



HYPACK
a xylem brand

Sounding Better!

Use your iPhone as GPS for HYPACK®

By Boris Schulze

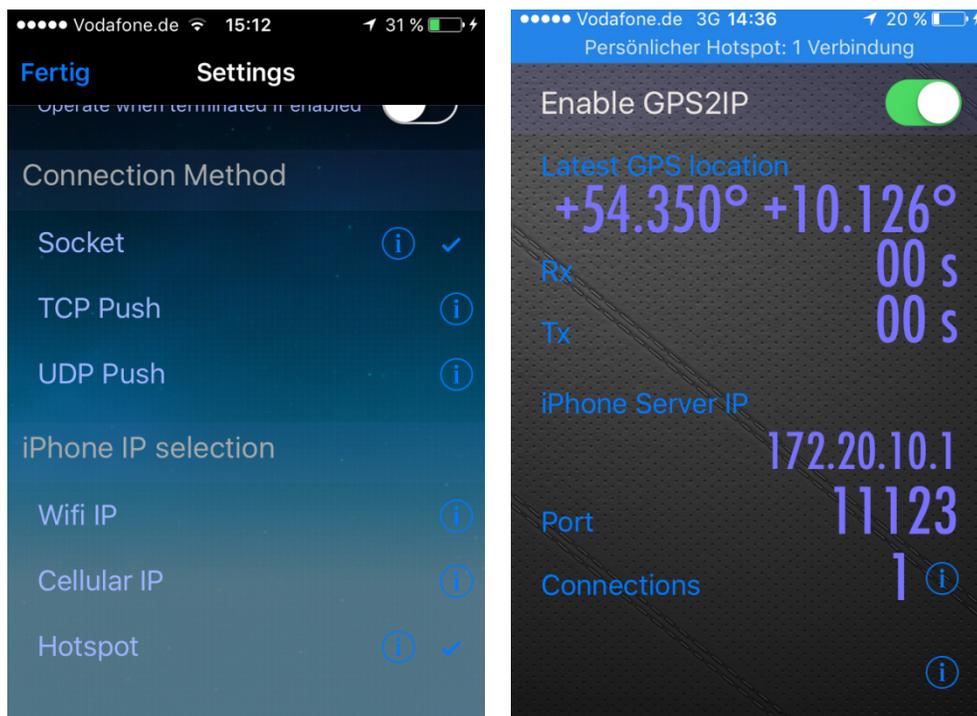
Recently, I was on a ship doing a test survey. Sitting on the back deck, I wanted to check out a few HYPACK® features, but every time I started SURVEY, it didn't work well, as I did not have a GPS hooked up to my laptop. I could have run the simulation driver, but I wanted to have real positions. Buying a GPS mouse is another solution, as they are really cheap now, but not for me then and there.

Nearly all of us have a Smartphone which has a built in GPS. So, how can we get the GPS data into a laptop and HYPACK®?

I searched the web and found an app that does exactly what I wanted: it acts as a GPS Server, streaming the GPS data via the network (GPS2IP for iPhone, GPS Tether and btGPS for Android). I will concentrate on GPS2IP due to a lack of an Android phone. But the setup is similar for Android phones.

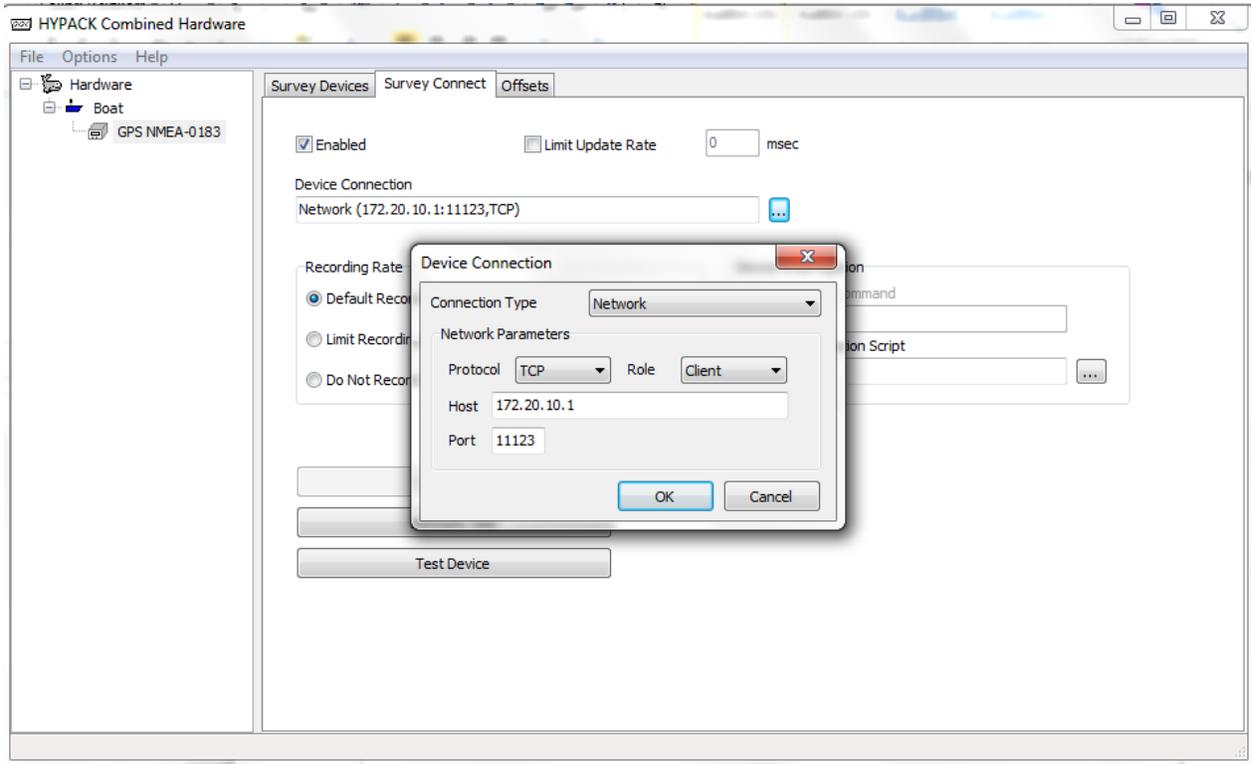
1. **Make sure your laptop and phone are connected** using the Hotspot on your phone or you are on the same WLAN.
2. **Setup GPS2IP to use the hotspot and a socket.** When this is done, it shows you the server connection on the main screen.

FIGURE 1. Screenshots from GPS2IP



3. **Set up HYPACK®.** Just select the GPS NMEA-183 driver in **HARDWARE** and set the server settings you read off the screen of the app in the device connection settings:

FIGURE 2. *Configuring the GPS Driver in HYPACK®*



4. **Test the device** and see if the data is coming in:

FIGURE 3. *Testing the Device*

If this works you are ready to go.

5. **Start Survey and enjoy!** Just don't use this as your normal survey setup; the GPS in your phone will never replace your proper GPS receiver! The accuracy of your Phone GPS is probably only 5-10 meters (or 15-39 feet), so **DO NOT USE IT** for a proper survey! However, if you want to play around with GPS and you do not have the possibility to setup a proper GPS, this is a nice little tool.

Try it yourself and let me know what you think!

GPS NMEA-0183	
HDOP	0.9
Number of Satellites	8
Mode	Stand-alone
WGS84 Latitude	54°21.0007 N
WGS84 Longitude	010°07.5928 E
WGS84 Height	80.90 m
Lat	54°21.0007 N
Lon	010°07.5928 E
Ell Height	80.90 m
Easting	573222.23
Northing	6023050.30
Sigma N	0.00
Sigma E	0.00
Sigma Z	0.00
A= WGS84 height	80.90 m
H= Z offset	0.00 m
D= Draft	0.00 m
K-N= Ellipsoid Ht above CD	N/A
Heave	0.00 m
Tide Corr	-0.00 m
Time source	computer
Corr age	0
Heading	N/A