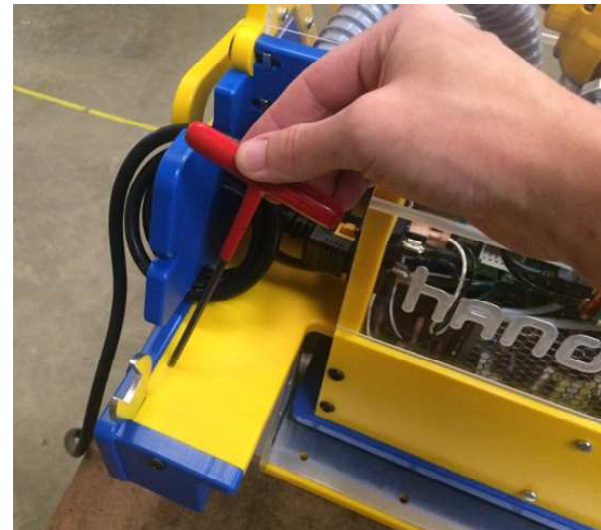# handibot®
smart power tool

Swapping Router Output

1 The Handibot is interface board is capable of running two independent routers. So, in effect, there is a backup channel for router control if the original is damaged. This guide will show you how to switch your router over to the backup channel.

2 For safety, switch off the power to your Handibot and **UNPLUG** before touching any electronics!

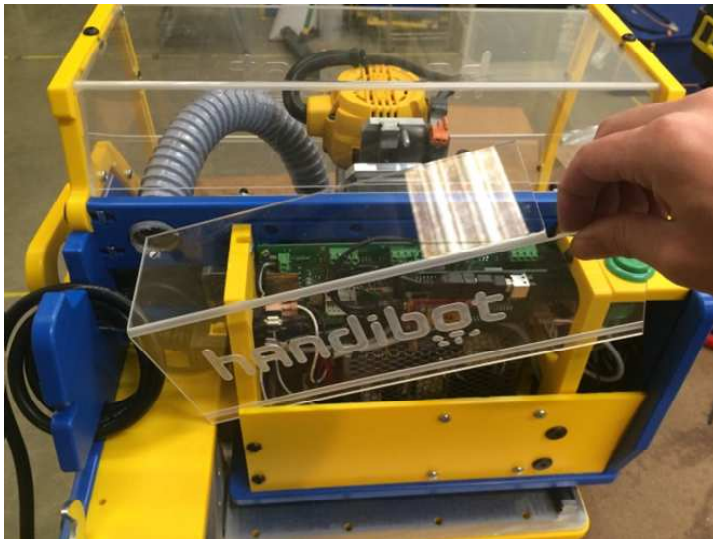**3** Grab your trusty 4mm wrench from the back of the tool.

4 Remove the button head screw from the left, top side of the clear electronics enclosure.
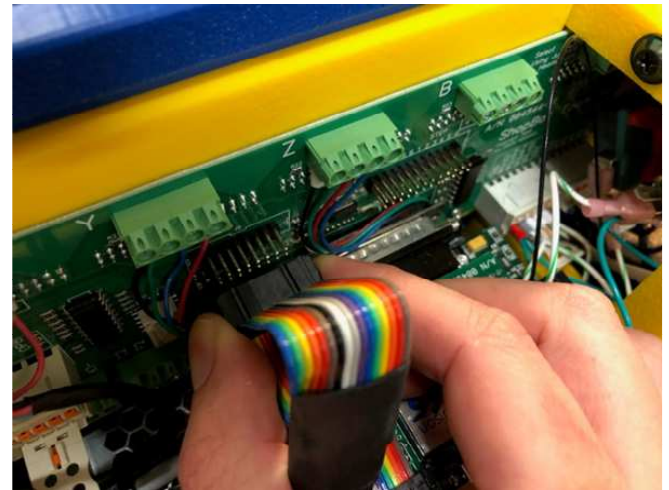

5 Slide the electronics enclosure to the left.

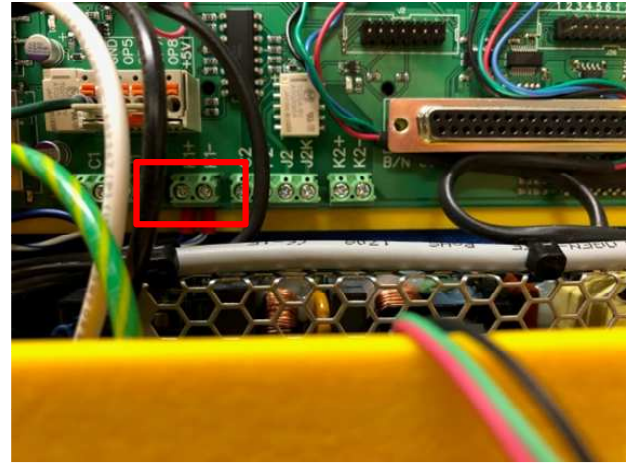**6** Pull the electronics enclosure away from the tool.

7 To get access to the spindle control terminals we'll need to temporarily remove the control card. Start by unplugging the ribbon cable.
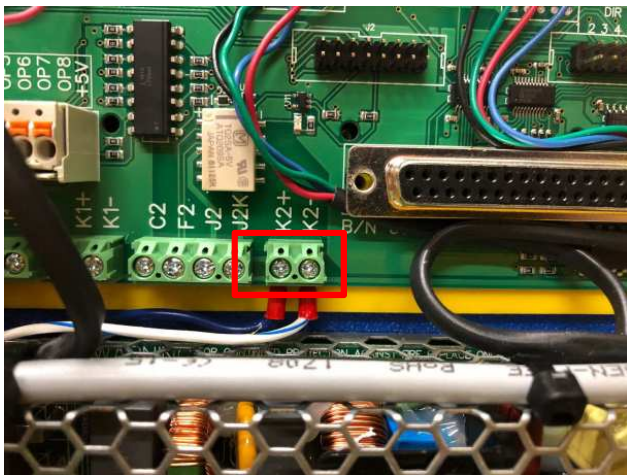
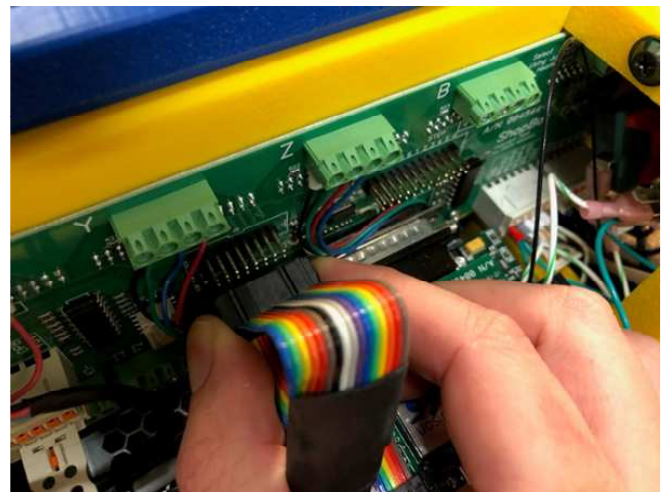**8** Next, unplug the FabMo card and let it rest against the side of the tool.

9 Below and to the left of the FabMo card connector, you'll see a row of terminals. Two of them, labeled K1+ and K1- will have a solid blue and a blue striped wire plugged into them.
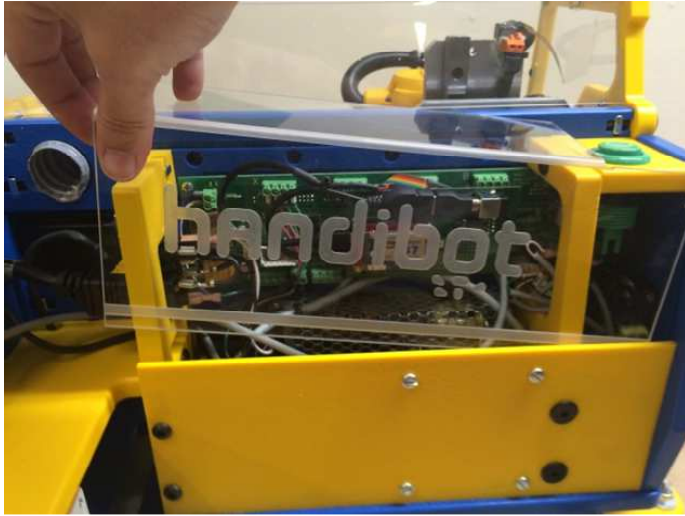

10 You'll need to move these over to K2+ (solid blue) and K2- (striped blue). It is a tight area in the control box…so I set of needle-nose pliers helps.

11 Now replace the FabMo card and reconnect the ribbon cable.
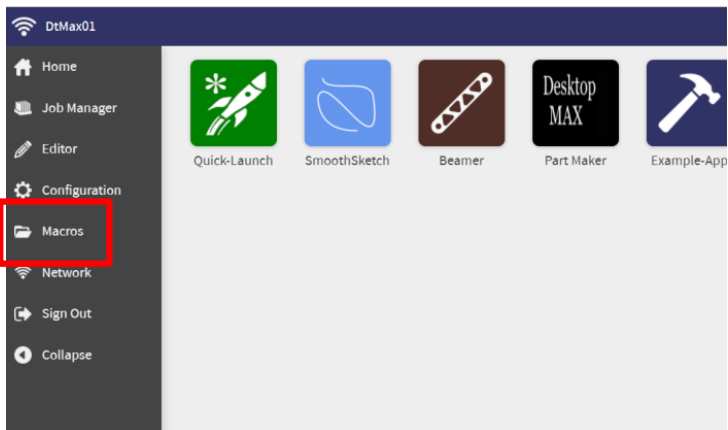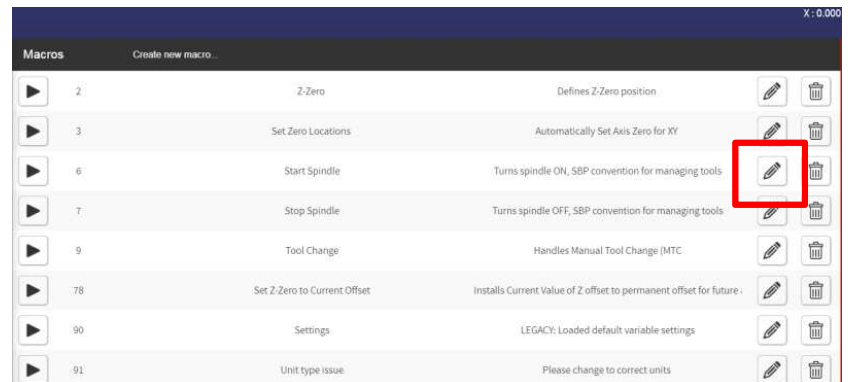
12 Replace electronics cover.

13 Secure cover in place using red handled hex key.

14 To complete the swap, we'll need to edit the two macros that control Spindle-ON and Spindle-OFF. Open the macros menu from your FabMo dashboard.

15 The two macros we'll need to edit are #6 and #7. Click the pencil icon next to Macro 6 to open the editor.

16 In Macro #6 you will need to change the first command "SO,1,1" to read "SO,2,1"


```
Editor                    Macro ▼
1  ' Name: Start Spindle
2  ' Description: Turns spindle
3
4  SO, 1, 1              ' Make OU
5  PAUSE .1              ' ... opt
6
7
```

```
Editor                    Macro ▼
1  ' Name: Start Spindle
2  ' Description: Turns spindle
3
4  SO, 2, 1              ' Make (
5  PAUSE .1              ' ... o
6
```

17 When you've made the edit, choose "Save and Close" from the Macro pulldown menu.


```
Editor            Macro ▼    Execute ▼
1  ' Name: Start Sp
2  ' Description: T    Save         BP convention for
3
4  SO, 2, 1                         #1 ACTIVE (high)
5  PAUSE .1            Save and Close    ... optional pause for spinup,
6
7
```

18 Do the same thing for Macro #7, changing "SO,1,0" to "SO,2,0". Save and close the macro.


```
Editor                  Macro ▼
1  ' Name: Stop Spindle
2  ' Description: Turns spindle
3
4  SO, 1, 0              ' Make OU
5
6
```

```
Editor                       Mac
1  ' Name: Stop Spindle
2  ' Description: Turns s
3
4  SO, 2, 0                    '
5
6  |
```

19 To test that everything works, drive the Z axis to the top of its travel and press the orange "0" button next to the Z position readout to "home" the Z high above your material. Choose a job from your tool's history and run the job to ensure that the router turns on as expected.