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### Replacing the Door Assembly on all Fusion Models

These instructions will help guide you in replacing the top door assembly on your Fusion or Fusion M2 model machine.

### **Brief Overview of Process**

It will involve remove the hinge points and disconnecting the gas shocks for the door. The removal of the old door and then the install of the new door assembly putting the gas shocks back on and hinge points.

## **Tools Needed for this proceedure**

5/32 inch Allen wrench

3/8<sup>th</sup> stubby nut driver or 3/8<sup>th</sup> inch short socket wrench.

Small flat head screw driver

Lastly this will need at least two people due to the weight and side of the door it should not be removed and replaced by just one person.

# Things to know before getting started:

It is important that the door does not fall during install of the new one or the taking out of the old one.

It is also important that the door is mounted in a way that that it closes fully and trips the interlock/safety switches.

Lastly there are two types of way that the top door may be mounted at the hinges. Either using a spring loaded lever (for older fusions) or and hinge plate (for newer fusions and M2 models).

### The Procedure for Replacing the Top Door Assembly

- 1. The first thing to do is to prepare the machine for the door replacement. So you will want to remove the upper left and upper right side panels. Each of this side panel has two 5/32 inch Allen locks, they only need to be turned 90 degrees in a counter clockwise direction. This will free the side panels so they can be easily removed. Set them off to the side for now. NOTE: Each side panel has two metal tabs at the bottom to lock the bottom of the panel in place, just be aware of these tabs when removing or replacing the panels.
- 2. With the side panels removed the next step is to identify (but not remove yet) which hinge type you have. In older machines there is a spring loaded lever where all you have to do to undo the hinge is pull out of the level until it disengages the door.
  The newer model fusions and M2 models have a metal locking plate that is bolted on with 4 3/8<sup>th</sup> inch lock nuts. To disengage this style of hinge point you have to remove the four lock nuts and pull the metal plate out of the machine.
- 3. Open the door to have it in the fully open position. This way the shock for the door will help support the weight of the door during the next steps.
- 4. The next thing that needs to be done is remove the gas shocks, Each gas shock on both ends has a small metal C shaped clip that is used to hold the end of the shocks to the ball joints. While someone holds the door up pull off the C shapes clips from the door end of the shocks. You may need a small flat head screw driver to pull the clips off.
  - NOTE: Make sure that the person holding the door is ready for the weight of the door as when the shocks are removed they will be holding near the full weight of the door up and these doors can be pretty heavy.

- 5. With those clips removed you can now pull the gas shocks off of the ball joints they are attached too. Then slowly and preferably with two people gently shut the door all the way. If this is a Fusion M2 then make sure the front door is open before shutting the top door fully. Note: set the gas shocks so they rest on the table or hang downwards.
- 6. We are now in a position to remove the door hinges.
  - A. If you have an older Fusion that has the spring loaded lever to hold the door in place then have one person on each side and pull out on the levers to disconnect the door and slide it forward a few inches and let go of the levers.
  - B. If you have a newer Fusion or a Fusion M2 and have the square bolted on hinge plates then you will need to first take a permanent marker and trace around the plates then remove the 4 3/8<sup>th</sup> inch locknuts on both the left and right hinge plate. Then pull out both hinge plate to remove them completely.
- 7. We can now remove the door from the machine. Make sure there are at least two people for this as this door is heavy and can be very heavy on dual source machines.
- 8. Once we have the old door removed then we can place the new door in place.
  - A. If this Fusion has the spring levels for the hinge point then place the new door just in front of those spring loaded hinge pins.
  - B. If this machine has the hinge plates then go ahead and place the door all the way into position. (remember the front door should still be open if this is a fusion M2 Model).
- 9. We can now reinstall the hinge pins/ plates.
  - A. If this Fusion has the spring loaded levers then go ahead and have one person on each side of the machine and pull out on the levers and then slide the door back all the way and then slowly let go of the levels.
    - Note: you may have to lift the back part of the door a small amount or slide it a small amount forward or both to get the hinge pins to go back into the new door.
  - B. If this Fusion / Fusion M2 has the hinge plates then make sure the door is lined up and best as possible with the holes the hinge plates go through. Then install the hinge plates back in place making sure they are going into the new door assembly and reinstall the 4 locknuts for both hinge plates but leave then a bit loose for the moment so they are not fully tightened down.
- 10. Now that the hinge pins/plates have been reinstalled we can now raise the door to reinstall the gas shocks. Make sure at least one person is holding the door up and then place the shocks of the ball joints, after placing a shock over the ball joint put the metal C clip back over the neck of the ball joint socket on the shock to lock into place then repeat this for the other shock.

- 11. (for machines with hinge plates only) There is slots in the hinge plates as you may have noticed during the uninstall and install of the plates. This is because there is an optimal place for these hinges. This is why we traced around them in step 6-B. So lift the door and try to get the plates in the same place they were before and then finish tightening the locknuts down all the way on both right and left hinge plates.
- 12. At this point the install/replacement of the door should be complete.

If you have any questions or concerns about this procedure then contact Epilog Technical Support by either emailing <a href="tech@epiloglaser.com">tech@epiloglaser.com</a> or calling 303.215.9171. You will need the serial number of your machine so please have this handy when calling, if contacting by email please include the serial number in the email .