRW878 ( GRND  BRW878)  ->
128° 1.8NM   ( GRND  )  ->
121° 1.9NM   C5 ( GRND  C5)  ->
3° 2.0NM  SAS821 ( B737  LN-RNN) OSL -> AMS
```

the following items are important for livery matching:

RealTraffic info	Role in matching
C/S	From the call sign the three letter ICAO airline code will be derived (if available, else the airline code will remain empty). The airline code determines the "paint" of the livery.
Type	Determines the ICAO aircraft type of the livery. If this field is empty, the aircraft will be skipped / ignored.
Reg	The registration code uniquely identifies a livery (type + paint).

With this information a livery for a live aircraft is searched in a best effort matching process in –up to- seven steps:

Step	Match	Indicated by
1	Registration code or Registration code with wildcard (see section 5.1)a	=== r
2	ICAO airline code and ICAO aircraft type	===
3	airline and similar type(-s)	=s=
4	Generic Boeing, Airbus, Embraer, Bombardier or ATR livery and type. Generic (fabric) livery without an airline paint. In order to get these liveries found, use BOE, AIB, EMB, BBA or AED as airline code in your [fltsim.x] section as parking_codes= value.	=g=
5	random airline livery and type	=x=
6	random airline livery and similar type(-s)	=X=
7	a default aircraft livery, chosen out of a number of liveries from the same aircraft category (Heavy, Middle, Light or Helicopter)	=d=


5 Parameters

The light blue area in the middle contains the check- and text boxes for parameters that you can set.

AI_liveries.txt folder:	[E:\VMRGenerator]	<input checked="" type="checkbox"/> *(reg)
Lateral range in Nm:	[40]	<input checked="" type="checkbox"/> Limit vertical range +/- 10000 ft <input type="checkbox"/> Auto mode
Include:	<input checked="" type="checkbox"/> helicopters <input checked="" type="checkbox"/> light aircraft	<input type="checkbox"/> Always stay on top
Collision avoidance:	<input type="checkbox"/> in the air <input checked="" type="checkbox"/> on the ground	<input checked="" type="checkbox"/> Version check
Flightplans folder:	[flightplans]	
Destination airport:	[]	Percentage parked: [30]
Parked folder:	<input checked="" type="checkbox"/> Check all airport files at start-up	
Floor altitude:	<input type="checkbox"/> [0]ft	<input type="checkbox"/> Only inject live traffic when user ac airborne
Log:	<input checked="" type="checkbox"/> livery matching <input checked="" type="checkbox"/> parking	<input checked="" type="checkbox"/> takeoff <input checked="" type="checkbox"/> landing

In the PSX version there is this extra line at the bottom:

PSX hostaddress:	[127.0.0.1]
------------------	--------------

	<p>How to enter a new value in a textbox:</p> <p>Put the cursor in the textbox (indicated by the light square brackets) edit the value, and after editing press the Enter key in order to make the new value active!</p> <p>In the green information line (see section 7.2) feedback will be given about your new value.</p>
---	---

5.1 AI_liveries folder

AI_liveries.txt folder:	[E:\VMRGenerator]	<input checked="" type="checkbox"/> *(reg)
-------------------------	--------------------	--

In the middle a textbox in which you can enter a full path name to your VMRGenerator folder. If you do that you do not need to copy the file AI_Liveries.txt into the PSXseeconTraffic folder each time after you have run VMRGenerator.

It may be a full path at the same PC or at a networked PC. In case of networked, use two slashes followed by the PC name followed by a slash and then the name of the share.

At the right side a checkbox. If selected you may use a wild card (the Asterik sign) as last character in the registration string of a livery (in aircraft.cfg). For instance for the Emirates 777-300ER:

Instead of

```
atc_id=A6-EBA,A6-EBF,A6-EBH,A6-EBK,A6-EBL,A6-EBM,A6-EBP,A6-EBR,A6-EBS,A6-EBT,A6-EBU,A6-EBV,A6-EBX,A6-EBZ,A6-ECB,A6-ECE,A6-ECF,A6-ECG,A6-ECH,A6-ECI,A6-ECJ,A6-ECK,A6-ECQ,A6-ECR,A6-ECS,A6-ECT,A6-ECU,A6-ECV,A6-ECW,A6-ECX,A6-ECY,A6-ECZ,A6-EGA,A6-EGB,A6-EGC,A6-EGD,A6-EGE,A6-EGF,A6-EGG,A6-EGH,A6-EGI,A6-EGJ,A6-EGK,A6-EGL,A6-EGM,A6-EGN,A6-EGO,A6-EGP,A6-EGQ,A6-EGR,A6-EGS,A6-EGT,A6-EGU,A6-EGV,A6-EGW,A6-EGY,A6-EGZ,A6-ENA,A6-ENB,A6-ENC,A6-END,A6-ENE,A6-ENF,A6-ENG,A6-ENH,A6-ENI,A6-ENJ
```

you may specify

```
atc_id=A6-EB*,A6-EC*,A6-EG*,A6-EN*
```

This is a lot less work, saves data in PSXseeconTraffic, speeds up livery search and is future proof while when Emirates adds a new 777 (A6-ENK), it will be recognised immediately without you having to change your aircraft.cfg file.

PSXseecontraffic will always try the registration code provided by RealTraffic first, and then - if this checkbox is selected - a registration code with an '*' at the end, so you can still have special Emirates 777 liveries in your aircraft.cfg file with a full registration code.


If you are not using this wildcard option in your liveries, you better not select this checkbox, while in that case it will make livery search slower.

5.2 Range section

Lateral range in Nm: [15] Limit vertical range +/- 5000 ft Auto mode

This section has three controls for changing the range. They control how many live aircraft will be injected in your simulator.

All aircraft within a lateral range of 100 nm can be selected. The default lateral range is 40 nm, you may change that number in the lateral range text box to values between 5 and 100.

	<p>If you are using FSUIPC make sure that the settings for "Limit TCAS range" on the Misc tab are equal to the value in PSXseeconTraffic. And don't use the FSUIPC Traffic limiter!</p>
--	---

If the **Limit vertical range** checkbox (default off) is selected, then only aircraft within 10.000 feet difference in altitude with PSX/the user aircraft are taken into account.

The **Auto mode** checkbox is meant for pilots flying with live traffic. If selected PSXseeconTraffic will dynamically and automatically set the lateral and vertical range parameters according to the stage of your flight.

This will have the effect that only the aircraft that may be of interest to you as a pilot flying will be injected in your simulator, resulting in as little as possible effect on your fps.

At the ground: the Lateral range is 12 nm and the vertical range +/- 5.000 ft.

In the air, at an altitude below 10.000 feet and within range of 15 nm of your origin / destination airport: 20 nm and 7.500 ft.

In the air, at an altitude below 10.000 feet and out of range of 15 nm of your origin / destination airport: 30 nm and 7.500 ft.

In the air at an altitude above 10.000 feet: 40 nm and +/- 12.500 ft.

5.3 Include section

Include: helicopters light aircraft

If include helicopters checkbox is selected, helicopters will be shown in your Simulator. If include light aircraft checkbox is selected, light aircraft will be shown in your Simulator. If you do not have these liveries, the checkboxes will be disabled.

Gliders and Ground Vehicles are never generated in your sim, they will be skipped if they are available in the RealTraffic stream.

5.4 Always stay on top

Always stay on top

If checked the application will always stay on top of your screen.

5.5 Collision avoidance section

Collision avoidance: in the air on the ground

If in air is selected, near collisions will be suppressed. A "near collision" is defined if an AI aircraft is within 3 nm laterally and +/- 800 feet vertically from the user aircraft.

If on the ground is selected (default on), PSXSeeconTraffic will check, each second, for the near collision of the PSX /user aircraft with a live aircraft. If so, the live aircraft will be removed for at least 30 seconds. It will return if there is no longer a near collision.

It will also check, each second, for the near collision of the PSX/user aircraft or a live aircraft with a parked aircraft. If so, the parked aircraft will be removed. It will not return during the session at this airport.

The "rules of thumb" for detecting a near collision at the ground are as follows:

1. there are three categories of aircraft Light+Helicopters, Middle or Heavy;
2. two aircraft types collide if the distance between their main gears is less than a value dependent on the aircraft categories of both parties.

5.6 Version check

Version check

If selected, a version check is done max 1 time a day at start-up and/or when this parameter is ticked.

5.7 Destination airport section

Flightplans folder: [flightplans]
 Destination airport: [] Percentage parked: [35]

This section contains three parameters related to your destination airport.

Flightplans folder (default flightplans)

Gives a path to a folder with .pln files. The default value is PSXseeconTraffic's subfolder flightplans.

PSXseeconTraffic will automatically detect your Destination airport from a .pln file exported by a Flight Planner (such as PFPX and ProATC)) in the flightplans folder. It will take the latest created (in time) .pln file with a **DepartureID** equal to your actual origin airport.

Destination airport

This is where to manually fill in the ICAO code of your destination airport (if you are not using a flightplan). Only destinations that are present in your parked folder are allowed.

If your destination is within 40 NM, parked aircraft will be placed on your destination airport, if percentage parked > 0 of course.

If you fill in a new destination, and there are no parked aircraft at your origin, PSXseeconTraffic will show the number of parking positions and percentage parked values of your destination airport file immediately.

If you fill in a new destination while you are still at your origin, the number of parking positions and percentage parked values of your destination will be shown as soon as your origin airport is out of sight and parked aircraft have been removed.

Note that if you fly to an airport without filling in the destination, you will get parked aircraft (if there is a parking position file) at that airport automatically, but only after you have landed. So it is always better to fill in your destination. The parking then starts when you are within 40 nm from the airport, so the airport looks lively when you descend.

Percentage parked

The percentage parked value. This defines, on average, how many of the available parking positions at an airport will get a parked aircraft. These parking positions are drawn randomly such that on average the specified percentage of the parking positions will have an aircraft.

This value will be set to the airport specific value automatically, if an airport file contains a setting for parameter PERCENTAGE_PARKED. Only for destination airports you can change this value manually, and only in the time frame between PSXseeconTraffic showing the percentage in the destination airport file and when parking should start.

5.8 Parked folder section

Parked folder: Check all airport files at start-up

If checked, all airport files in PSXseeconTraffic's subfolder parked will be checked when PSXseeconTraffic starts.

The following checks are performed:

- that lines with values for these parameters are present: PERCENTAGE_PARKED, NUM_PARK_POSITIONS and AIRPORT_ALTITUDE_FEET;
- that a parking position line has exactly 6 parts separated by semicolons;
- that the heading, latitude and longitude values are valid.

The results are written to the log file. A summary is given as information message if there are no problems found, or as warning message if there were problems found.

The default parameter value is checked. If the outcome is positive, it will be set to unchecked automatically to prevent further unnecessary checks.

5.9 Merge with third party aircraft section

Floor altitude: [1000] ft Only inject live traffic when user ac airborne

This section contains three parameters.

Floor altitude checkbox

If selected the Floor altitude in feet becomes active.

Floor altitude in feet

This defines an altitude in feet above the aerodrome. Below this altitude live aircraft will be suppressed. If you would enter 1000, all live aircraft below 1000 feet of the ground level of the field will be suppressed, thus leaving airports and runways free of live traffic. This makes it easier to blend live traffic with VATSIM or IVAO or "what have you" traffic. Note that this does not block the parking of static aircraft at gates.

This function only works well with the airport files generated by ParkPosGenerator version 4.1 or later, while from that version on the Airport Altitude in feet is written to the airport files. Note that you can also just copy the parked.zip file from my website, or add a line with:

AIRPORT_ALTITUDE_FEET=<value>

to your airport files manually.

Only inject live aircraft when user aircraft is airborne

If selected, live traffic is only injected in your simulator when the user aircraft is airborne. This parameter can be used combined with the Floor altitude in order to blend live traffic in the air and canned traffic at the ground.

5.10 Log section

Log: **livery matching** **parking** **takeoff** **landing**

The log section contains four parameters:

livery matching

If checked information about each livery match (parked and live aircraft) is written to the log file. For the matching process of live aircraft see section 4.6.

parking

If checked the log file will contain messages about static and live aircraft parking or removal from a parking place. Do note that when a live aircraft starts its flight with a position close to a gate, PSXseeconTraffic will position this aircraft spot on and with the right heading at the gate. When a live aircraft leaves the traffic stream while it is at a gate, PSXseeconTraffic will change the live aircraft into a static aircraft, its callsign is lengthened with an underscore character.

takeoff

If checked the log file will contain messages about aircraft taking off. The message will also be shown as information message in the main window.

landing

If checked the log file will contain messages about aircraft that have landed. The message will also be shown as information message in the main window.

5.11 Hostaddress (PSX version only)

PSX hostaddress:

The IP-address (hostaddress, default 127.0.0.1) of Aerowinx PSX. If PSX runs at another computer than the one running PSXseeconTraffic you should give the IP-address of the PSX main server.

If you have entered a valid IP-address PSXseeconTraffic will exit. Restart PSXseeconTraffic to let this new IP-address become active.

6 Aircraft animations

PSXseecontraffic controls landing gear, throttles, spoilers, flaps and all lights of live aircraft. Ofcourse only for those aircraft that support the respective SimConnect events!

*Note for **parked** aircraft: cabin lights and logo lights are on (if not parked at a ramp), engines are shut down, spoilers set to normal, flaps are up and parking brake is set.*

Landing gear

The landing gear is retracted about three seconds after lift-off. The landing gear is extended if the aircraft is landing (lowering in height) and less than 2000 feet above the ground.

Throttles

The engines are switched off when positioned at a gate. The throttles are set to idle at the ground, to full when taking off and in the air, and to half when landing. This has effect on the sound coming from the AI aircraft (if sound is configured for the AI aircraft in your Sim).

Spoilers

The spoilers will go up at touch down; the spoilers go back to normal when speed is low enough or the aircraft has vacated the runway.

Flaps

The flaps are set to twenty at the ground for departing aircraft and to up for arriving aircraft and when in the air. During the landing phase the flaps will go gradually to flaps down. Flaps will go up when the aircraft vacates the landing runway.

Strobes

The strobes are set to on if an aircraft is taking-off; the strobes are set back to normal when the aircraft has landed and vacated the runway.

Landing Lights

Landing lights are on below 10.000 feet, and off when the aircraft has landed and vacated the runway.

Cabin Lights, Navigation Lights and Beacon

Cabin lights, Navigation lights and Beacon are always on.

Taxi, Logo and Recognition Lights

Taxi lights are on at the ground.

Logo lights are always on below 10.000 feet (although lots of AI aircraft also put Logo Lights on if cabin lights are on ...).

Recognition lights are always on below 10.000 feet.

7 Messages

7.1 Status line

The black box, below the parameters section, gives the following information.

%OK

Shows how successful PSXseeconTraffic is in matching the correct liveries for the live aircraft. Above 80% it is shown in green, between 50% and 79% it is shown in Yellow, and below 50% it is shown in red.

%r

Shows the percentage of the matched liveries that were matched upon registration code. Above 80% it is shown in green, below it is shown in yellow.

Live

Shown is the number of live aircraft injected and controlled by PSXseeconTraffic in your Flight Simulator.

<ICAO airport code>

The ICAO code the airport for which parked aircraft can be generated in your simulator.

parked: <number> (<max number of parking positions>)

Shown is the number of parked aircraft (either static or live) at your origin or your destination in your Flight Simulator.

This value may decrease while PSXseeconTraffic removes a parked aircraft when a collision with the user aircraft or a live aircraft is about to happen.

This value may increase when a live aircraft disappears from the RealTraffic stream while it is at a parking position (probably arriving at this position). PSXseeconTraffic will position it correctly at the parking position and it'll stay there as a parked aircraft, until another live aircraft claims this position.

No Traffic

If PSXseeconTraffic no longer receives position data of live aircraft from RealTraffic this text will appear.

7.2 Information line

In the green box below the parameters, information messages in yellow font, may appear:

14:55:57 EHAM is out of sight, parked aircraft will be removed

7.3 Warning / Error messages line

In the dark blue (bottom) box of the window, warning messages, in red font, may appear:

User aircraft at 43.499654,5.372721, don't know which airport?

The dark blue box turns red if an error messages in yellow appears, for example:

51: File AI_liveries.txt not found

Error messages are always severe. You have to exit PSXseeconTraffic yourself with the Windows X button.

The error messages (*and what to do*) are:

#	Error Message (<i>and what to do</i>)
51	File AI_liveries.txt not found <i>Create this file, see section 3.1, and either put it in the PSXseeconTraffic folder or make a link to it (see section 5.1)</i>
52	AI_liveries.txt does not contain liveries <i>Make sure you have AI aircraft installed, and create such a file, see section 3.1.</i>
81	There are too many AI-aircraft that could not be created, see the log <i>Activate your AI-aircraft in your Flight Simulator (see section 3.1)</i>

Aerowinx PSX version only:

17	Connect to TCP/IP failure, <hostaddress>, <port> <i>A Fire Wall might block the connection to PSXSeeconTraffic request. Allow PSXseeconTraffic access.</i>
18	Connection attempt to PSX timed out <i>Is your hostaddress value correct (see section 5.1)?</i>
19	PSX not detected <i>Is PSX running?</i>
20	Bind to RealTraffic failed. <i>Is Aerowinx PSX running? Are you running the non-PSX version? Use a ...X.exe version.</i>