

Nextion 4.3 Arduino Uno Tutorial

I wrote this tutorial in order to group some useful pieces of information for using and programming the Arduino connected to the Nextion 43.

This piece of software is used as a tutorial demo to show the exchange between the Nextion 4.3 and the Arduino :

- use the SoftwareSerial in order not to interfere with the TX(1) and RX (0) used by the Arduino USB. It does not need to disconnect the Nextion 4.3 during programming.
- drive the Arduino LED on and off, by a touch
- Switch from screen page 0 to screen page 1, by a touch
- Switch from page 1 to page 0 with a hidden button "F1CJN" on the screen,
- Write a text on the screen, by a touch,
- Show an incrementing counter state on the screen.

First of all you will need this hardware:

- a Nextion 4.3 TFT HMI,
- an Arduino Uno with its USB cable,
- a micro SD card (8 Go is enough) and a microSD to USB adapter or microSD to SSD adapter



and this piece of software:

- The Nextion Editor (if you modify the project)

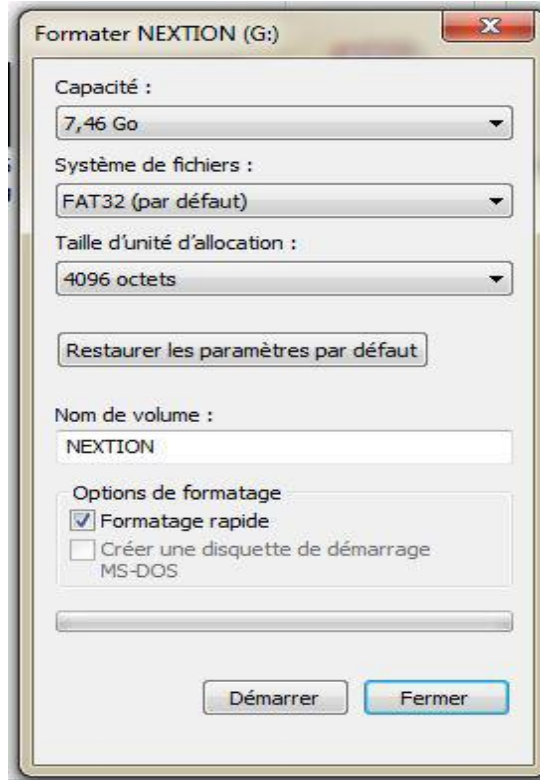
at <http://itead.qiniudn.com/nextion-setup.exe>

0 Connect the Hardware

Nextion 43	to	Arduino
GND black	to	GND
+5V red	to	5V
RX yellow	to	11
TX blue	to	10

Do not connect now the USB

1 Format the micro SD card with fat32 format



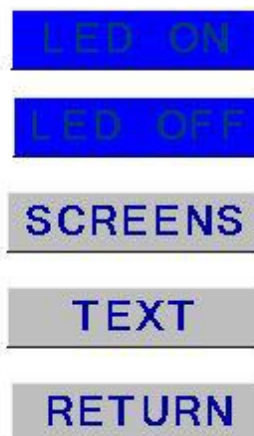
2 Transfert the NexMireTuto.tft file to the microSD card

3 Put the microSd card into the Nextion 4.3 and then connect the Arduino USB

The Nextion is then powered on and load the NexMireTuto.tft file into its E2PROM memory.

Disconnect the USB and release the microSD card

Reconnect the USB, you must see this image on the LCD screen



Now press the Nextion Editor icon “compile”, then the icon “Debug”.

Some fonctions used only by the Nextion software are already activated. For exemple you can switch between the two pages if you touch “RETURN” on page 0, and the left button on page 1. You can also touch “F1CJN” or “COMPTEUR” to return from screen 1.



4 Open the Arduino program named NextMireTuto.ino, compile it and upload it into the Arduino.

All the functions are now active so you can test all the buttons from page0
Enjoy, modify and test your own routines.

Alain