### FP FREEPOWER

Stone Fabrication

Summary of Steps02Step 1: Inspection & Slab Layout03Step 2: Fabrication of Stone04Step 3: CNC Charging Pocket05Step 4: Confirm Dimensions06Step 5: Countertop Bracket07

Stone Fabrication

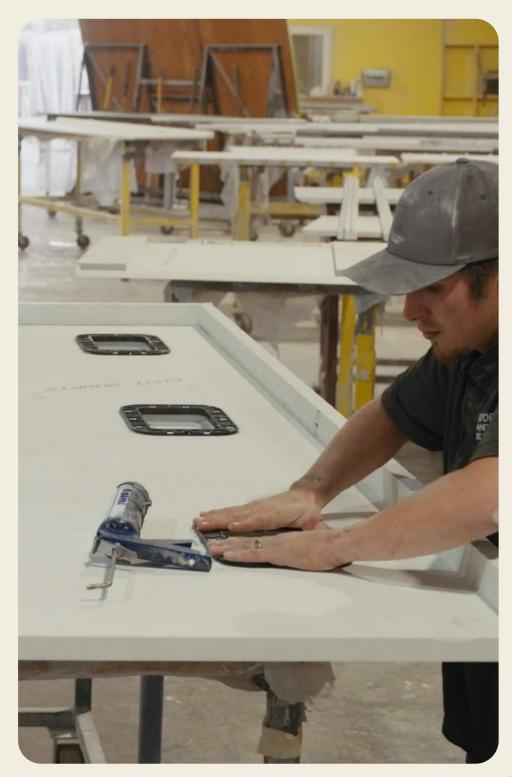
## Summary of Fabrication Steps

- (01) Inspection & slab layout
- **Pabrication of stone**
- **O**3 CNC charging pocket
- **0**4) Confirm critical pocket dimensions

A Note: Do not remove stone from CNC and complete job until pocket dimensions are verified.

**05** Apply countertop bracket

Fabricating with FreePower follows the standard process for stone moving through your shop, there are just a few added steps.



# Inspection & Slab Layout

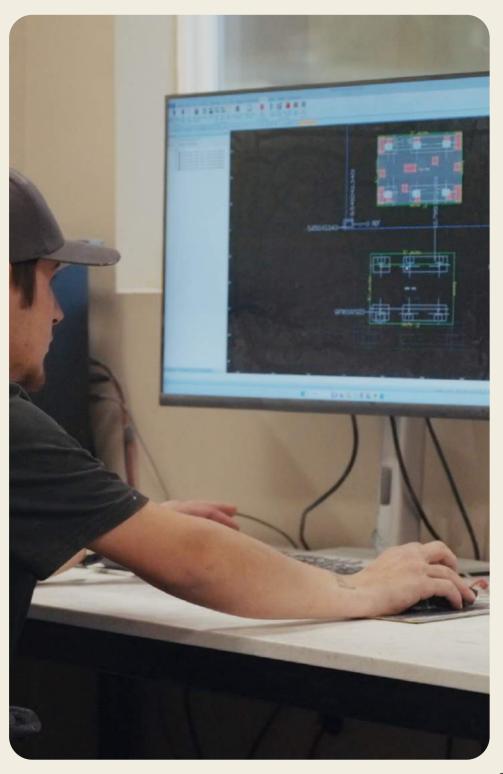
#### **Placement of FreePower chargers**

- Map out the location of the wireless charging zones based on *Charging Halo Placement Guidelines*
- Follow the same measurement and documentation procedures used to cut out a sink
- Confirm set backs, X & Y coordinates of charging zones, and complete your shop drawings

#### Confirm translucency of stone

During inspection, always manually confirm the translucency of the stone. Even if the stone is in our *Translucency Database*, stone consistency may vary based on a number of factors.

**A** Note: Stone translucency varies, and you should always confirm with a flashlight before any permanent fabrication step.



## Fabrication of Stone



Cut down stone to size

#### Prepare edge details

#### CNC

- Optional: Back gauge the surface for gauranteed stone thickness.
- Route edge detail as needed
- Route charging pockets see next page for more details
- Route sink holes after charging pockets

A Note: Always route charging pockets before sink holes to to avoid weakening stone.



## Charging Pocket Routing

### Requirements for zeroing out the routing bit

- Zero out for each new slab
- Zero out if a single slab has more than 3 pockets

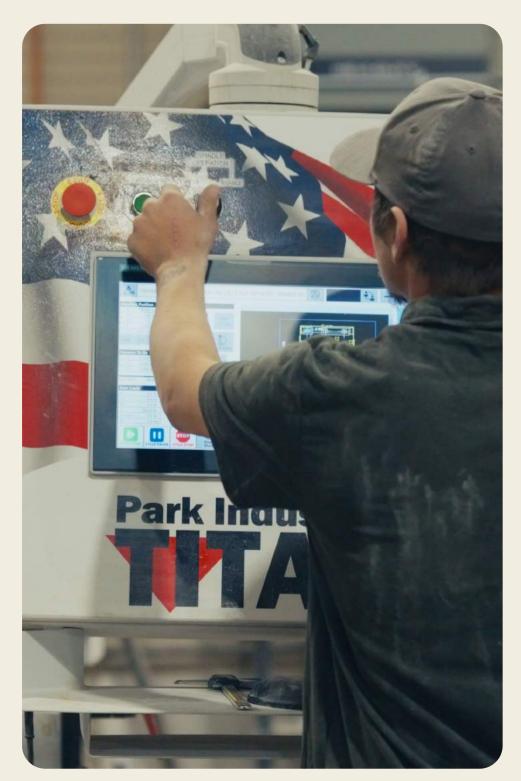
#### **Programming your CNC**

- (e1) Program position of charging pockets The center line and set back radius are based on your measurements
- (02) Zero out routing bit Measure z height of routing bit and update tool data
- (03) Upload DXF DXF file provides CNC with X / Y dimensions and corner radiuses
- (04) Configure routing tool style

How many tools will be used:	Enter Number
RPMs:	4250
Feed rate:	120 IPM
Incremental drop:	1/16"
Tool direction:	Inside to outside

(05) Run simulation, confirm placement of pockets, & then let it run

A Note: CNC setup and programming is the most critical step of the fabrication process. It must be handled with precision to ensure exact dimensions.



## Confirm Critical Dimensions

Do not remove stone from CNC bed and complete job until critical dimensions are verified.



#### Pocket X & Y: 242mm x 143mm (+/- 2mm)

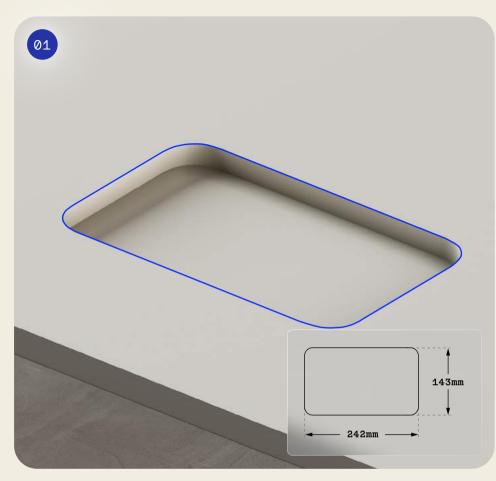
If the *Pocket X & Y* tolerances are not maintained, the *Charging Halos* may not align on the surface, and the mounting system may not be compatible.



#### Pocket Z Height: 5mm (+1mm, -0.5mm)

The *Pocket Z Height* makes up the most critical FreePower tolerance. For charge performance, visibility of the *Charging Halo*, and other safety related issues, the *Pocket Z Height* must fall precisely within the specified dimension.

A Note: The *Charging Pocket* must be milled with precision. Its dimensions are critical and if outside of the specified tolerance, it will void the FreePower warranty and the product will not operate as designed.





## Apply Countertop Bracket



02

#### **Connect Glue Protection Device**

Connect the *Glue Protection Device* to the *Countertop Bracket* before placing any silicone or glue.

#### Apply silicone or glue

Glue (or silicone) should be applied to the *Countertop Bracket* in between any of the mounting holes to avoid interference.

🔺 Note: You must use silicone or glue rated for an undermount sink .

#### 03

#### **Orient brackets left**

The brackets have a screw hole on one side only, you must ensure it is always facing left when looking from the front edge of the stone.

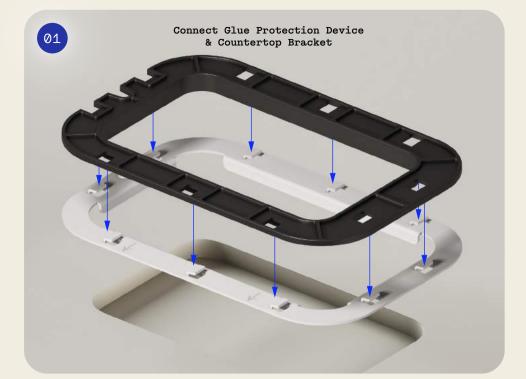
A Note: Brackets must be oriented left for the wireless charger to mount into the stone and function properly.

(04

#### Firmly press bracket into pocket

Press the brackets firmly into the pocket and leave the *Glue Protection Device* until glue has set in place.

**Allow glue to fully dry** 





www.freepower.io