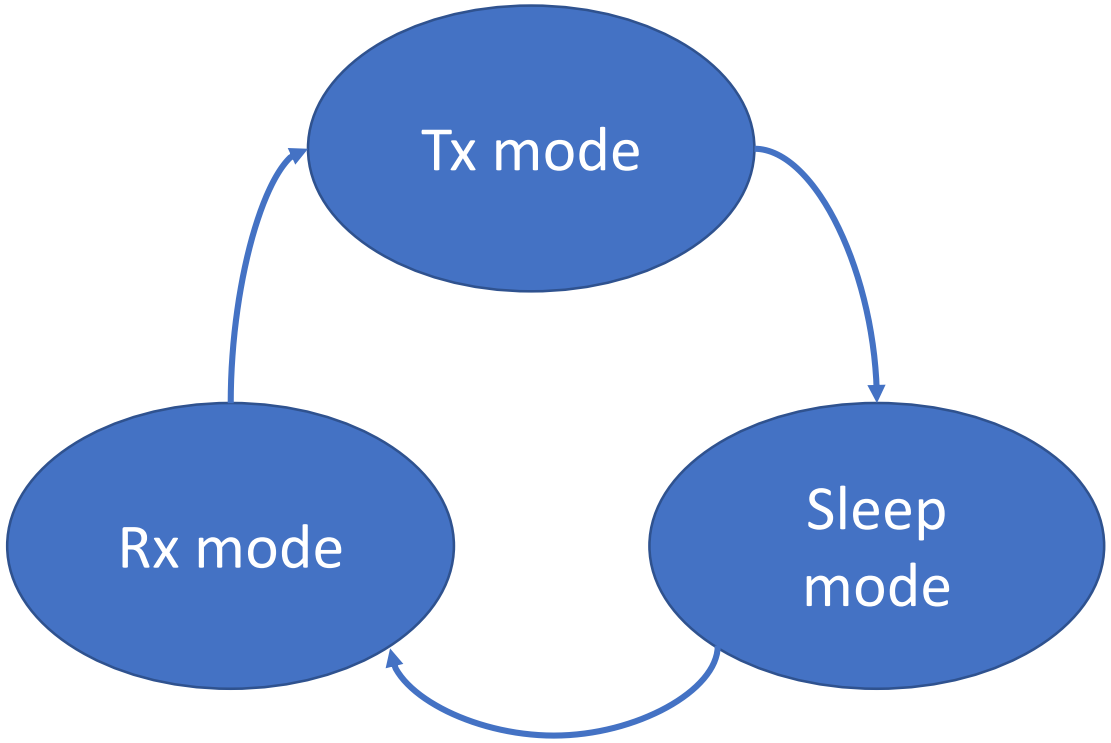
Power consumption Lab

F. Ferrero

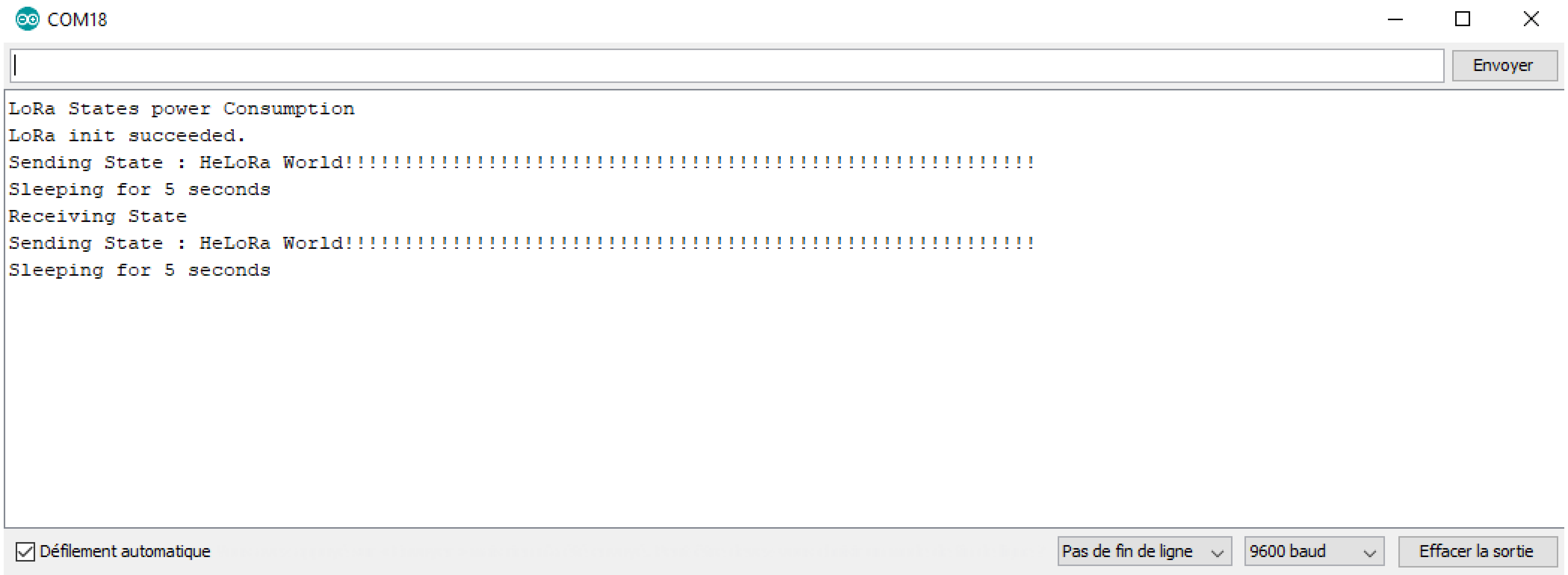
Power consumption Lab

- Download the code Lora_test_States.ino in UCA_Board/Arduino_Code/LoRa_PHY/
- Upload the code in the board



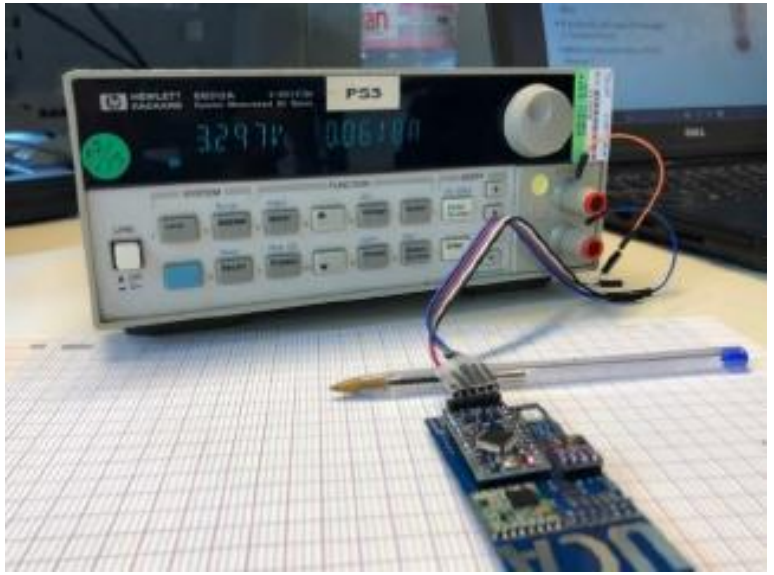
Power consumption Lab

- The code set 3 differents states :
  - Transmission mode (the Tx power can be tuned from 2 to 20dBm)
  - Sleep mode
  - Reception mode



Power consumption Lab

- You can use a 66312A DC source to measure the power consumption in the 3 different modes with 3.3V
- Try to power the Arduino on Vcc Pin and Raw Pin.
- The Raw pin used a regulator and can be powered from 4 to 9 V.



Power consumption Lab

- If we use a AA lithium battery with a capacity of 2.6 A.h
- For transmit, a SF9 and 14 dBm
- A transmit will take 200ms and 1 Tx each hours.
- What is the autonomy of the device ?