

# Displaying ADL Weather in ForeFlight ADL140, ADL150(B), ADL190, ADL200

Version 1.00

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## 1 Version History

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#### 2 Page Index

This manual contains numbered pages 1 to 9.

#### 3 Emergency procedures

If you suspect any malfunction of the ADL140/150(B)/190/200 or interference with other aircraft systems, deactivate the device by pulling / deactivating the aircraft circuit breaker for the device or pulling the cigarette lighter plug whichever is applicable. Do not reactivate the device until the problem has been investigated and resolved on the ground.

In case of a generator failure or similar situation requiring electric load shedding, deactivate the ADL190/200 by pulling / deactivating the aircraft circuit breaker for the device or pulling the cigarette lighter plug whichever is applicable.

#### 4 AHRS Warning

The ADL190/200 comes with a non certified experimental AHRS. THIS AHRS IS NOT DESIGNED OR SUITABLE TO CONDUCT ANY IFR/IMC FLIGHT. IT IS DESIGNED FOR ENTERTAINMENT PURPOSES ONLY, DRIVING SYNTHETIC VISION IN SUITABLE iPad APPS AND SIMILAR.

DO NEVER FLY THE AIRCRAFT BASED ON THE ADL190/200 AHRS! USE ONLY OTHER CERTIFIED INSTRUMENTS FOR THIS TASK.

## 5 ADS-B Traffic Warning

The ADL190/200 comes with a non certified 1090 MHz ADS-B receiver. Not all aircraft are broadcasting 1090 MHz ABS-B and the non certified nature of the ADL200 means that due to antenna installation etc. it could even miss signals from aircraft broadcasting ADS-B. **NEVER RELY ON THE ADL200 FOR COLLISION AVOIDANCE!** 

#### 6 Weather Warning

While we do everything we can to ensure quality the ADL190/200 devices might not work at any time. In addition the system may display false information. **NEVER PENETRATE WEATHER BASED ON THE INFORMATION PROVIDED BY THE ADL200** This information is for situational awareness only. The device features a GPS moving map system. This system is designed to display the aircraft position in relation to the weather data. **THE ADL140/150(B)/190/200 IS NOT SUITABLE AS A MEANS OF PRIMARY NAVIGATION**. Especially the build in database is not updated in a regular aviation cycle. It is also not maintained to the standards of certified aviation databases

## 7 General Description

The ADL devices ADL140, ADL150(B), ADL190 and ADL200 are capable of broadcasting weather, traffic and AHRS information over the local WiFi to connected devices. Besides our own ADLConnect app other Apps can pick up the signal and display the data. Please install the latest firmware on your ADL device (version 8.50 at the date of this document) as previous versions might be missing features. This manual explains how to display this data in popular third party apps.

#### 8 Weather Download procedure

Besides Sky-Map all other apps will only display the downloaded weather data. This means that you have to program or import a route to the ADLConnect app and start a single download or automatic downloads from within the ADLConnect app. Only thereafter you can switch over to other apps and they will start to pick up the received weather information.

PLEASE NOTE THE GDL90 WEATHER TRANSFER FOR OTHER APPS ONLY WORKS FOR WEATHER DOWNLOADED BY THE ADL DEVICE ITSELF. INTERNET DOWNLOADS FROM THE APP DO NOT WORK.

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Figure 1 ADLConnect Download Procedure



Figure 2 ADLConnect With Current Weather Download

# 9 Displaying ADL Weather in ForeFlight

As described above download the latest weather using the ADL device. Then switch over to ForeFlight. In the top left corner of the map ForeFlight will display immediately that it is connected to an ADL device, in this example and ADL200. You also see the ADL traffic displayed on the map. If you press on the left top corner of the map a small window will open and you can see the timestamp information for the weather and traffic.



Figure 3 Data timestamps in ForeFlight © ForeFlight

The make sure you have the relevant map layers activated. The screenshots below shows the details. I suggest to activate the "Radar (Composite)", "Traffic" and further down in the list the "Lightning" Layer.



Figure 4 Select "Radar (Composite)" and "Traffic" © ForeFlight



Figure 5 Also select "Lightning" © ForeFlight

If you use and ADL190 or ADL200 with AHRS you can open the synthetic vision control and the attitude information from the ADL device will be used to power the synthetic view. PLEASE KEEP IN MIND THE ADL AHRS AND ForeFlight ARE NOT CERTIFIED. NEVER USE THIS FEATURE FOR PRIMARY FLIGHT CONTROL OR SIMILAR.

On the right side you can see the radar data coming in. This will take a while and the data will come in vertical stripes.



Figure 6 Synthetic vision driven by the ADL190/200 AHRS © ForeFlight

Below a screenshot showing the whole ADL weather corridor downloaded to ForeFlight.



Figure 7 Radar data for the whole route © ForeFlight

Besides the radar you open the "Cloud Tops (ADS-B)" layer. Please note this layer automatically deactivates the radar layer as both can not be displayed at the same time. Then make sure the altitude slider at the right bottom corner of the map is all the way down. Now you can see the ADL infrared data displayed in ForeFlight. **PLEASE NOTE THE COLORS ARE THOSE OF THE ADL SYSTEM BUT THE ForeFlight** 

ALTITUDE LEGEND WILL NOT MATCH. CONSULT THE ADL LEGEND FOR THE CORRECT ALTITUDES.



Figure 8 Infrared data © ForeFlight

Finally below a screenshot showing the Airport page. The ADL device will also broadcast the downloaded METAR/TAF and ForeFlight will pick up those and display them on the Airport page.



# 10 Contact

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