

ADL110B, ADL120, ADL130 ADL140, ADL150(B), ADL160, ADL170 ADL180, ADL190, ADL200 Iridium GO

Troubleshooting iOS WiFi Problems

Version 1.40

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1 General Description

This manual gives some hints on how to optimize the WiFi performance of your iPhone or iPad when connected to any of the ADL devices. Some aspects shown below could also cause a complete failure of the WiFi link.

2 Rebooting your iOS Device Completely

In some rare cases the steps shown below are not enough. Then we suggest rebooting your iOS device completely. IOS device remain on all the time even if you pause them by switching off the screen. So devices running for months are quite common. To completely reboot your iOs device press the On/Off button for severl seconds until a red slider appears on the screen. Slide that to switch off the device. Now wait until it is off and give it a few seconds. Now you can restart it with the usual On/Off button. It should now do a complete start which will take a couple of seconds booting up the whole system. This process can cure all kinds of software issues and will terminate all running background apps (see next step) at the same time.

3 Deactivate any Virtual Private Networks (VPN)

If you have configured any VPN service on your iPhone or iPad please make sure it is completely deactivated when using an ADL or GO device to assure the ADLConnect app can actually communicate with the device using WiFi.

4 Terminating Background Apps

Some apps running in the background will try to transmit data over the ADLConnect WiFi. This might congest the WiFi link reducing the performance of the ADLConnect app. So we suggest terminating all apps which are not required in flight. If you did just reboot your device as described below you did already terminate all background apps.

In order to close apps please double press on the "Home" button below the screen. Then push up, out of the screen all apps which are not required. This terminates the app and removes it from the background.



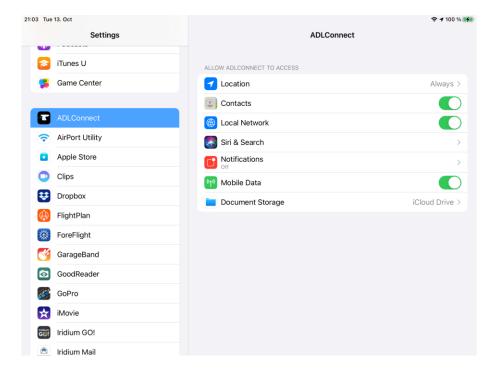


We suggest repeating this process each time before you go flying or experience any performance issues with your WiFi link.

5 Verifying iOS Settings for ADLConnect

Some of the settings shown below only exist since iOS 14. If you use an earlier version just ignore those parts.

Please open the general iOs settings and scroll down on the left side until you see ADLConnect. Select "ADLConnect" and verify the settings on the right side are as shown below.



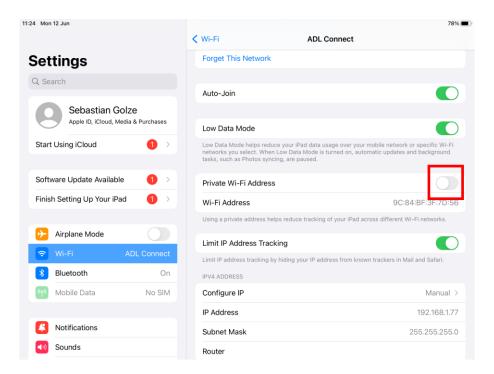
- ADLConnect needs the Location "Always" authorization to run in the background when in flight and send you notifications etc. We do not care about your location and the app will self terminate if not connected to a device to preserve your battery.
- ADLConnect wants to access your contacts to match those to the numbers for the satellite SMS and send email. We do nothing else with your contacts, do not store or transmit them.
- ADLConnect needs to access the "Local Network" to access the ADL devices (available since iOS 14 only).
- If you enable Notifications ADLConnect will send you short iOS notifications if an SMS comes in and you are not in the ADLConnect app.
- Mobile Data must be enabled to allow ADLConnect to download weather data over the Internet. The app will not use up any airtime unless you request and Internet weather download.

6 Special iOS WiFi Settings

The ADL device should work fine without doing any special settings. But there are a few steps you can do to speed things up and which might help in some special situations.

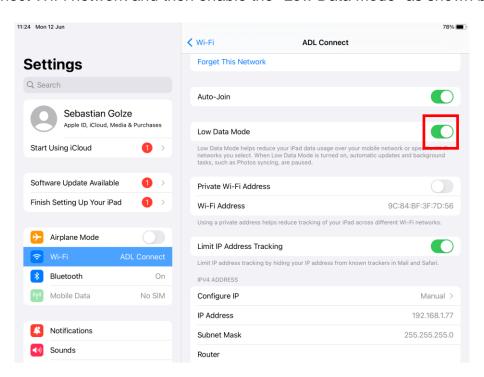
6.1 Disabling Private Address

This setting is only available since iOS 14. Open the iOs WiFi settings, select the ADLConnect WiFi network and then disable "Private Address".



6.2 Enabling Low Data Mode

This setting is only available since iOS 14. Open the iOs WiFi settings, select the ADLConnect WiFi network and then enable the "Low Data Mode" as shown below.

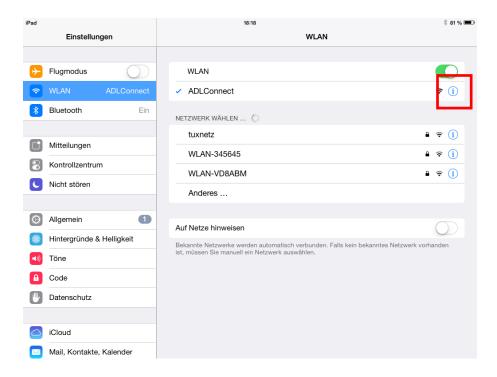


6.3 Setting a Manual IP Address and Leaving the Router Blank

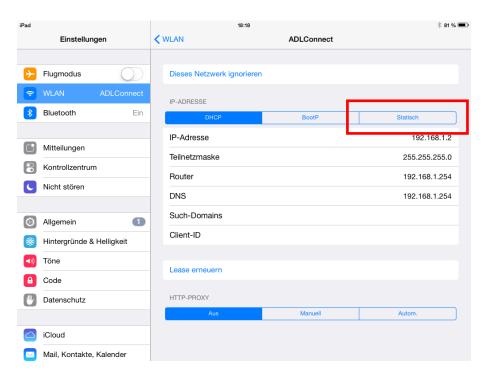
(Please disregard this step if you are using an Iridium GO device, this is for ADL devices only).

The iPhone or iPad needs some time to establish the WiFi link. This process can be optimized if you set a so called fixed IP address. The following screenshots illustrate this process.

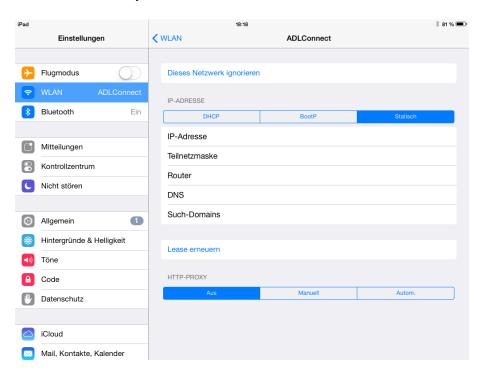
Step 1 Make sure you are connected to the ADLConnect WiFi. Then click the little "I" symbol on the right side.



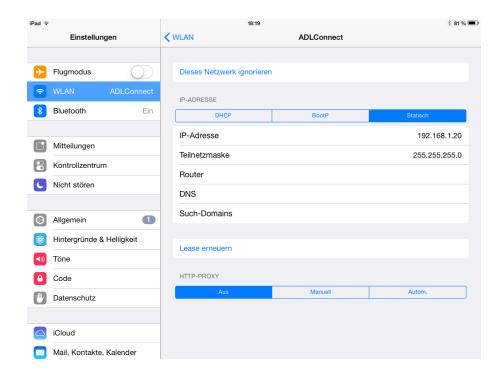
Step 2 On the following screen select "Static" on the right side



Step 3 Now the screen should look like this screenshot and you can proceed entering the values manually.



Step 4 Please enter the values as shown below. Leave empty the other fields. If you have more than one iPad/iPhone connected to your ADL device count up the IP-Address. So the second device would get 192.168.1.21, the third 192.168.1.22 etc.



Close up view of the values required. Please pay attention to enter everything exactly as shown with the dots etc. Little differences do matter.

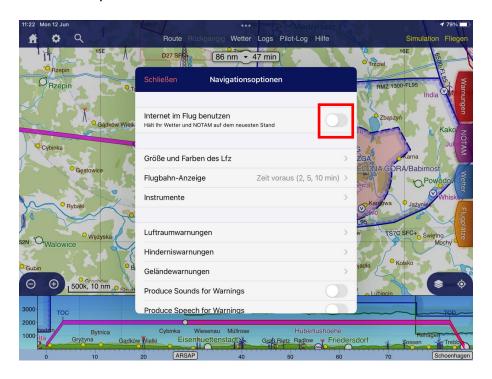
Statisch
192.168.1.20
255.255.255.0

Step 5 After entering all fields close the WiFi configuration with the home button and switch of to the ADLConnect app in order to use your ADL device.

This configuration is permanent and does not have to be repeated the next time you use the ADL device.

7 Disabling Internet access in SkyDemon

Experience has shown that SkyDemon trying to connect to the normal Internet can cause issues with the WiFi link to your ADL device. So it is suggested to disable this feature. Go to Settings - > Navigation Options and then disable the "Use Internet in flight feature" at the top of the list.



8 Changing the used WiFi channel

(Please disregard this step if you are using an Iridium GO device, this is for ADL devices only).

The ADL devices will usually run on their default WiFi channel 6. If for some special reason local interferences render this channel unusable, it is possible to change this channel.

For the ADL110(B), ADL120 and ADL130 please email us and we will provide specific instructions if this step is really required.

For the ADL140, ADL150(B), ADL170, ADL180, ADL190 and ADL200 please update the ADLConnect app and the device firmware to at least version 8.76 and then you will be able to change the channel on the Config page of the ADLConnect app. Please note you will have to configure a "Custom Access Point" to change the channel. The ADL device will always boot up with the default configuration to allow recovery in case of bad configurations and after 90 seconds switch over to your special settings.

9 Connecting multiple iOS devices issue

We have seen cases where some iOS devices could not be connected to the ADLConnect WiFi. The "wheel" next to the WiFi name will turn but it will not change into a checkmark. In those cases it usually helps to disconnect all other connected devices from the WiFi using the "Forget this network" button on each iOS device. Then you can reconnect the devices one by one starting with the one causing troubles and all should connect properly.

10 Using multiple iOS devices issue at the same time

(Please disregard this step if you are using an Iridium GO device, this is for ADL devices only).

The ADL110(B), ADL120 and ADL130 can only serve one instance of the ADLConnect app at a time. The app on other iOS devices will not be able to connect until the app is closed on the first device. Please do not confude this behaviour with any WiFi issues as the symptoms could look similar on a second device trying to connect.

The ADL140, ADL150(B), ADL170, ADL180, ADL190 and ADL200 can serve multiple instances of the ADLConnect app at the same time. So you can use ADLConnect on multiple devices at the same time looking at the same weather data etc.

11 Contact

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