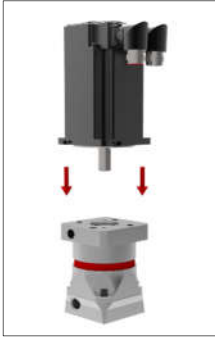


# Macron MPG Installation and Assembly Instructions



**Step 1:**  
Rotate input clamping elements until the bolts are visible through the access holes on both the input and output.



**Step 2:**  
Ensure all mounting surfaces are clean. With the motor and gearbox VERTICAL, insert the motor into the gearbox.



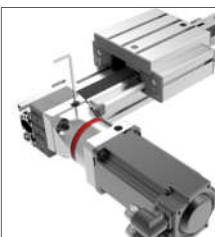
**Step 3:**  
Using the 4 bolts provided, tighten the motor to the gearbox adapter. Fully tighten the bolts as noted in [Table 1](#).



**Step 4:**  
Tighten the clamping element onto the motor shaft as noted in [Table 2](#). Finally, insert the provided plug into the access hole.



**Step 5:**  
Ensure all mounting surfaces are clean. Using the 4 bolts provided, tighten the gearbox to the actuator. Fully tighten the bolts as noted in [Table 1](#).



**Final Step:**  
Tighten the clamping element onto the actuator shaft as noted in [Table 3](#). Finally, insert the provided plug into the access hole.

**Table 1**

Bolt Size	Hex Size	Torque (in-lbs)
M4	3mm	40
M5	4mm	80
M6	5mm	130
M8	6mm	320
M10	8mm	640
M12	10mm	1100

**Table 2**

Part Number	Motor Clamping Torque (in-lbs)
MPG-062	53
MPG-014	53
MPG-064	53
MPG-084 (motor shaft diameter 19mm or less)	80
MPG-084 (motor shaft diameter greater than 19mm)	177
MPG-114	177
MPG-088 (motor shaft diameter 19mm or less)	80
MPG-088 (motor shaft diameter greater than 19mm)	177
MPG-118	177

**Table 3**

Part Number	Output Clamping Torque (in-lbs)
MPG-062	120
MPG-014	120
MPG-064	280
MPG-084	280
MPG-114	280
MPG-088	280
MPG-118	280