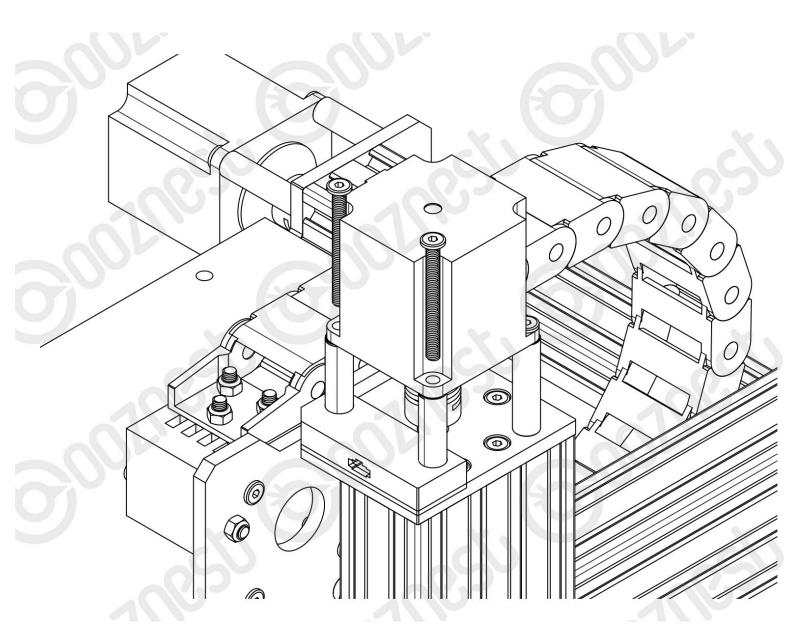


Setup the Ooznest XYZ Touch Probe

This guide will walk you through the relevant steps required to instal the Ooznest XYZ Touch Probe.

Written By: Ryan Christy



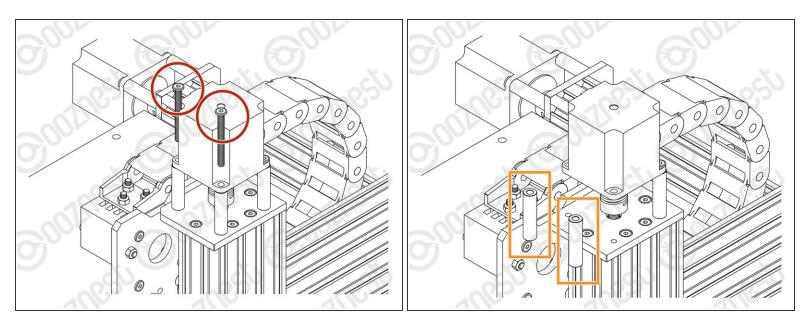
Setup the Ooznest XYZ Touch Probe

INTRODUCTION

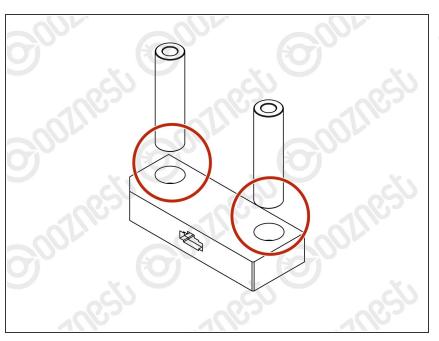
This guide will walk you through the relevant steps required to install the Ooznest XYZ Touch Probe.

Hint! You can use the Left and Right arrow keys on your keyboard to navigate through the steps.

Step 1 — Removing existing Hardware



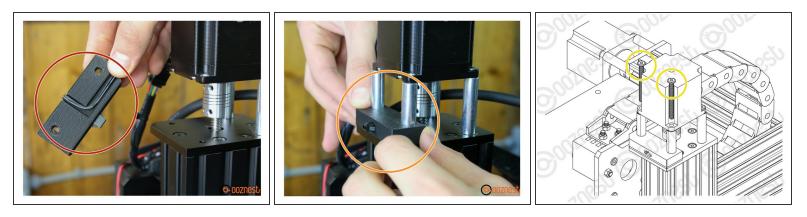
- (i) This step requires removal of existing parts located on the Z Axis Motor Assembly.
- Remove the two Left-Hand Stepper Motor M5 Low Profile Bolts, if Looking at the WorkBee from the front.
- With the two M5 Low Profile Bolts removed slide out the two 40mm Aluminium Spacers pictured.



Step 2 — Preparing Components

- The installation of the XYZ Touch probe requires the Touch Probe Mount on the Touch-Probe-Wire and two 35mm Aluminium Spacers.
 - Do not remove the Wire from the Touch Probe Mount this has been pre-assembled.
- Insert the two 35mm Aluminium
 Spacers into the Touch Probe Mount part pushing them in until they can move no further.

Step 3 — Assembling Components



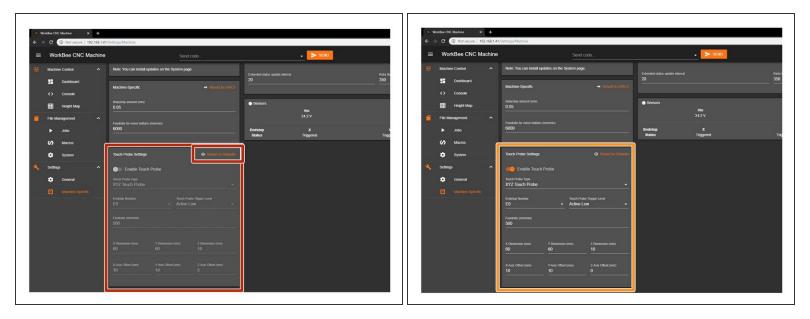
- Tuck the wire underneath the Touch Probe Mount like image 1.
- Place the Touch Probe Mount with the 35mm Aluminium Spacers under the stepper motor like image 2.
- Using the existing M5 Low Profile Bolts secure the motor into place making sure the Bolts pass through the 35mm Spacers and the Touch Probe Mount.

Step 4 — Cable Routing



- Route the Touch-Probe-Wire through the Drag Chain, you can pop off the clips of the Drag Chain using a flat head Screw Driver bringing the wire through the back of the Duet Mount.
- Plug the Touch-Probe-Wire into the E0 Terminal on the Duet Controller.
- Use cable ties to join the Touch Probe Wire onto the Z Stepper Motor cable.

Step 5 — Update Firmware & Touch Probe Settings



(i) Update your WorkBee CNC Machine to the latest Firmware version: WorkBee Firmware Releases

- Enable Touch Probe & Restore Defaults, this will automatically match the settings for the Ooznest XYZ Touch Probe.
- If using your own Probe Define the relevant settings.

Step 6 — Testing your Probe



A Plug your Touch Probe into the Touch Probe Mount Connector.

- Before using the probe, it is good practice to test the clip against the Probe to ensure correct installation.
 - Attach the Touch Probe Clip to an Endmill which is not in the Router like image 2.
 - Go to Dashboard > Under Touch Probe Control Panel > Press Z under Probe Individual Axis.
 Confirm the on screen prompt. Wait for the Machine to move the Z Axis Down and then engage the Endmill with the probe. Once engaged the Z Axis should stop moving.

∧ If it doesn't stop please use the Emergency Stop.

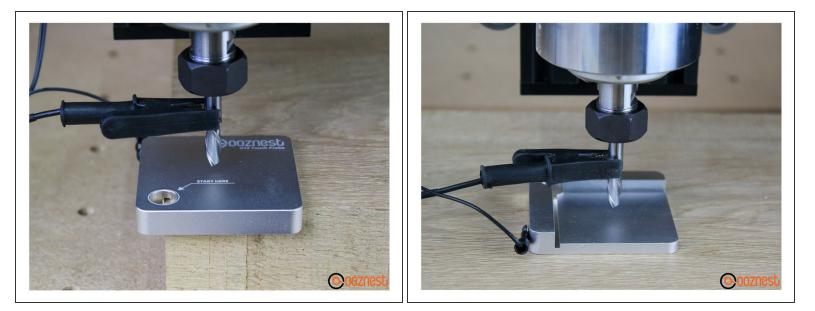
- If the Z-Axis changes direction once the endmill has engaged then the Touch Probe is operating correctly.
- (i) If the Probe does not work please check your wiring and the Touch Probe settings.

Step 7 — Probing Your First Corner.



- Locate your Touch Probe over the corner of the material, jog your machine until it is within the 'START HERE' Hole, roughly level with the surface of the Touch Probe. Connect your Endmill using the Clip.
- Select the Work Coordinate you would like to probe in.
- Select the Corner you want to probe in the Touch Probe Control Panel.
- Define the Endmill Diameter in the Touch Probe Control Panel.
- Press Probe Corner to begin probing your first corner.
- Wait until the Probe Successful confirmation.
- Unclip Probe and click Go to work XYZ Zero. Your Endmill should be perfectly aligned with the corner of your material.
- Now the Probe can be detached from the Touch Probe Mount and stored safely.

Step 8 — Probing Z Axis



- (i) If you want to Probe just your Z Axis please follow this step.
- Reconnect your Touch Probe and Endmill with the Clip.
- Depending on the Touch Probes orientation jog the machine over the Probe within 5mm of the Probes surface.
- Under Dashboard > Touch Probe Control Panel press Probe Individual Axis Z to begin probing the Z Axis.
- Wait until the Probe Successful confirmation.
- The Probe can now be removed.

Thanks for following the guide. Any issues, please contact us!