MAKING A USB FOOTPEDAL FOR
EXPRESS SCRIBE*

The schematics here are for converting a Dell L100, RT7D50 or SK-8115 keyboard, all of which look like this: one:

To see a video on converting a keyboard into a foot pedal enter: "google reader: hacking a usb footpedal" into YouTube.

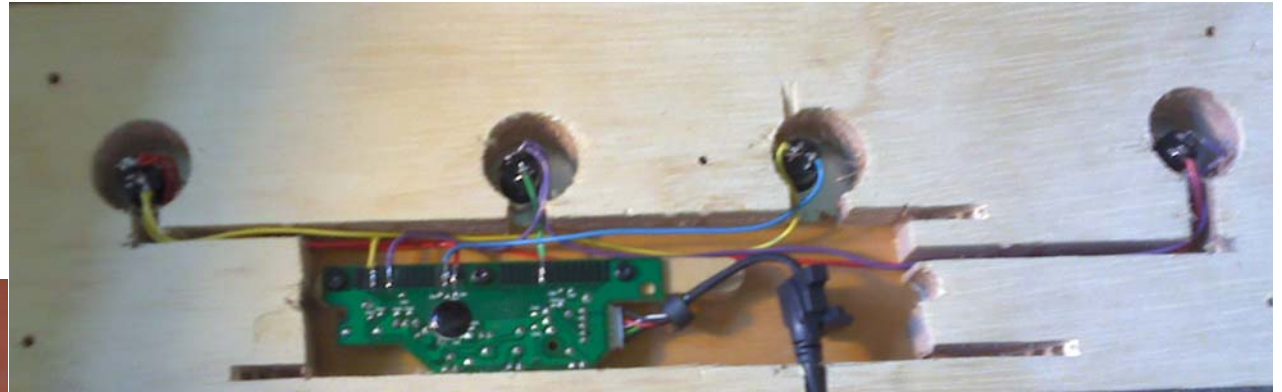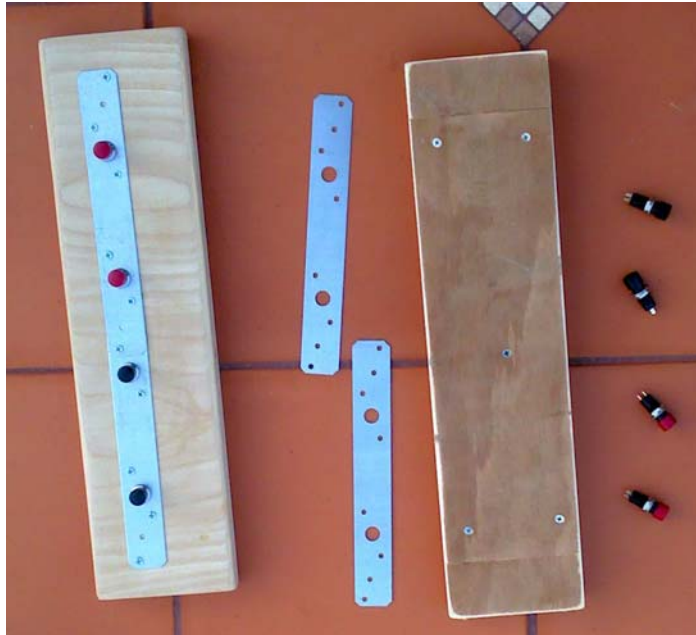That video is for making a 1 button pedal.

For Express Scribe you need a three or four button pedal depending on whether you want to include Fast Forward. URL for the video is below...

I have found two different circuit boards inside L100 keyboards. I have mapped out 4 button boards for both. Mapped 2x2 button pedals for just the first one I encountered....

For how to do a pedal for F4 see below

http://www.youtube.com/watch?v=a3NxQ60E72k&feature=pyv&ad=7646328588&kw=USB%20pedal

MAKING the PEDAL

Here's an easy, cheap way to make the pedal:

I use scrap ¾ or 1" plywood drilled and with a space cut for the controller. I glue a 1/8" piece of plywood to the top, & screw a 1/8 piece of plywood to the bottom as a cover. I glue 2-3 popsicle sticks to the top to make a platform to screw the controller to. It would be easier to just glue it into place with hotmelt glue, but that would make it harder to replace if it goes bad at any point.
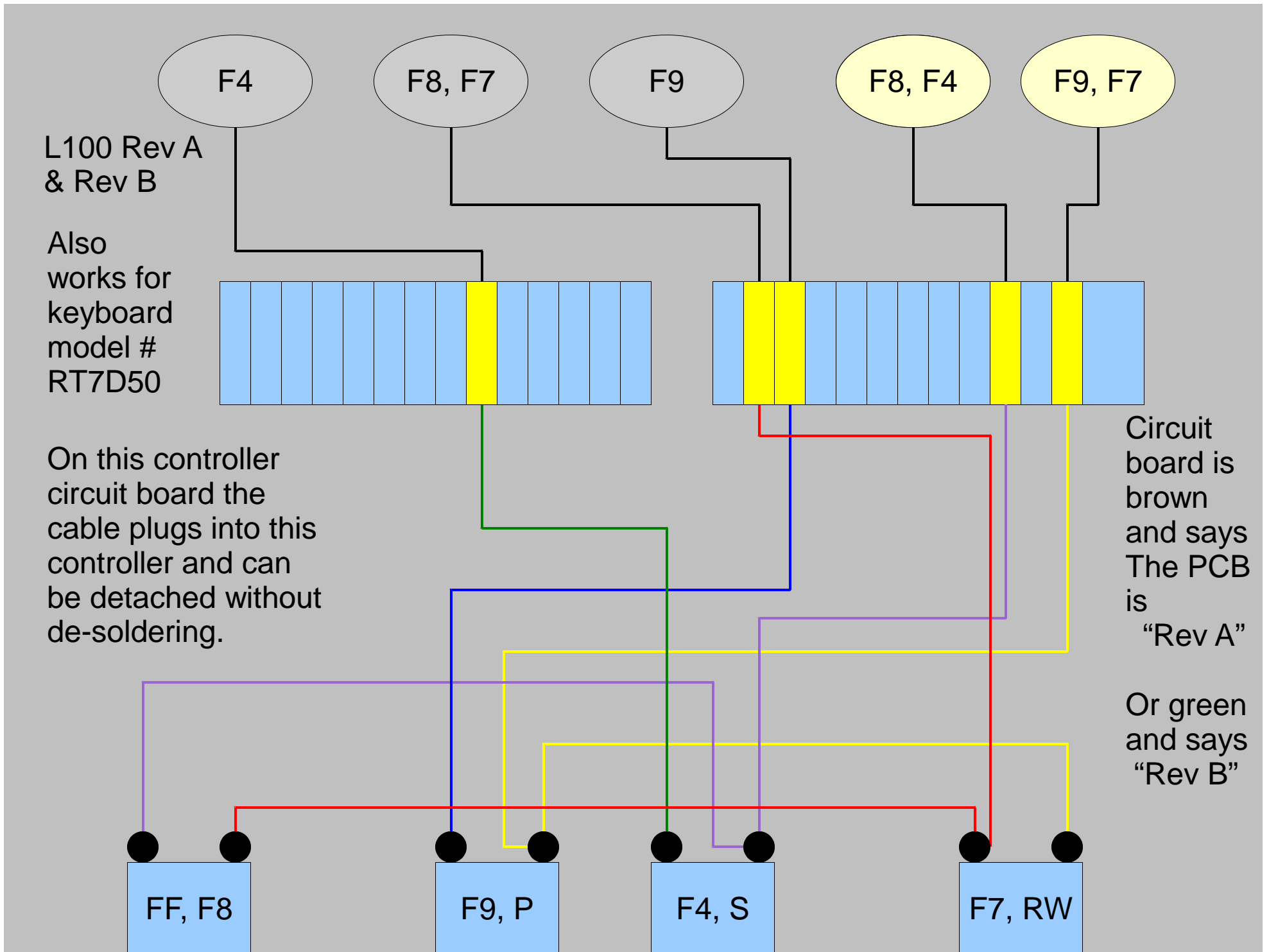
Switches are Radioshack model 275-609, but any SPST (normally on) momentary switch will do. I have seen cheap ones on ebay that will work.
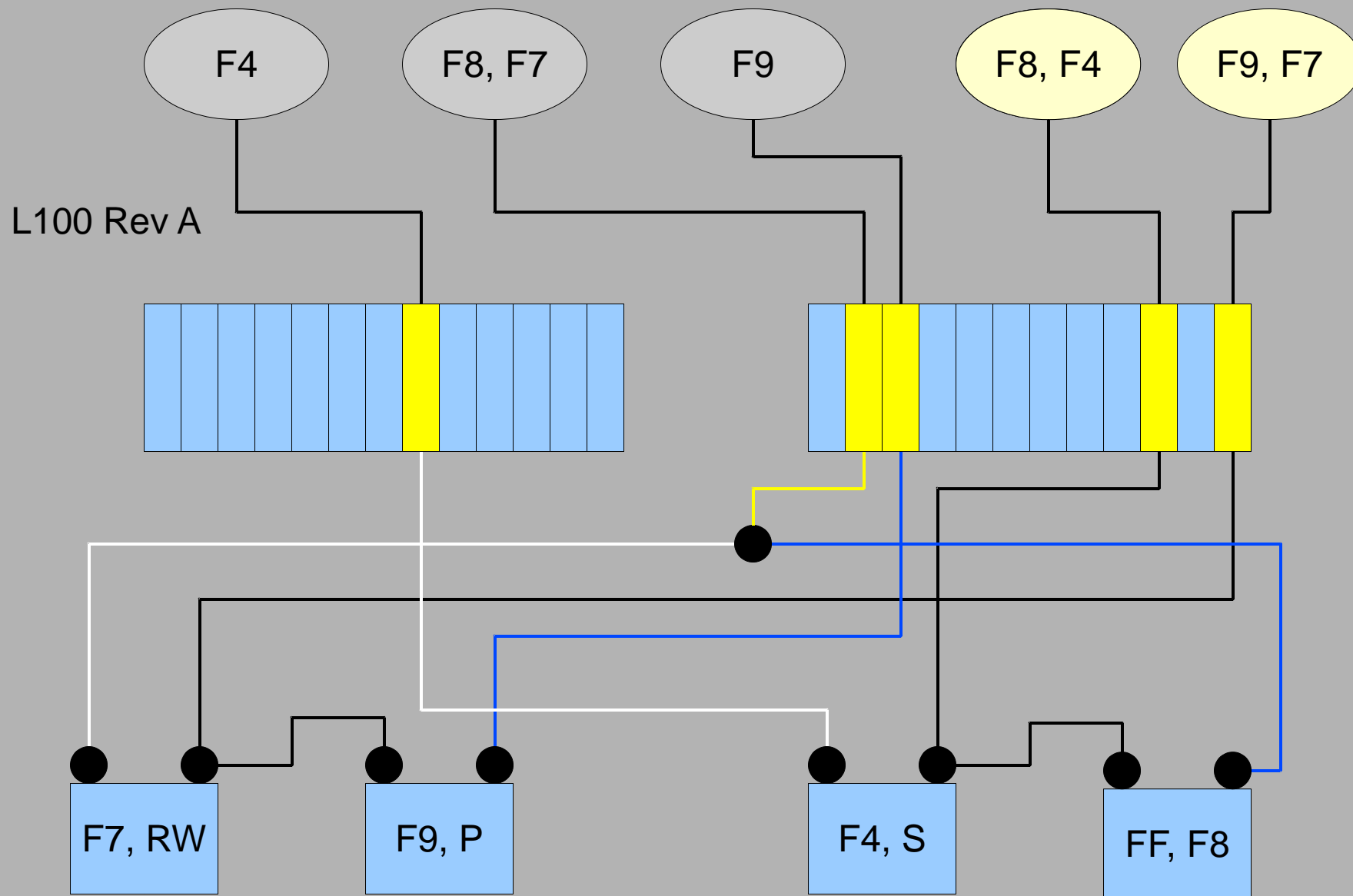
The metal piece is something I found at Home Depot for under $1. The holes are perfect for these switches, and add stiffness so that a heavy stomp won't push the switch through the flimsy 1/8" plywood. It's a 9" "Simpson strong-tie" Model LSTA9 (Home Depots SKU #333431)

There are other ways to make a pedal, but this is the easiest I have thought of.

The Finished Product

L100 Rev A & Rev B

Also works for keyboard model # RT7D50

On this controller circuit board the cable plugs into this controller and can be detached without de-soldering.

F4

F8, F7

F9

F8, F4

F9, F7

Circuit board is brown and says The PCB is "Rev A"

Or green and says "Rev B"

FF, F8

F9, P

F4, S

F7, RW

L100 Rev A

F4   F8, F7   F9   F8, F4   F9, F7

F7, RW   F9, P   F4, S   FF, F8

Alternate L100 setup for use with two Sony dictation pedals. To make this work with Express Scribe you need to go to options-controller-hotkeys. Reverse Play and Stop (make P=F4, S=F9...or any other combination you like. I had two Sony pedals (see below) and briefly considered doing something like this. I later just turned them into two-button F4 pedals, which is a better idea, I think.
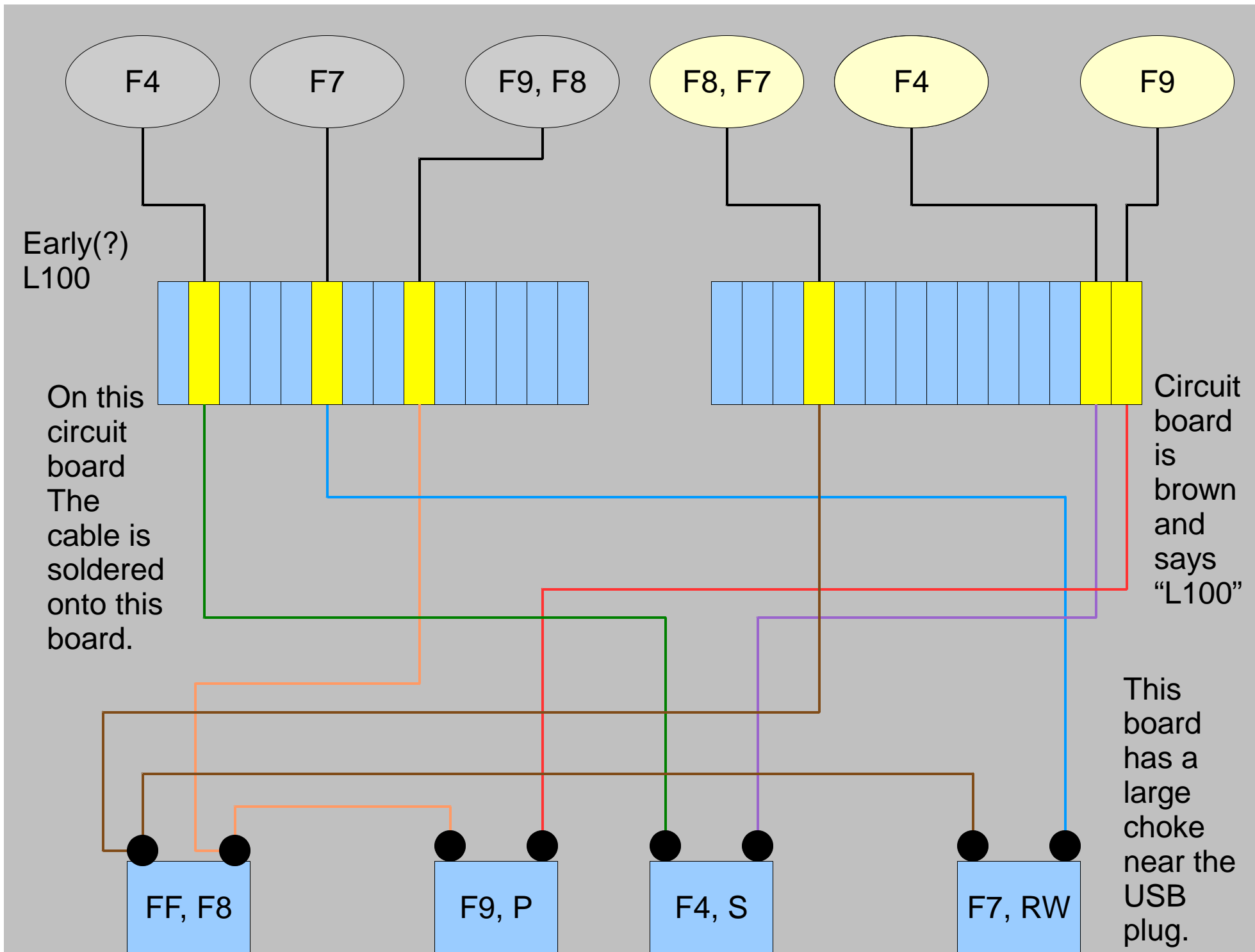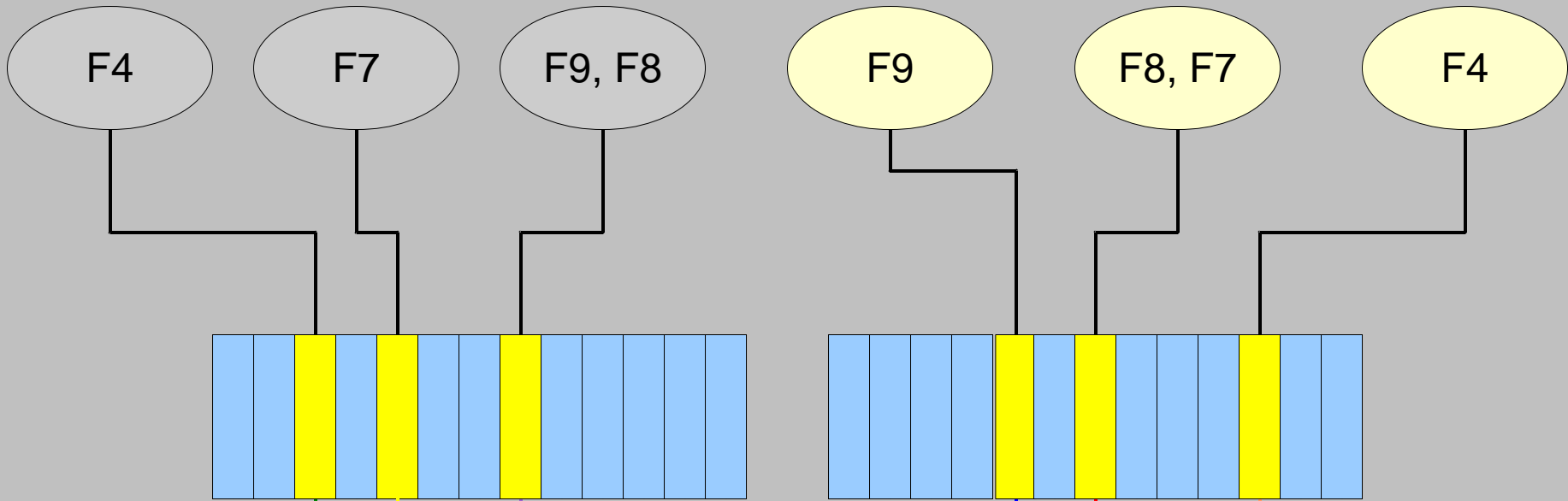
This board is clearly marked SK-8115, soldered connector. No choke.
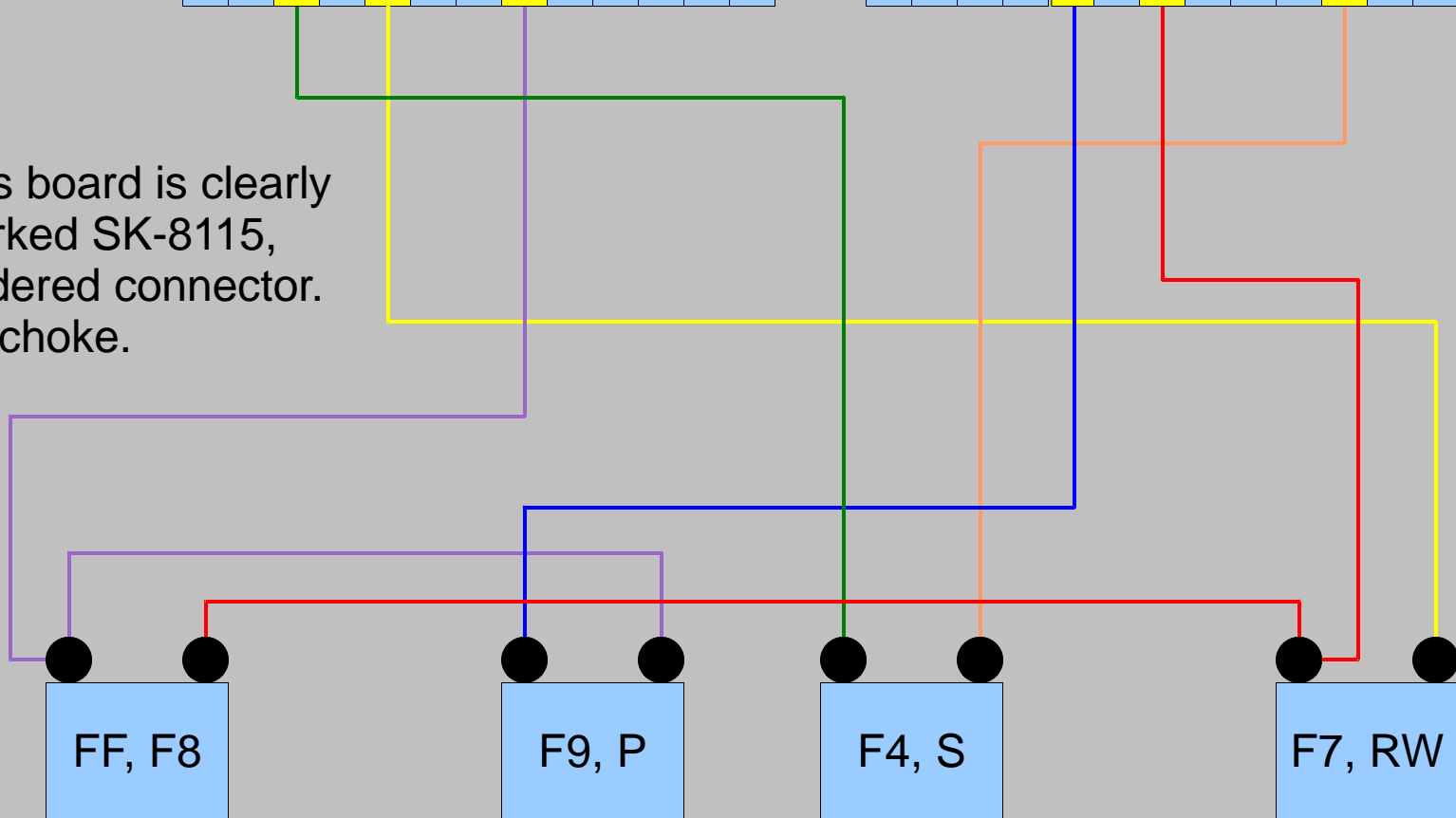
MAKING A USB FOOTPEDAL FOR F4

Since ExpressScribe pedals have an F4 and an F8 key, you can modify the schematics to make an two-button F4 pedal by eliminating the F7 and F9 keys.

This is a particularly good approach if you have a pedal with two buttons that you want to modify.

I have successfully modified a couple of these old Sony FS-80 pedals. If you use an RT7D50 keyboard controller, you don't even need to open up the pedal, since you can use it's cable.
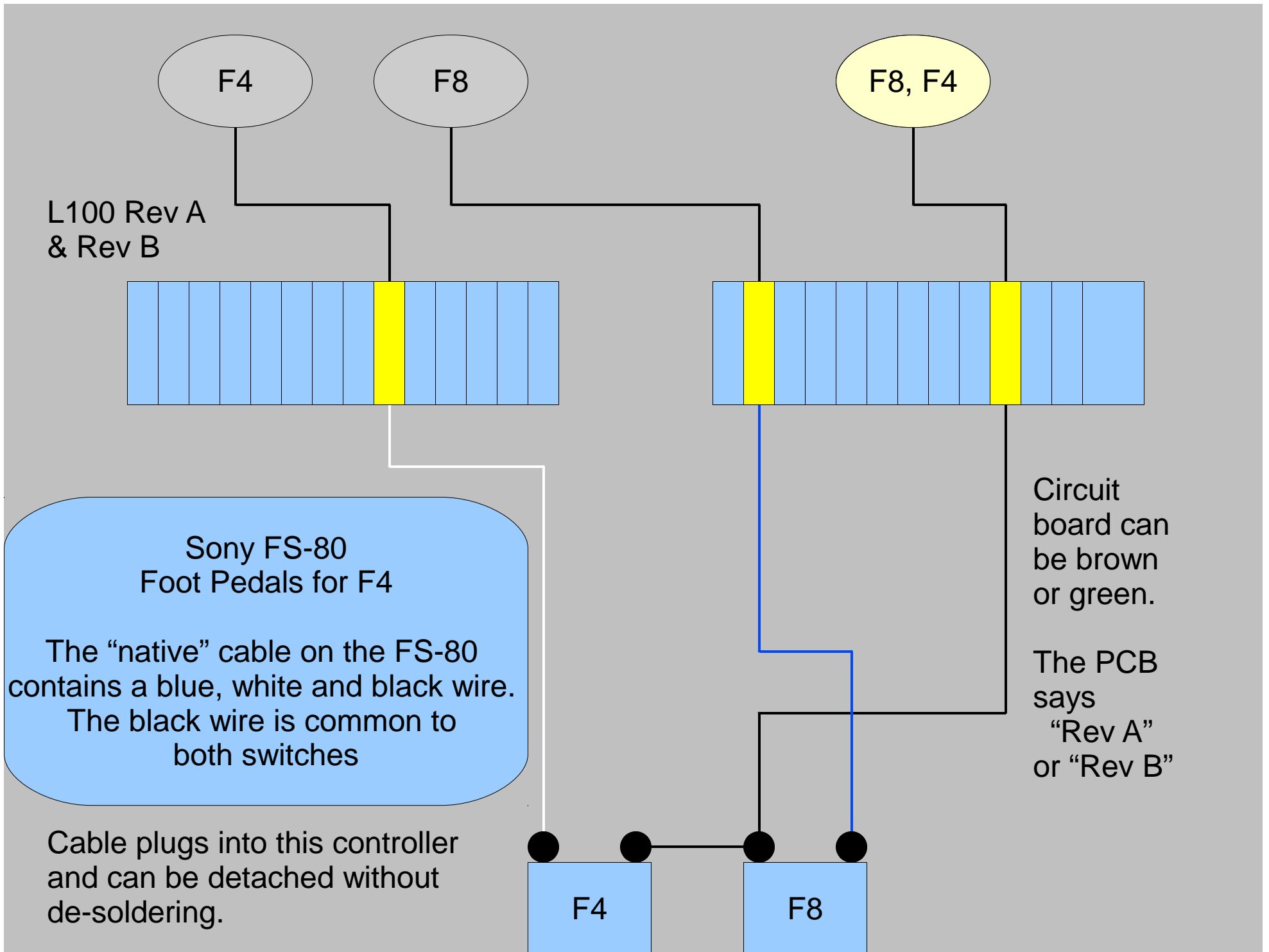
I have mapped this out for a couple of keyboard controllers but really only recommend doing it with a n RT7D50 or similar.
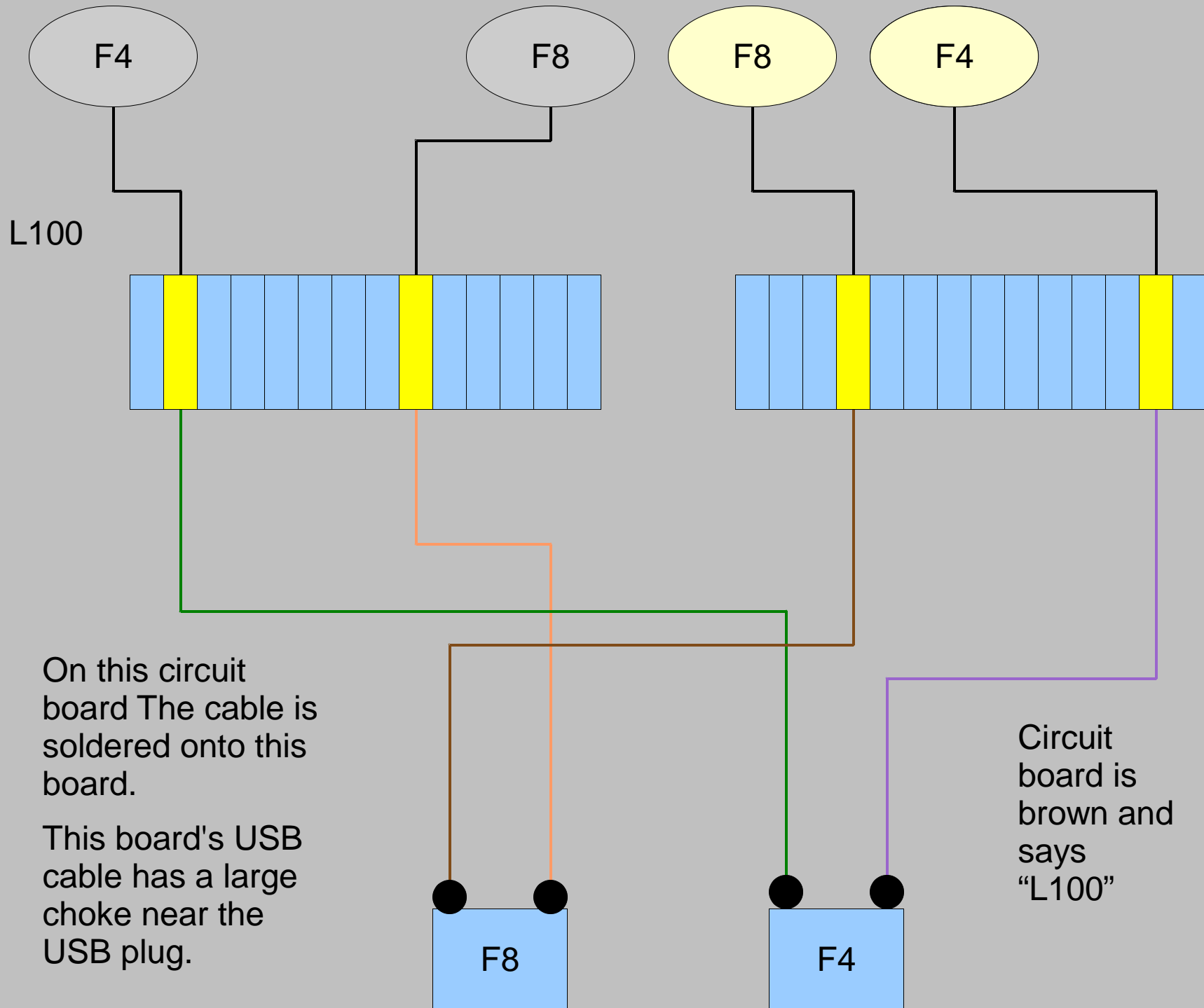

I recommend not opening the box if you don't have to. There are little springs that will jump out, and it can be a bit of a pain to put it back together.

Most of these pedals are like the Sony pedal above. Inside there are two buttons, leading to a cable. If you cut the cable there will be three wires. There's a white wire to the left switch, a blue wire to the right switch and a black (ground) wire to both. If you have one of these, I strongly recommend getting an RT7D50 keyboard, since the F4 and F8 keys have a common wire on that model. RT7D50s are cheap on ebay (under $5), and will allows you to use the Sony's native cable without opening the pedal. You'll need to put the controller in a separate box. I used a cheap plastic electrial box and lid from Home depot. Colors of the wires will vary, but most two-button pedals will work similarly.

Of course, another option is to just make the ExpressScribe pedal, and just use only the F4 and F8 keys, but that's more work if you only want to use F4 with it.

http://www.youtube.com/watch?v=a3NxQ60E72k&feature=pyv&ad=7646328588&kw=USB%20pedal

F4

F8

F8, F4

L100 Rev A
& Rev B

Sony FS-80
Foot Pedals for F4

The "native" cable on the FS-80
contains a blue, white and black wire.
The black wire is common to
both switches

Cable plugs into this controller
and can be detached without
de-soldering.

Circuit
board can
be brown
or green.

The PCB
says
 "Rev A"
or "Rev B"

F4

F8

F4

F8

F8

F4

L100

On this circuit board The cable is soldered onto this board.

This board's USB cable has a large choke near the USB plug.

F8

F4

Circuit board is brown and says "L100"