

EPILOG LASER 16371 Table Mountain Parkway Golden, Colorado 80403 Phone 303-215-9171 FAX 303-277-9669 www.epiloglaser.com

X Axis Motor Replacement

For the Epilog Mini / Helix - 10/26/2012

Requirements:

Tools:

• Philips Head Screw Driver

Parts:

• X Axis Motor Assembly (AS07000ATT-03-M-02)

Overview:

This procedure details steps to replacing the x-motor on the Helix. The X-motor drives the belt in the I-beam.



Procedure A: Removing the Old Motor

Step 1

Unplug the engraver from its power source

Step 2

Remove both side panels.

Quick Tip!

With the engraver powered off, you can move the I-Beam to any position on the table. Feel free to move it to a position that is easy for you to work with.



Step 3

Remove cover on I-Beam by loosening the screws on the front and rear of the beam (you do not need to remove the screws) and pulling the cover up.

Step 4

Loosen the X axis belt as follows.

- a) On the left side of the I-Beam, locate the idler pulley that the Belt wraps around. It is mounted to a sliding plate which has two screws and a spring attached.
- b) Loosen the two Philips screws that hold the sliding plate in place. (Do not remove the screws).
- c) Push the pulley to the right hand side of the engraver. The pulley should slide with the plate towards the center of the machine forcing the spring to stretch and loosening the tension on the X axis belt.
- d) While holding the pulley to the right hand side of the engraver, tighten the screw towards the rear of the engraver. This will hold the pulley in place and keep tension off of the X axis belt.



Step 4-B



Identify the Motor Assembly on the right side of the I-Beam. Locate the motor wires (red and black twisted wire with a black quick disconnect at the end) and disconnect them by unplugging the black quick disconnect which is connected to the circuit board just to the rear of the motor. Squeeze the disconnect plug between your thumb and forefinger to release the connecter from its socket.



Step 6

Identify the power connection for the Fan assembly and disconnect it from the circuit board. Squeeze the disconnect plug between your thumb and forefinger to release the connecter from its socket.





Unscrew and remove the fan assembly.



Upgrade

Available

As of <u>10/26/2012</u> an upgrade has been released for all 8000 model laser systems. If the circuit board attached to the I-Beam does not have a fan on top please contact *Epilog Tech Support* for your upgrade.



Identify and unscrew the Captive Screws which mount the motor to the I-Beam.



NOTE: The captive screws will not release from the Motor Bracket.

Step 9

Remove the motor by pulling it straight up. You may need to angle the motor slightly so that the belt falls from the drive pulley.



Procedure B: Installing the New Motor

Step 1

With your index finger, pull the belt and loop the belt around the silver pulley.



Step 2

Place the motor so that the captive screws are aligned with the mounting posts.



Tighten the captive screws to hold the motor in place.

Step 4

Replace the Fan assembly over the circuit board. Fasten in place with the provided screws.



Step 5

Connect the motor wires (red and black twisted wire with a black quick disconnect at the end) by plugging the black quick disconnect in to the circuit board just to the rear of the motor.



Connect the Fan wires by plugging the black quick disconnect in to the circuit board just to the rear of the motor.



Fan

Step 7

On the left side of the I-beam locate the Pulley which the belt wraps around. (See <u>Procedure A</u> - <u>Step 4</u>.) Loosen the Philips screw holding the pulley in place. The spring will pull the belt tight. Retighten both Philips screws to keep the belt tight as the engraver operates.



Conclusion

Check that the belt is on the center of both pulleys on the left and right sides of the machine and then proceed to replace the covers on the engraver. If you encounter any further problems please contact Epilog Tech Support at (303) 215-9171.