PEBBLE - Picaxe Electronic Bread Board Layout Emulator

Pebble is a free, open-source tool developed by the PICAXE community for graphical representation of breadboard layouts. The latest version (3.1e) can be downloaded from https://picaxe.com/software/third-party/pebble/

For more information, there's also a PEBBLE Forum at:
https://picaxeforum.co.uk/threads/pebble-picaxe-electronic-bread-board-layout-emulator.12629/

Fritzing

Fritzing is open-source Electronic Design Automation software with a low entry barrier, suited for the needs of makers and hobbyists. It offers a unique real-life "breadboard" view, and a parts library with many commonly used high-level components. Fritzing makes it very easy to communicate about circuits, as well as to turn them into PCB layouts ready for production. It is particularly popular among Arduino and Raspberry Pi users, and is widely used in education and creative tinkering. It was developed at the Potsdam University of Applied Sciences.

For the latest (0.9.4 – *not* free) version go to https://fritzing.org/download/
Instructions for how to get version 0.9.4 for free, by building your copy from the open-source code available on GitHub, are available here: https://siytek.com/build-fritzing/
For the previous (0.9.3b -- free) version, go to https://eduengteam.com/2020/04/download-fritzing-free-software.html. It's perfectly capable of doing all we'll require.

Whichever version you get, I recommend installing it in a folder called C:\Fritzing when you extract it from the zip file. Extraction will take several minutes; it's big.

It's then easy to create a shortcut on your desktop.

Tutorials:
Fritzing – a Tutorial: https://www.instructables.com/Fritzing-A-Tutorial/
Fritzing – An Introduction: https://www.youtube.com/watch?v=Hxhd4HKrWpg (2:08)
Fritzing Tutorial - A Beginners Guide to Making Circuit & Wiring Diagrams: https://www.youtube.com/watch?reload=9&v=-saXw1EipX0 (21:30)
CMPE370: Fritzing Schematics: https://www.youtube.com/watch?v=c1uAhhjbbhU (15:45)
CMPE370: Fritzing PCB Design Part 1:   https://www.youtube.com/watch?v=3UF-x4K8qnw (20:23)
CMPE370: Fritzing PCB Design Part 2: https://www.youtube.com/watch?v=fY99A9zZD54 (8:50)