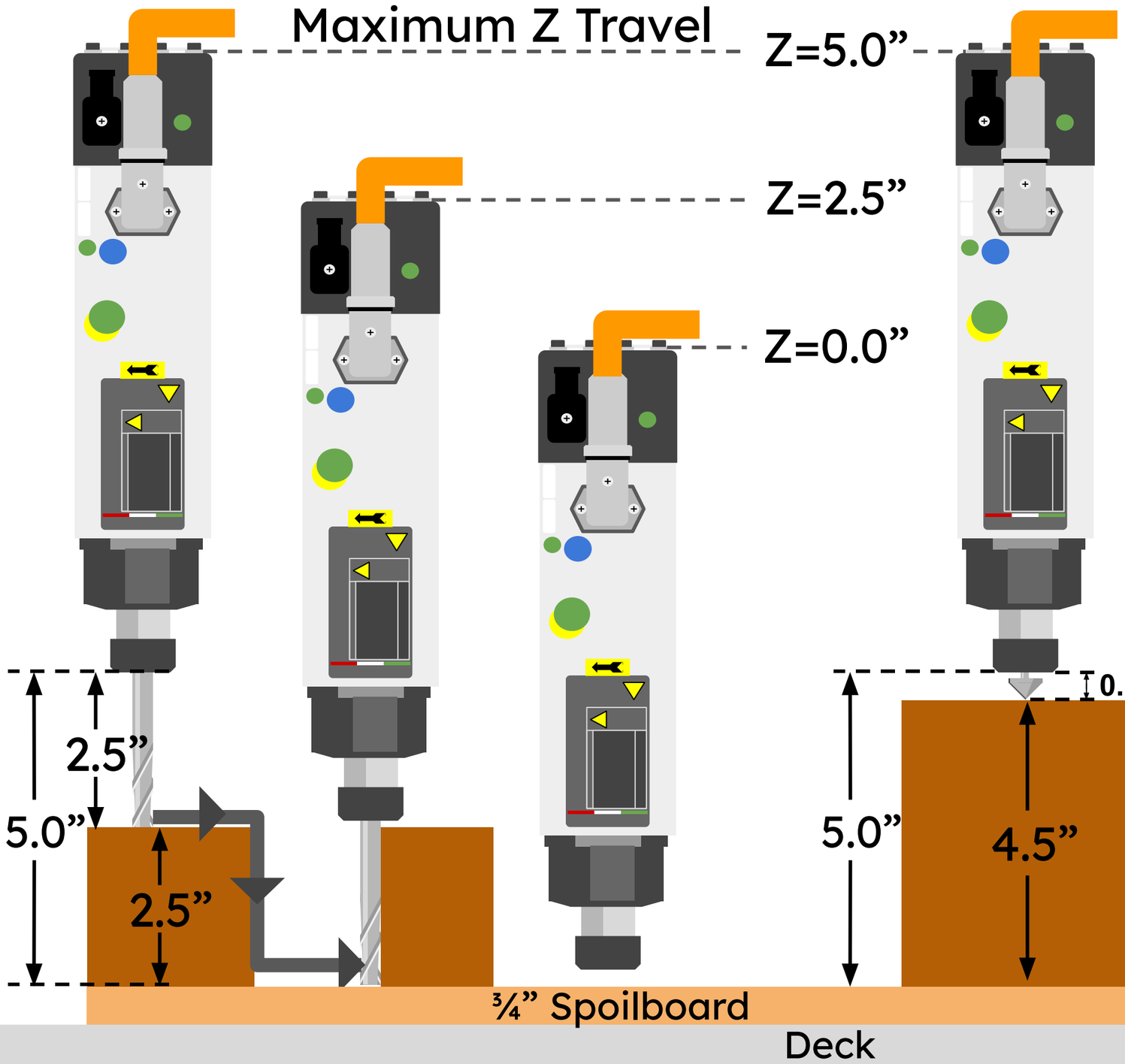
Desktop/MAX Aluminum T-Slot Deck

vs.

Desktop/MAX Lower Deck

This document will illustrate the differences in maximum bit length, material thickness and cut depth between the standard aluminum t-slot deck option for Desktop and Desktop MAX tools compared to the “Lower Deck” option where the t-slot decking is mounted to the underside of the tool frame. The thickness of the material you’re able to cut with each option will depend on the type of cut you’re trying to achieve and the style of bit that you’ve chosen for the cut.

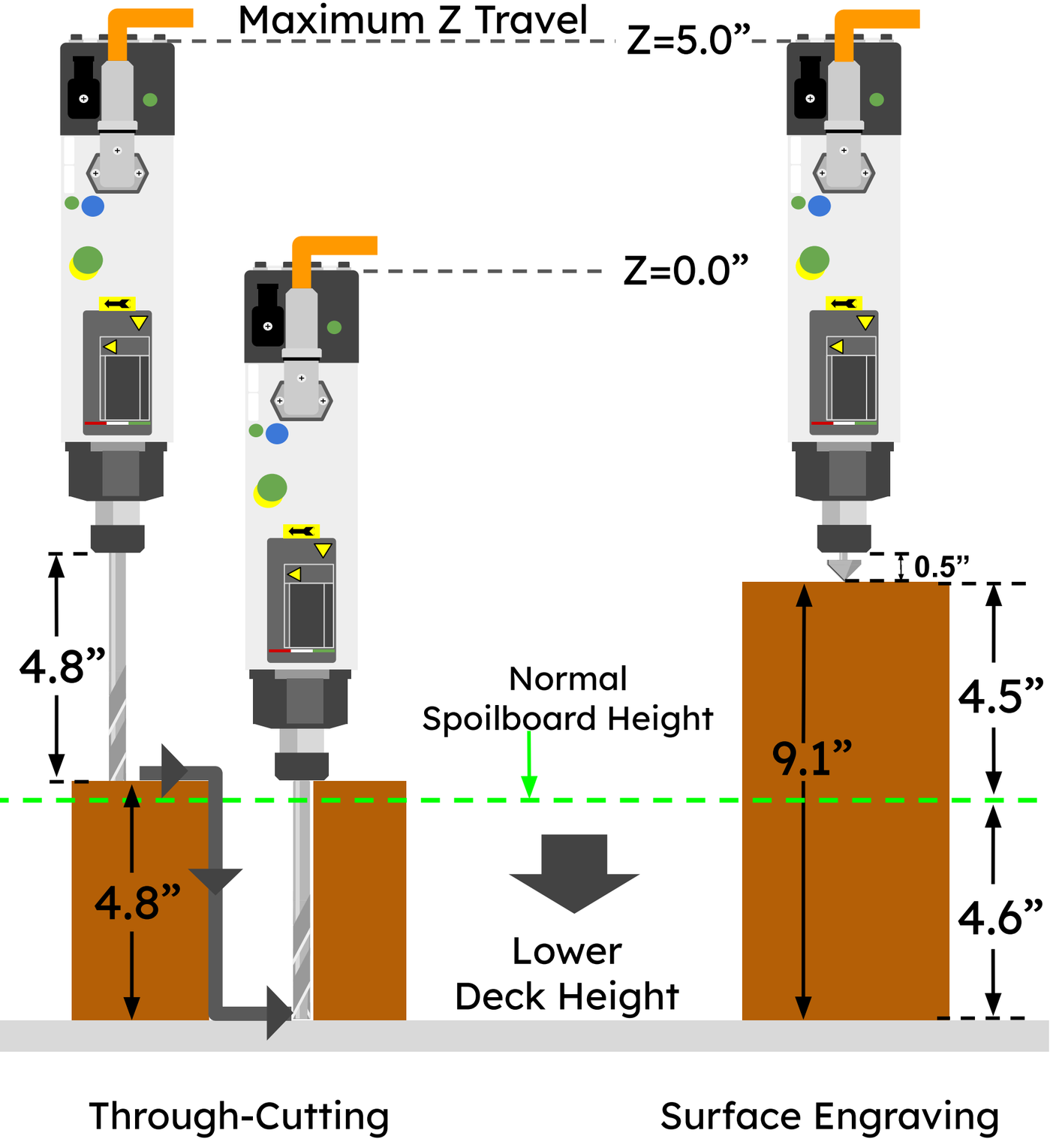


Desktop, MAX and MAX ATC Z Axis Travel

The Desktop, Desktop MAX and MAX ATC machines from ShopBot each have 5 inches of Z Axis travel. What this means for your cuts depends on what kind of cutting you plan to do.

For through cuts, you’ll need to leave enough space to get your longer bit above your material in order to start your cut, limiting you to a maximum thickness of 2.5” for through cuts.

For surface engraving, you don’t need a long bit to cut deep into your material. This means you can engrave on much thicker material, up to 4.5” thick (using a .5” bit) with the T-Slot Aluminum Deck or Vacuum Deck Options.



Lower Deck Option

Adding a “Lower Deck” to your Desktop, MAX or MAX ATC allows for even thicker material to be cut by dropping the aluminum deck 4.6” below the level of the normal Spoilboard or Vacuum Deck.

In this configuration, you’ll be able to cut all the way through material up to 4.8” thick with a bit of the appropriate length.

For surface engraving, material up to 9.1” thick (using a .5” bit) can be fit below the cutter!

Note: In this scenario there is ***no*** spoilboard on the lower deck. If you add a spoilboard to the lower deck, reduce the thickness of material for engraving by the thickness of the spoilboard, and reduce the thickness of material for through-cutting by half the thickness of the spoilboard, and increase the length of bit by the same amount.