# Coil Cutter Deluxe Instructions



The Coil Cutter Deluxe is a heavy-duty, motorized, stand-alone machine designed to quickly and efficiently cut large quantities of jump rings in a variety of metal types and sizes. While primarily designed for this use, the Coil Cutter Deluxe can also be used for cutting sheet metal, multiple pieces of stock to identical lengths, cutting ring shanks for resizing, and more!



For Video Instructions, visit PotterUSA.com.

## **Coil Cutter Deluxe Includes:**



## Coil Cutter Deluxe Safety <u></u>

- 1. Read the owner's manual carefully and make sure you understand the instructions before attempting to use the machine.
- 2. Learn the applications and limitations before use.
- 3. Make sure the blade is in good condition and is positioned properly.
- 4. Make sure all guards/guides are in place and properly adjusted.
- 5. Adjust blade guides so that the coil fits snugly but not tightly between them.
- 6.Adjust the table height so that it will fully cut through only the bottom portion of the coil.
- 7. Ensure the blade is tracking correctly and runs freely in the blade slot.
- 8. The coolant reservoir acts as a bottom blade guard. NEVER run the blade without the coolant reservoir in place.
- 9. Keep hands away from the line of the cut, and braced against the table.
- 10. Before beginning to cut a coil, make sure any tails or sharp edges are trimmed off the ends of the coil. When the blade comes into contact with the coil at the start of the cut there is a slight kickback and this can cause the tail to possibly push back into your fingers which can be painful or possibly cut the skin.
- 11. Hold the coil firmly and flat on the table while feeding it through the guides towards the blade.
- 12. Use a wooden push stick when you remove cut pieces from between the guides and saw blade or when your hands are close to the blade.
- 13. If you need to stop cutting, hold the material firmly and shut down the saw. Wait for the blade to stop moving before removing the piece.
- 14.Ensure that there is enough coolant in the reservoir so that the blade is always in contact with the coolant. Do not use the blade without coolant.
- 15. Do not use excessive force when pushing coils through the blade.
- 16.Do not leave this machine running unattended. Turn off the power and make sure the machine has stopped running before leaving the area.
- 17. Check the cord regularly for any signs of damage.
- 18.Do not rinse or submerge the machine in water, and ensure that the plug and cord do not get wet.
- 19. Keep the power plug and cord away from heated surfaces.
- 20.Do not cut anything with the Coil Cutter Deluxe that is not recommended or approved by PotterUSA.
- 21. Keep children and pets away from this machine.
- 22. Only use replacement parts obtained by PotterUSA. In order to ensure the safety and proper care of your investment in the Coil Cutter Deluxe, only use PotterUSA replacement parts. Always consult with PotterUSA before performing any repairs or alterations.
- 23. Wear ANSI-approved safety glasses when operating this machine. When properly operating this machine, nothing should become airborne, but accidents happen. Eye protection should be worn to protect against injury.
- 24. Tie back your hair, remove jewelry, and wear fitted clothes to avoid getting caught or pulled by the moving blade.
- 25. Never operate this machine when you're tired or under the influence of alcohol or drugs.

#### Parts of the Coil Cutter Deluxe



#### Coil Cutter Deluxe Recommended Materials and Gauges



**Recommended metals:** We recommend using typical non-ferrous jewelry metals (copper, silver, brass, bronze, gold, platinum, niobium, aluminum) with the Coil Cutter. We DO NOT RECOMMEND cutting stainless steel or titanium, but it may be possible, with special treatment.

Maximum Blade Height: 4mm

Minimum Gauge: 22 Gauge Maximum Gauge: 8 Gauge

Minimum Coil Inner Diameter: 1.5mm Maximum Coil Diameter: None

**Speed:** We recommend running the Coil Cutter on the highest speed for non-ferrous metals, and on a lower speed (approximately half) for harder materials.

#### Cutting Stainless and Titanium:

- Not recommended, but it is possible
- Recommend no thicker than 1mm
- Must use slower speed
- Must apply slow but constant forward pressure to the coil when cutting. If you back off/pause, the metal will work-harden instantly and will be nearly impossible to continue to cut.
- Blades will wear out faster. Recommend purchasing extra.

#### How to Use the Coil Cutter Deluxe



- 1. Make sure the **ON/OFF Switch** is in the OFF position before plugging in the **Power Cord**. Plug the **Power Cord** into a grounded wall outlet.
- 2. Mix the **Coolant Solution** by adding a few drops of the **Coolant Concentrate** to the **Empty Squeeze Bottle** and adding water. The solution should be mixed at a ratio of approximately 10 parts water to 1 part **Coolant Concentrate**. Very little coolant is needed at one time so mix a small amount. The **Empty Squeeze Bottle** can also be used to suck excess coolant out of the **Reservoir** and back into the **Squeeze Bottle** for storage.
- 3. Fill the Coolant Reservoir with Coolant Solution. The level of the Coolant Solution should be high enough that it comes into contact with the Blade and maintains contact while the Blade is running. The Blade should NEVER be run without the Coolant Reservoir in place as it acts as a Bottom Blade Guard.
- 4. Adjust the Blade height to accommodate the size coil you are cutting. This is done by using the 8mm Wrench to adjust the Table Adjustment Nuts. When these nuts are loosened, the Table can swivel up or down to change the height of the Blade. The Blade should extend high enough that it can cut through the bottom of your coil.
- 5.Adjust the **Right and Left Guides** to fit the coil you will be cutting. This can be done with the **1/8**" **Hex Key**. Loosen the screws, slide the **Guards** into position, and then re-tighten the screws. The coil should fit snugly in between the **Guides** but should also be able to slide freely through them.
- 6.Once the **Guides** and **Blade** height are set the **Coil Cutter Deluxe** is ready for use. Turn the **Switch** to the ON position and wait for the **Blade** to come up to speed. Ensure the **Blade** is being coated in **Coolant Solution** from the **Reservoir** below the **Table**.

#### How to Use the Coil Cutter Deluxe



7. Blade speed can be adjusted with the Variable Speed Control Dial. The blade can be run at full speed for most applications but can be slowed down for harder materials if desired.

8. Insert your coil into the channel created between the **Left and Right Guides**. Feed the coil slowly through the **Guides** and over the **Blade**. The jump rings will slide down the **Parts Ramp**. You may want to place a receptacle below the **Parts Ramp** to catch your jump rings.

9. Turn off the machine and wait until the **Blade** comes to a complete stop before removing any jump rings from the **Table**. Remove jump rings from the **Table** with a wooden push stick or brush (not fingers). **\*\*Unplug the machine when not in use.** 

#### How to Adjust the Blade Height

- 1. Use the **8mm Wrench** to adjust the **Table Adjustment Nuts**. Turn the wrench counterclockwise to loosen the nuts. You may need to remove the **Right Guide** in order to fit the wrench onto the nuts.
- 2. When the **Table Adjustment Nuts** are loosened, the table can swivel up or down to change the height of the **Blade**. The blade should extend high enough that it can cut through the bottom of your coil.
- 3. Adjust the **Table** to the desired height and re-tighten the **Table Adjustment Nuts**. If you removed the **Right Guide**, put it back in place and re-tighten the nuts before using the machine.

#### How to Change the Blade



- \*Make sure the machine is unplugged before beginning.\*
  - 1. Adjust the Table so it is in the highest possible position.
  - 2. Remove the **Coolant Reservoir** by sliding it off the **Peg**. If needed, the **Empty Squeeze Bottle** can be used to draw **Coolant Solution** out of the **Reservoir** for storage. Once you slide the **Reservoir** off the **Peg**, you will need to tilt it under the **Blade** in order to fully remove it.
  - 3. Rotate the **Blade** by hand until the **Arbor Key Hole** is visible (it will be the hole without the set screw).
  - 4. Insert the Arbor Key into the Arbor Key Hole.
  - 5. Use the 5/32" Hex Key to remove the bolt at the end of the Arbor.
  - 6. Remove the old **Blade** and replace with the new **Blade**. Make sure the lettering on the face of the **Blade** is FACING THE MOTOR side of the machine. Ensure the **Blade** is properly seated on the central step in the **Arbor**.
  - 7. Replace the bolt in the end of the Arbor and tighten it with the Hex Key.
  - 8. Replace the Coolant Reservoir by sliding it back into place on the Peg.

## Tips & Tricks

- The Coil Cutter Deluxe was designed to quickly and efficiently cut large quantities of jump rings in a variety of metals and sizes. While its primary use is for cutting jump rings, the Coil Cutter Deluxe can have other uses including the following:
  - Cut small lengths of sheet by removing the **Right and Left Guides**.
  - Use the **Blade** to cut through ring shanks for resizing.
  - Cut off tabs from pancake die stampings (straight lines only).
  - Cut multiple pieces of metal to the same length by using the Right Guide as a stop.
- Are there video instructions? Yes! Visit PotterUSA.com or check out our YouTube channel for how-to instructions. A downloadable PDF is also available on our website.

### Troubleshooting

- The metal/jump ring gets stuck in the blade slot, what do you do? Turn the machine OFF immediately. Wait for the blade to stop spinning. Use a wood push stick to remove any metal from the blade slot. Check under the table to make sure metal is not stuck in the blade slot beneath the table as well. Make sure the blade has not broken or bent before resuming use of the machine. If the blade is broken or bent, replace before using.
- The motor turns on but blade doesn't spin...why? Likely metal is trapped in the blade slot...see above.
- The wire is not fully cut through...why? Likely the blade height was too low. Adjust the table so that more of the blade is showing, ensuring it is set high enough to cut through the entire bottom of the jump ring coil.
- Both sides of the coil have been cut...why? The blade was set too high. Adjust the table so less of the blade is showing.
- Why did the blade break? Likely metal flexed while cutting, or too much force was applied to the coil. Other possible culprits are trying to cut too fast, or the blade is dull.

Stay up-to-date with any modifications to these instructions, new tooling, and more by visiting PotterUSA.com, signing up for our newsletter, and joining our Facebook Group, "Potter People-Jewelry Group."

