

# StudPuller

SRT MANUFACTURING



## OPERATING INSTRUCTIONS AND MAINTENANCE MANUAL

**CONGRATULATIONS** on aquiring the **Threaded StudPuller**!

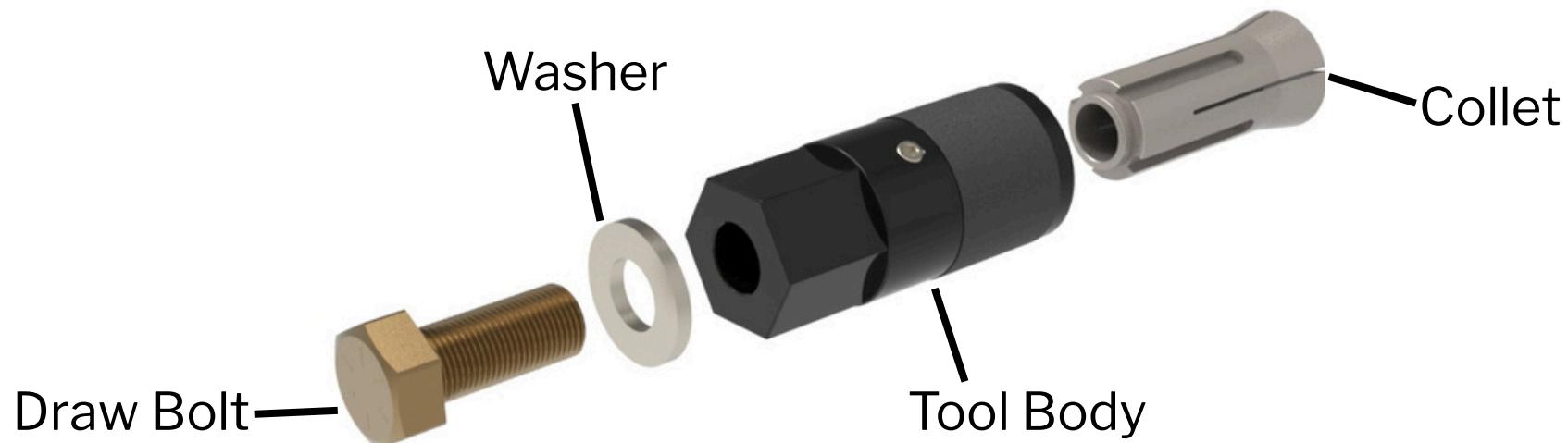
The **ONLY** stud removal and installation tool based on science.

The **Threaded StudPuller** removes and installs studs while preserving the threads completely.



# Threaded StudPuller

## Assembly of tool



- Visually inspect and confirm all components are free of debris and damage.
- Apply a light coat of anti-seize lubricant to outside or O.D. portions the collet only.
- Apply a light coat of anti-seize lubricant to inside or I.D. portions the Tool body only.
- Apply a light coat of anti-seize lubricant to the draw bolt threads.
- Insert the collet into the tool body, aligning the slots of the collet to the alignment pins inside the tool body.
- Insert the draw bolt with washer into the tool body until contact is made with collet.
- By hand, tighten the draw bolt into the mating collet threads until snug.



# Threaded StudPuller Removal Procedure



## Stud Removal

- Verify diameter and thread designation (pitch) of the Threaded StudPuller collet match the diameter and thread designation (pitch) of the stud to be removed.
- Clean all debris from stud to be removed.
- Verify the threads of the stud are free of damage. (Damaged studs can potentially damage the Threaded StudPuller collet.)
- Verify the internal threads of the Threaded StudPuller collet are free of debris.
- Thread the Threaded StudPuller tool onto the stud by hand until the tool bottoms out then unthread the tool 4 full rotations. (This process will ensure the tool will not get stuck onto the stud.)
- Tighten draw bolt in a clockwise rotation. This will draw the tool body down on the collet creating a mechanical bind between the stud and tool.
- Attach an impact wrench and socket to the outer hex drive of the Threaded StudPuller
- Remove stud in a counterclockwise rotation.
- Once the stud is removed, loosen the draw bolt of the Threaded StudPuller until the pressure releases from stud.
- Remove the stud from the Threaded StudPuller by hand.
- Clean and verify the internal threads of the Threaded StudPuller collet are free of debris before each use.



# Threaded StudPuller Installation Procedure



## Stud Installation

- Verify diameter and thread designation (pitch) of the Threaded StudPuller collet match the diameter and thread designation (pitch) of the stud to be installed.
- Clean all debris from stud to be removed.
- Verify the threads of the stud are free of damage. (Damaged studs can potentially damage the Threaded StudPuller collet.)
- Verify the internal threads of the Threaded StudPuller collet are free of debris.
- Thread the stud into workpiece by hand 5 rotations minimum before installing the Threaded StudPuller onto stud. (This will prevent cross threading.)
- Thread the Threaded StudPuller tool onto the stud by hand until the tool bottoms out then unthread the tool 4 full rotations. (This process will ensure the tool will not get stuck onto the stud.)
- Tighten draw in a clockwise rotation. This will draw the tool body down on the collet creating a mechanical bind between the stud and tool.
- Attach an impact wrench and socket to the outer hex drive of the Threaded StudPuller
- Install stud in a counterclockwise rotation.
- Once the stud is installed, loosen the draw bolt of the Threaded StudPuller until the pressure releases from stud.
- Remove the Threaded StudPuller from the stud by hand in a counterclockwise rotation.
- Clean and verify the internal threads of the Threaded StudPuller collet are free of debris before each use.



# Threaded StudPuller Warnings & Safety



## Warnings

- **Put Safety first!** Failure to observe the following warnings and instructions could result in equipment damage, serious injury or possibly even death.
- **Always wear appropriate protective clothing while operating the tool.**
- Pneumatic impact wrenches vibrate in use. Vibration and repetitive motion may be harmful to arms and hands. Stop using if any discomfort, tingling feeling or other pain occurs. **Seek medical advice if necessary.**
- Always run off air supply and disconnect supply hose from impact wrench prior to removing, installing or adjusting any component on this tool, or before performing any maintenance on the tool.
- **Keep hands, loose clothing and long hair away from the tool in rotational operation.**
- Tool will continue to rotate, unengaged, when impact wrench throttle is released.
- **Do not lubricate with flammable or volatile liquids such as kerosene or diesel.**
- This tool is not insulated against electric shock. **This tool is not designed for work in explosive atmospheres.**
- This tool can exert strong forces on the operator. **Anticipate sudden changes in motion during start-up operation of the tool.**
- The use of other than originally designed replacement parts may result in **safety hazards**. Decreased tool performance, increased tool maintenance and may **void all term warranties**.
- **TRW INDUSTRIES LLC** is not responsible for customer's modification of tools for applications on which **TRW** was not consulted.
- Repairs should only be made by authorized, trained personnel. Consult **TRW INDUSTRIES LLC** for assistance.
- **It is the responsibility of the operator's employer to place the information in this manual into the hands of the equipment operator.**
- **The only tool that should be used to rotate the StudPuller is a properly inserted impact wrench drive tool. Any other tools, such as a pipe wrench, will void the warranty and could permanently damage the tool.**
- **DO NOT EXCEED MORE THAN 20 SECONDS OF IMPACT OPERATION AT ONE TIME WITH THIS TOOL. If the stud does not begin to rotate, it will have to be removed using another removal method.**

## Safety

- **CONSIDER YOUR WORK ENVIRONMENT.** Stud extraction tools should never be used in any atmosphere which may be considered volatile. If any doubt exists, **DO NOT USE THIS TOOL!** Metal to metal contact can cause sparks, which could serve as an ignition source to explosive atmospheres.
- **AVOID PREMATURE TOOL START-UP.** Insure that impact throttle is not engaged. Never lock or tie the throttle handle down in the open operating position.
- **STAY CLEAR DURING OPERATION.** The tool is designed to operate without physical assistance. Keep hands and body clear during operation.
- **STORE IDLE TOOLS.** When not in use, tools and accessories should be properly stored to avoid deterioration.
- **USE THE RIGHT TOOL.** Do not force a small tool to do the job of a larger tool. Use the right tool for the application. Do not use tool for purposes unintended.
- **PROPER ATTIRE.** When handling/operating stud extraction tools, wear work gloves, safety glasses with side shield, hard hat, safety shoes, hearing protection and all other applicable safety clothing.
- **MOVING EQUIPMENT.** Only use certified lifting devices to load, unload or move equipment.
- **MAINTAIN TOOLING.** Always inspect tool prior to operation. After operation, tool must be disassembled for re-lubrication and inspection.
- **STAY ALERT.** Be aware of your surroundings. Communicate with others. Use common sense. Do not operate equipment under the influence of drugs or alcohol.

### PRIOR TO OPERATION:

- Verify that pneumatic impact wrench has a valid inspection and/or maintenance record. Insure that all air supply lines are secured with safety clips, whip checks and that there is no air leakage or line kinks.
- Verify that all internal components of tool are secured and in the correct orientation.
- Ensure all personnel in area are aware of extraction or installation.