HI-ALLOY STUD EXTRACTOR

ELECTRODE FOR REMOVING BROKEN BOLT STUBS OR TAPS

DESCRIPTION: Hi-Alloy Stud Extractor was developed specifically for the purpose of removing bolts or taps broken off below the surface of their root metal. No special equipment is required for use of this product. Extractions can be done in the shop or in the field, anywhere there is access to a welding machine. This product is coated with a unique ceramic flux which protects existing threads during the downhole buildup process. The complex alloy structure of this electrode allows it to be used on bolts and taps made of standard or hardened steels. Its deposited metal is stronger than most bolts and will even gain toughness as you torque it during the extraction process.

TYPICAL APPLICATIONS: Removal of broken bolt stubs or taps from engine blocks, industrial machinery, agricultural equipment, and wheel drums.

PROCEDURES:

1. Select the electrode diameter and set machine to corresponding amperage.

Hole diameter:	5/32-1/4”	1/4-3/8”	3/8-1/2”	1/2”-up
Electrode diameter:	1/16”	3/32”	1/8”	5/32”
Amperage ranges:	25-35	30-90	75-120	100-145
Polarity:	AC or DC Reverse			

2. Select a nut with the same size hole as the hole in the work piece and place it on the work piece hole to hole.

3. Insert Stud Extractor electrode through the nut and strike the arc onto the center of the broken bolt or tap.

4. Maintain a short arc and build up carefully in the center of the target piece straight up through the middle of the hole allowing the ceramic slag to surround the buildup and protect the existing threads.

5. Continue building up to the top of the nut but don’t weld the nut to the buildup.

6. Allow part to cool then remove the nut and protruding portion of the slag.

7. Replace the nut around the buildup and weld the nut to the buildup with the Stud Extractor rod being careful not to weld the nut to the work piece.

8. Allow finished weld to cool to room temperature.

9. Lightly tap the nut to loosen slag then remove the broken piece by turning the nut with an appropriate wrench.