



WARRANTY, SERVICE AND ADJUSTMENT MANUAL

(January 2024, Revision 2)



Thank you for purchasing a **BLOK ENG - EASY ANNEAL** machine. We trust that the machine will give you years of reliable service!

1. WARRANTY

Your **EASY ANNEAL** machine is warranted against defects in material and workmanship for one year from date of purchase. Blok Eng. Will repair the machine in this period for no charge. Courier charges for repairs will be shared between Blok Eng. and the purchaser.

2. ASSEMBLY

If your machine was delivered via courier, the gas bottle strut will not be attached to the body of the machine (to prevent damage in transit). Simply remove the M6 thumb wheel on the left side of the body, and firmly push the slot of the strut over the little stainless steel pin and rivet. Then re-insert the thumb wheel and tighten.





3. GAS CANISTER

The gas burner supplied with the machine uses 220 g butane gas canisters, available at most hardware shops. The machine cannot be sent via courier with a canister, so you might need to purchase one to get started. The gas canisters are inexpensive, and can anneal many cases.

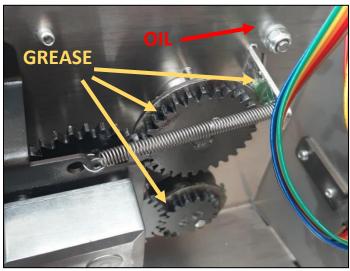


4. **SERVICE**

Your **EASY ANNEAL** machine has a number of moving parts, and occasional lubrication will extend the lifetime of these components, and ensure correct working.

Lubricate the below areas as indicated. All uncoated steel parts such as the front shafts and steel plates can also do with occasional oiling, especially in humid or coastal areas.





5. ADJUSTMENTS

The **EASY ANNEAL** machine has various adjustments to accommodate different sized rifle cases.

5.1. CASE INSERT:

The top wheel is supplied with an insert that is fixed to the cut-out with an M4x8 countersunk screw. Use a 2.5 mm Allen key to remove or install the screw and insert. With no insert attached the top wheel feeds magnum cases up to .338 Lapua. With the insert installed it handles all small and medium cases. Take care to test and have the insert installed when required to prevent binding and damage to your machine.







5.2. WHEEL SPACING:

Both wheels are installed 5 mm from the machine body as standard. This can be increased with the washers supplied, in order to handle very long cases such as .375 H&H. While firmly holding the wheels, remove the front bolts with the supplied 4 mm Allen key, and install one or more of the washers behind the wheel.

Similarly, to move the wheels closer to the body of the machine, remove the spacer and replace with **two** of the washers. If the shaft then protrudes in front of the wheel, use one or two of the washers on the front to enable the bolt to tighten properly.

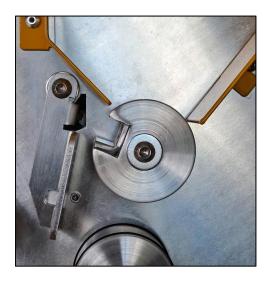


Always take care to hold the wheels while tightening or loosening the front bolts, as failure to do so can put undue strain on the internal gear mechanism. There is no need to over-tighten the front bolts.



5.3.TIMING:

When the wheel body spacing is changed as explained in 3.2 above, take care to reset the timing of the top wheel and ejector paddle. The easiest way to do this is to simply take note of where the top wheel is in its cycle and then re-installing it in the same position. Alternatively, before tightening the front bolt, slowly advance the machine via the speed control until the ejector paddle has just closed. Position the top wheel with the cut-out at 9 o'clock, and gently tighten the front bolt.



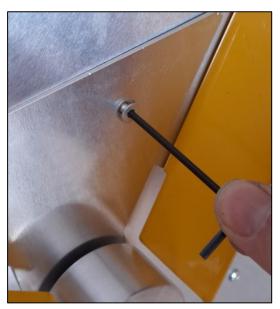


5.4. SHORT CASE ADAPTOR:

The machine is supplied with a Short Case Adaptor plate that allows very short cases such as 6 mm BR, 6.5 Grendel and .222 Rem to be annealed. Insert the plate in front of the body of the machine and behind the wheels. When inserting from above, turn the paddle out of the way. The plate is fixed to the machine body using the two M4 countersunk screws and a 2.5 mm Allen key.

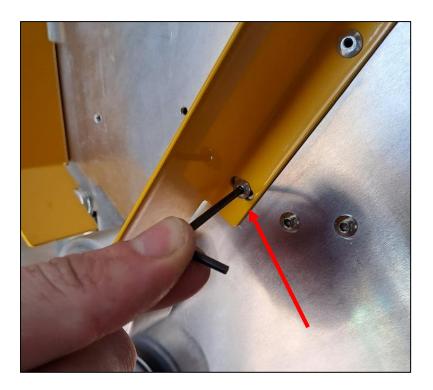
Do not over tighten these screws, the aluminium threads in the machine body is very soft. The screws just serve to hold the plate in position. The easiest way to install the plate is to lay the machine flat on its back. The screws are then less likely to fall out and get caught in the wheels below.





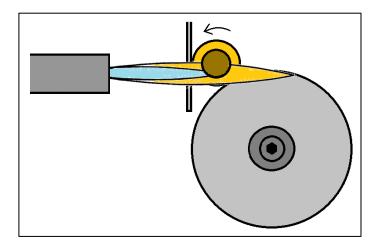
5.5. Top Right Hopper Plate:

The top right hopper flange can be adjusted to ease feeding of cases that might bridge across the bottom mouth of the hopper. Loosen the M4 button head screw with a 2.5 mm Allen key and rotate the flange slightly. **Do not over tighten this screw as the aluminium thread in the machine body is soft.**

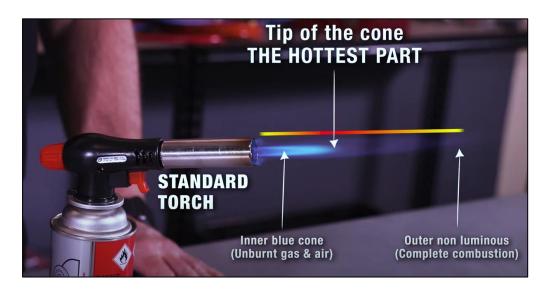


6. **GENERAL TIPS AND TRICKS:**

- O-ring size is 46 x 2 mm Viton type for high temperature
- Play with your machine to familiarise yourself with its adjustment and working before attempting to anneal a batch of brass. It is advisable to use a few old disposable cases to find the correct speed and flame adjustments.
- Depending on the adjustment of your ejector paddle and small variances in the electronics, your
 machine will cycle a case in about 8 seconds with the speed controller set at 50%. Adjustments to
 flames size and depth will influence annealing time.
- The gas flame produces a small amount of thrust on the case neck, in some situations reducing rotation of the case on the bottom wheel. To prevent this, it is advisable to direct the flame slightly off centre on the case, towards the bottom half of the case neck. This will aid the anti-clockwise rotation of the case. Please see sketch below showing the front view of the case, flame and bottom wheel.



- There is a wide variety of opinion on the "amount" of annealing a rifle case requires to soften the brass enough to extend case life. It is advisable to inform yourself as much as possible on the subject and decide on one's own path or plan of action. We at BLOK ENG. believe that it is easier to "under anneal" a case than to "over anneal" it, and hence anneal the necks and shoulders to a dull/dark red colour while the flame is on the case and when viewed in a darkened room (cherry red is probably over-doing it). An annealed and softened case's mouth can be bent with light pressure with a thumb nail, whereas a still hardened case's cannot.
- Do not place the nozzle of the burner too close to the case neck. The best distance is between 50 and 55 mm away from the case neck. Adjust the flame size so that the tip of the inner flame cone is on the case neck and shoulder.



• For heavily tapered cases such as .303 British, it is advisable not to load too many cases at a time in the feeding hopper, as they might bind up the mechanism or fall over the front of the machine. Rather feed the hopper by hand while keeping about 5-7 cases in the hopper.

Please visit our website for more information and videos on the use of the machine:

www.blok-eng.co.za