

Thank you for your purchase of this jig. Read these instructions completely first, so that you understand the procedure flow. If there are items that you feel need further clarification, do not hesitate to contact me: [randy@machinegunguy.com](mailto:randy@machinegunguy.com)

These pages are for you to use in your conversion of your HK SEF select-fire trigger pack to fit semi auto receivers. ALL NFA RULES APPLY, Class II only operation (patent pending).

Tools required: Dremel/Rotozip with metal cut-off disk (3-4 discs will be used).



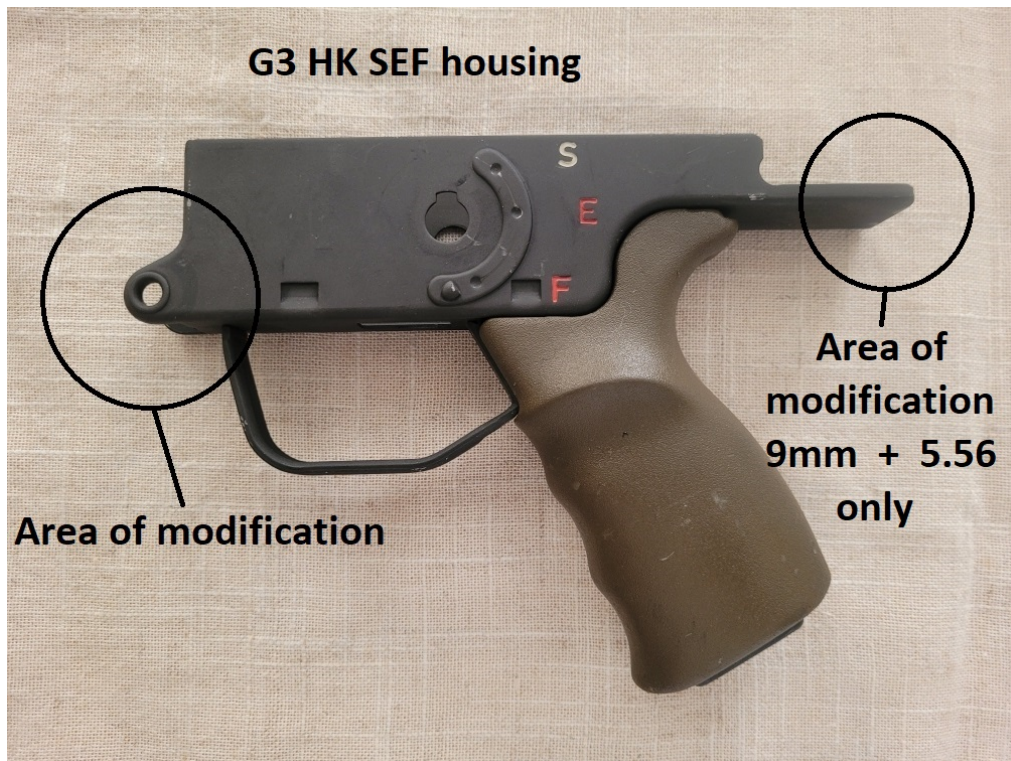
**HK G3 SEF trigger pack**

All that is required is to remove the trigger box from the lower automatic trigger pack for your model of semi rifle. G3 = HK 91, HK 33 = HK 93, MP-5 = HK 94. To accomplish this, remove the safety by turning the handle to the 12 o'clock position and pull it towards you. After the safety has been removed, lift the select-fire trigger box out of the trigger pack as in the photo below. You can leave the internal parts in place in the SEF box if you wish - they will get dusty though.





Below is a cut semi-auto G3 receiver (note the 2 holes at the rear for its buttstock). The shelf area is shown on the left within the highlighted circles area. That shelf is what the SEF box directly sets on. When the modification cut is done correctly, then it should tightly fit between the shelf and the lower flanges above the trigger pack.



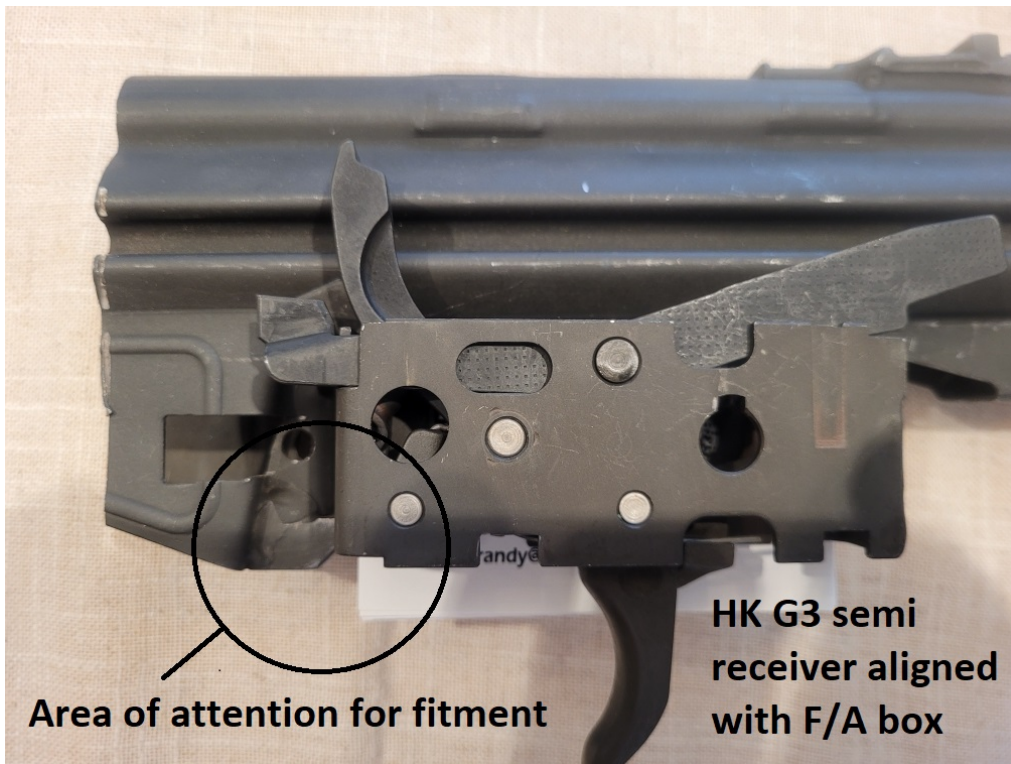
The photo above shows the areas of attention that need to be addressed. The front area is essential for all receivers.



**HK G3 cut receiver**

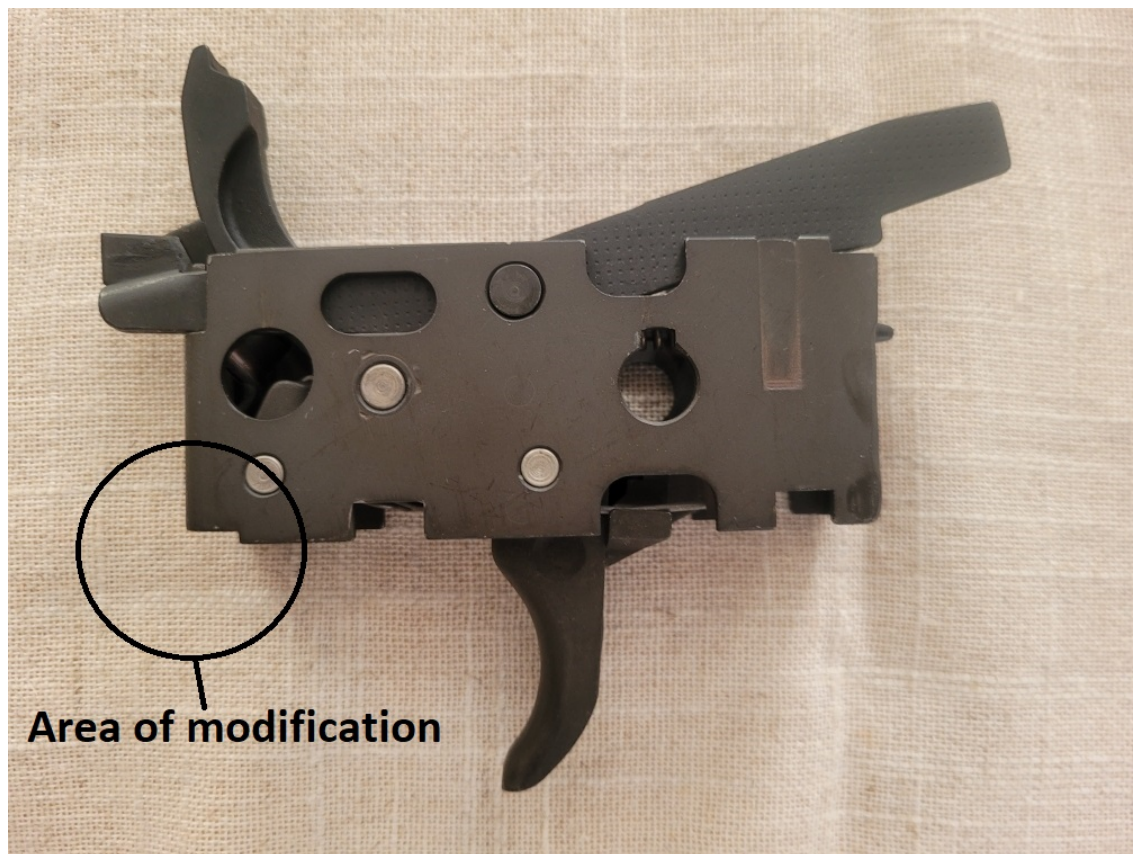


**Shelf area DO NOT MAKE ANY MODIFICATIONS TO THIS AREA ON YOUR RECEIVER**



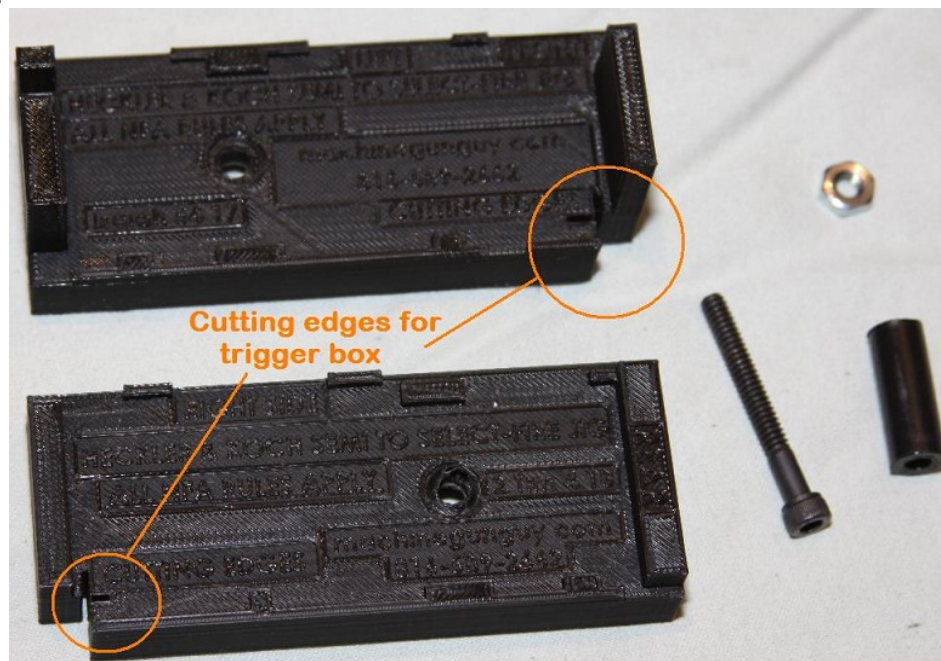
In the above photo, you will see the amount and approximate height of metal to be removed from the trigger pack that must be removed for it to fit.

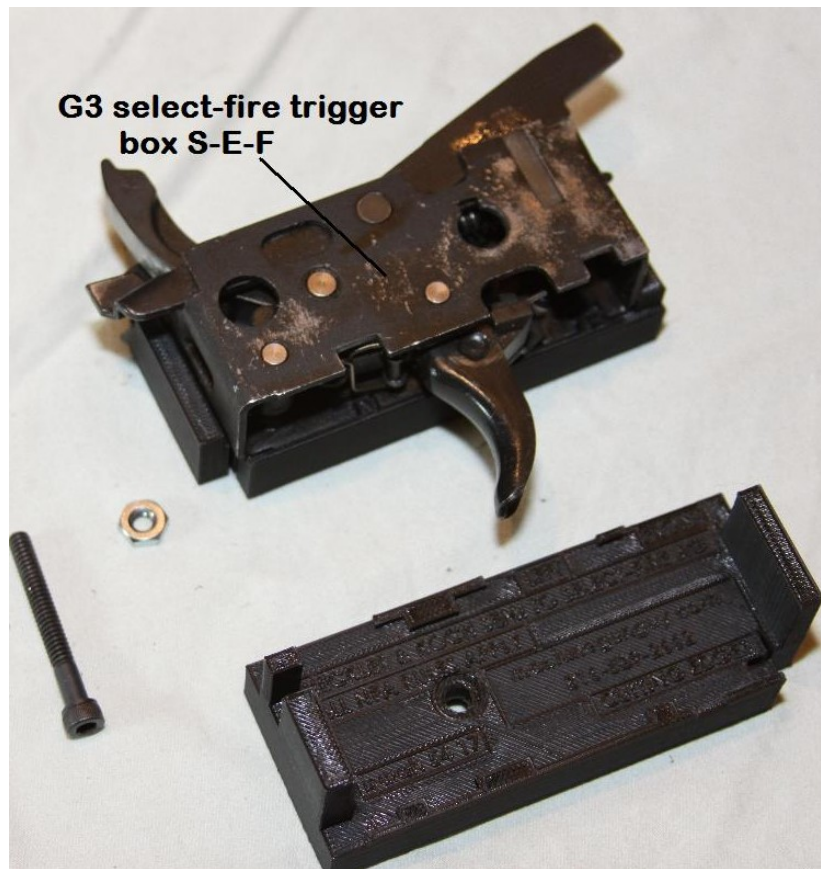




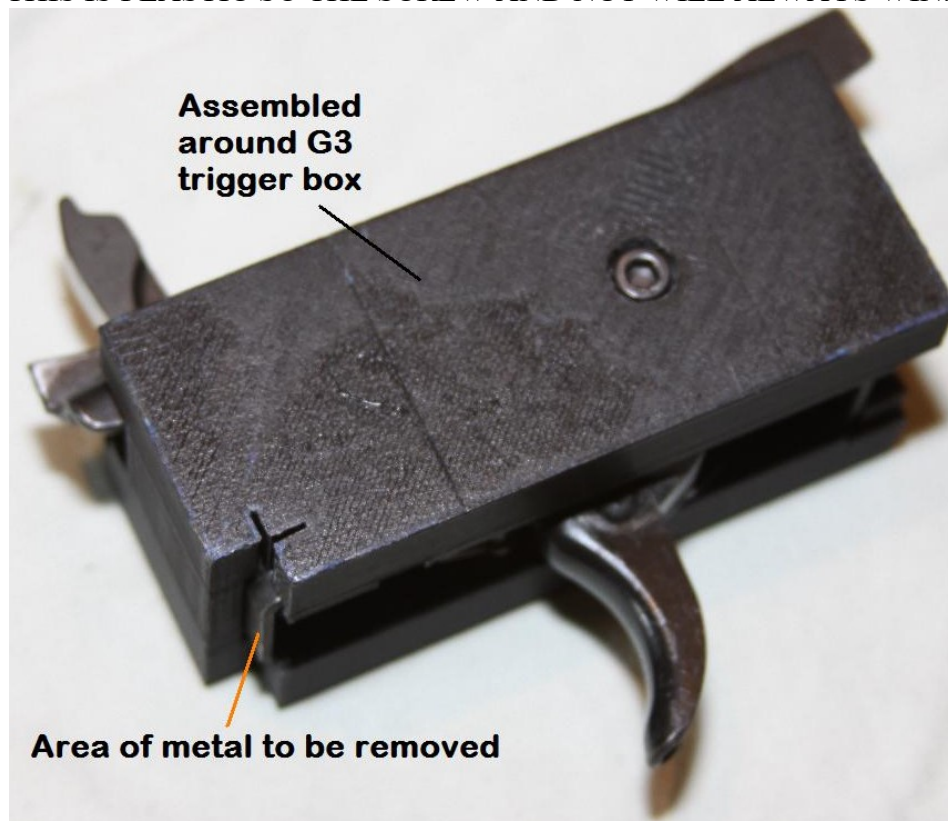
This photo above is an uncut SEF lower and the area needing attention by my jig as shown below.

Place the 'box' assembly into either side of the jig, remember the cutting holes are positioned towards the front bottom of the trigger box.





Put the other side of the jig on, there may be some pressing because I made them tight. Look at the jig's edge seams, they should be evenly touching. Remove the hex bolt and nut from the sideplate and insert them thru the safety hole (thru the spacer too if you use it). Draw the screw so it gently grips everything. **DO NOT OVERTIGHTEN, THIS IS PLASTIC SO THE SCREW AND NUT WILL ALWAYS WIN.**



Now you should only have the exposed metal of the box at the front bottom of the jig as shown in the above photo. On the jig sides there will be a horizontal as well as a vertical cutting edge visible. Take your Dremel



tool and make horizontal and vertical edge cutting marks on the metal box. DO NOT CUT IT DEEPLY WHILE IN THE JIG, THE HEAT WILL DAMAGE THE PLASTIC. Only give it a good mark.

Take the jig apart and finish cutting box assembly in a vice, filing smooth any rough edges.

In the 2 photos below you see the shapes of the trigger packs; 9mm/5.56mm receivers, as well as the 7.62 receivers. Notice the changes to the front area for both trigger packs and the rear tail piece for the 9mm / 5.56 receivers.



**HK G3 semi-auto trigger  
box in modified SEF housing**



**HK Semi auto pack for  
9mm or 5.56mm**

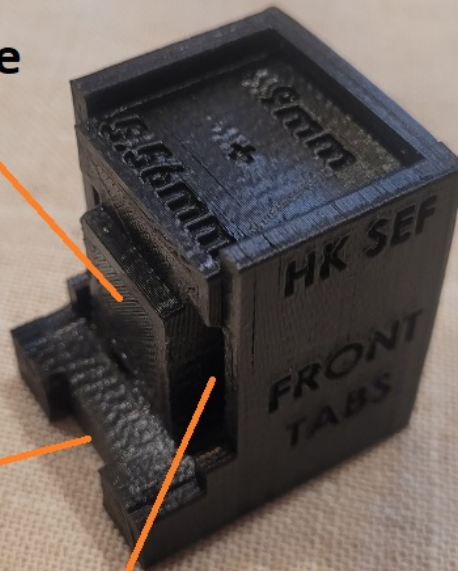
The above 2 pictures are what your modified lower should look like after the front pivot pin tabs have been reshaped.

# HK SEF housing shell marking template

SEF shell front plane

Trigger guard  
front plane

Slots for SEF housing front tabs and  
edge marking







Using a sharp pencil draw the vertical line on the tabs (both sides) as well as the little stairstep at the bottom as shown below. The jig edges are exact so when you use a pencil it must be sharp.



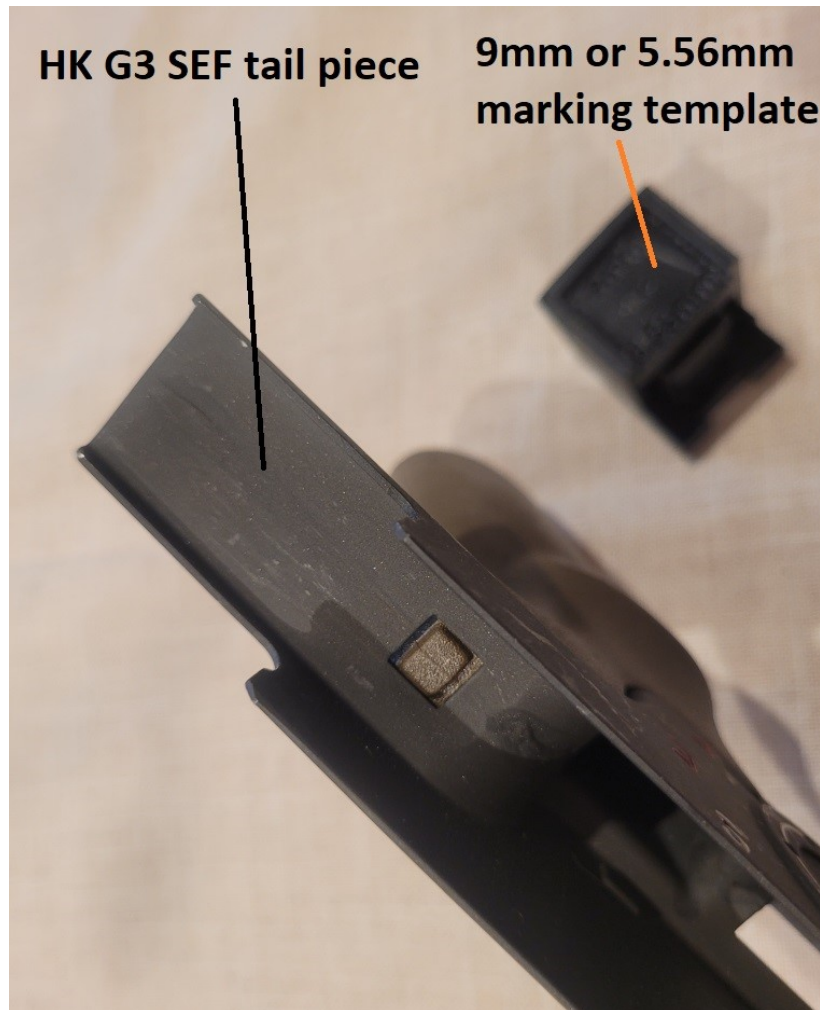
Connect the markings on the sides across the bottom and you are ready to cut.





**Marked receiver ready for cutting**

DO NOT CUT the lines themselves. The jig edges are exact; so when you use a pencil etc. you are adding width, so always undercut, a file works the best for the fine tuning needed for exact fitment of box and shell.

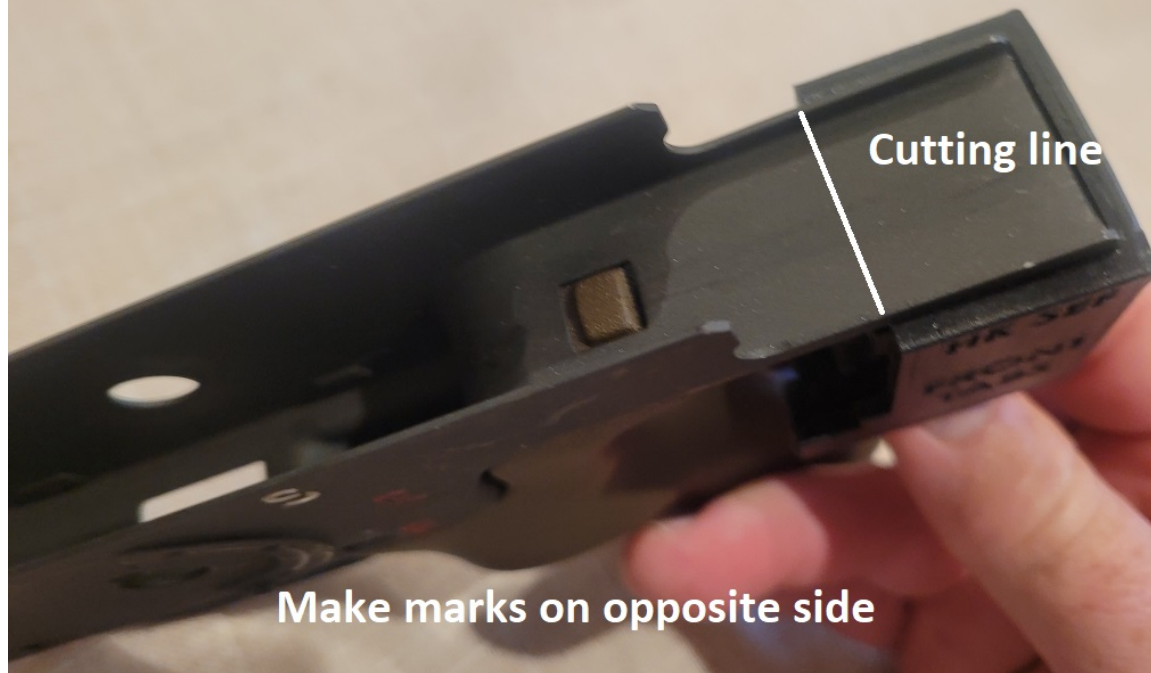


**HK G3 SEF tail piece**

**9mm or 5.56mm  
marking template**



## HK G3 SEF tailpiece with marking template in place



In the photo above, **DO NOT** make this cut if you are using this on a 7.62 / .308 receiver.

This cut shown by the above and below photos are **ONLY TO BE USED on 9mm or 5.56mm receivers.**





Now re-insert the box into the trigger pack (after cleaning off any dust/debris) and put the safety back in place it should look like one or the other below.



**HK G3 semi-auto trigger  
box in modified SEF housing**



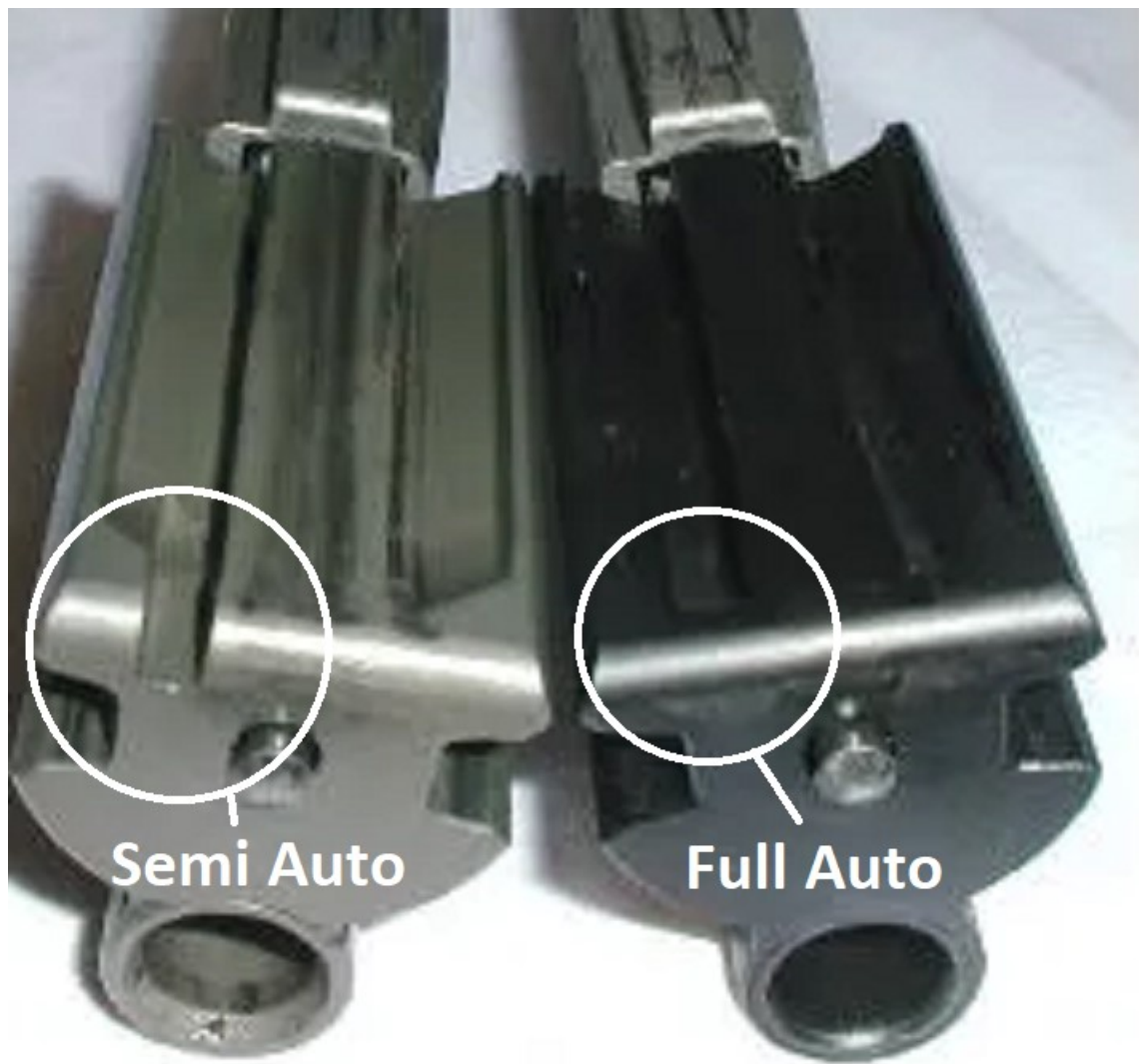
**HK Semi auto pack for  
9mm or 5.56mm**

At this time, you have 24 hours to fax-file your Form 2 paperwork with company name, serial number, and city/state on the trigger pack itself. It is now a machine gun.

To operate in a semi receiver, you must replace the semi bolt carrier with a full auto bolt carrier to trip the auto sear in the trigger pack. Here is what to look for on the bolt carrier(s):







To install the trigger pack, simply set the front edge on the shelf and then it is held securely in place by the rear buttstock and retaining pin(s).

Enjoy!