Assignment one

The purpose of this assignment is to discover all hardware peculiarities of the Raspberry Pi Sense Hat board. Therefore, you have to give a description of all interfaces available on the Raspberry Pi Sense Hat board (like the I^{2}C-bus), the sensors and actuators available on the Raspberry Pi Sense Hat board.

Next to this description, you have to describe (in detail) the working (behaviour) of all these hardware components. Data sheets have to be added in an appendix.

The Sense Hat contains an AtTiny, of which you have to reverse-engineer its source code. The purpose is to discover the protocol with which the hardware behind the AtTiny is controlled by the AtTiny.

Note, that the AtTiny is just a gateway to pass information from the ARM processor to the peripherals.