## How to run and change the Smartphone-App for the Avakai:

- 1.) Install Evothings Desktop-Software from <a href="http://evothings.com/download/">http://evothings.com/download/</a>
  - choose your operating system, download the corresponding .zip-file
  - unpack the file in a folder of your choice
  - you installed the EvothingsWorkbench done!
- 2.) Download and install the "Evothings Client" on your smartphone
  - either from GooglePlay (Android) or the Apple AppStore (iOS)
  - you can also download from this page <a href="http://evothings.com/download/">http://evothings.com/download/</a>
- 3.) Start the EvothingsWorkbench on your Desktop by clicking the "EvothingsWorkbench.exe" (or whatever corresponds to your operating system)
- 4.) Now open the folder with your AvakaiApp (at the moment "AvakaiApp\_02") and drag the file "index.html" into the window of the EvothingsWorkbench, were you can already see the other examples.
- 5.) Open the "Evothings Client" app on your smartphone.
  - There, click "Scan for workbench"
  - Your Desktop-PC should show up, click "Touch here to connect to:"
  - Your Smartphone is now connected to the workbench on your Desktop.
- 6.) Now your can instantly try the AvakaiApp by clicking the "RUN" button on your Desktop-PC. It starts on the Smartphone!
- 7.) To change the code, click the "CODE" button, an explorer window opens.
  - Now you can edit the "index.html" file with whatever editor your prefer.
  - As soon as you save changes, the app on the smartphone instantly reloads!
- 8.) Some tips
  - The code is divided in two parts: On top is the html code which defines the UI of the app. On the bottom is the javascript part for implementing more complicated functionalities and the communication with the Avakai.
  - The javascript part handles 8 bytes of data sent by the Avakai continously. It also sends 1 byte of data to the Avakai, to tell him to change the RGB-color.
  - The current version of the App ("AvakaiApp\_02") works with the Arduino-Sketch "Avakai 02".

## Native apps without Evothings Client:

To build native apps for Android and iOS, a lot of stuff needs to be installed: <a href="http://evothings.com/doc/build/build-overview.html">http://evothings.com/doc/build/build-overview.html</a>

Once installed, you can build apps, that don't need the EvothingsWorkbench and run on the smartphone just like a normal app.

For building an android app, I just installed everything as described in the link above and only added 4 plugins:

com.evothings.ble (most important!)

- org.apache.cordova.console (probably needed?)
- org.apache.cordova.device (probably needed?)
- org.megster.cordova.rfduino (probably not needed, but sounded good :-))

The build environment I used is found in the github repository at "AvakaiApp\_02-cordova-environment".

## Only had one PROBLEM with that:

The app works fine, but it won't prompt you to activate bluetooth if it's deactivated, instead it just gives you an error message if bluetooth is off. When launched inside the Evothings environment, it does prompt you to activate bluetooth! I couldn't figure out, why.