

TRI TOOL INC.  
TECHNICAL SPECIFICATION  
MODEL 576AC SEVERMASTER™ SYSTEM  
APRIL, 1997

Model 576AC SEVERMASTER™

The Model 576AC SEVERMASTER™ severs 2.00" ( 50.8mm ) to 6.63" ( 168.3mm ) diameter tubes and thin wall pipe within the size range. This machine enhances productivity by incorporation of an Auto-Cycle Tool Module and Quick Lock Collet Closure. The Auto-Cycle Tool Module incorporates a cam cycle tool bit feed mechanism which automatically returns the tool bit to the home position ready to start the next cut. The tool module also allows setting the start and finish cut positions to minimize the cycle time. The feed increment per revolution is adjustable to match the cutting relative to the material. A variable speed motor provides cutting speed control for tool bit life and ID burr condition. The Quick Lock mechanism actuates the collet with a single lever stroke for simple collet changes.

Tool bit options are available to minimize the burr on the mounting side or the drop-off side of the sever line and in different edge widths to match the tube wall thickness. The tool also incorporates mounting features to allow use of an SQM-2AC Tube Squaring Module for optimum burr free ends.

The Model 576AC Severmaster System consists of the mainframe with Quick Lock Collet Closure, Auto Cycle Tool Module with adjustable depth of feed from .001" to .005" ( .02mm to .13mm ) per revolution, drive motor, wrench kit and operators manual.

Design and Operating Features:

1. The Model 576AC accepts its own torque through the collet clamping system.
2. The collet provides accurate centering and full diameter support for minimum distortion of thin wall tubing.
3. Gear driven powerhead rotates on a precision ball bearing system.
4. Single lever actuation of collet.
5. Gears are all enclosed for operator safety.
6. All required wrenches for operation are supplied with the machine.

## Specifications

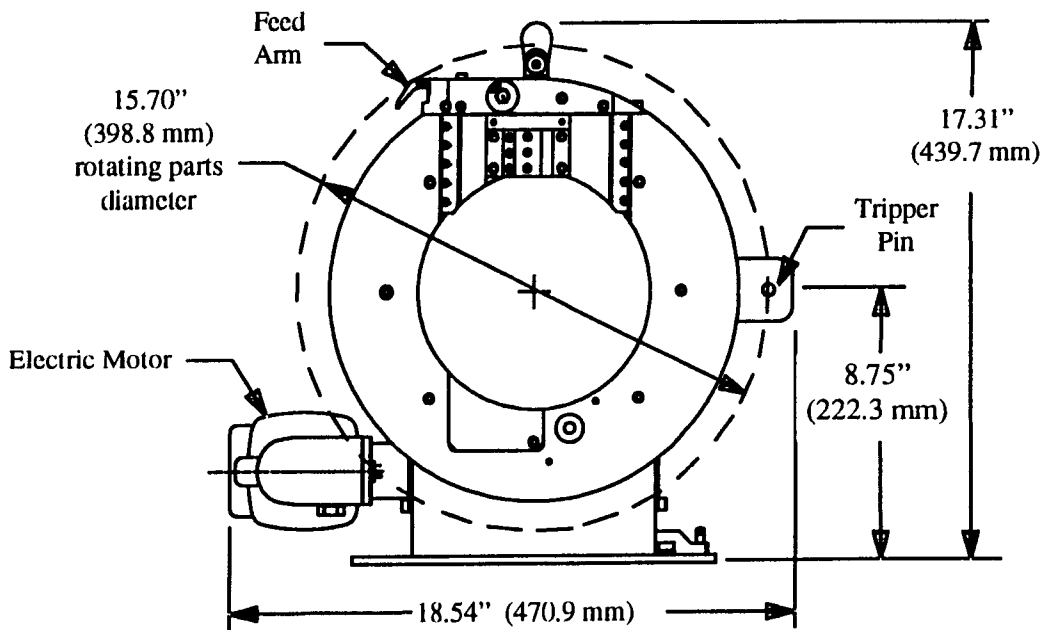
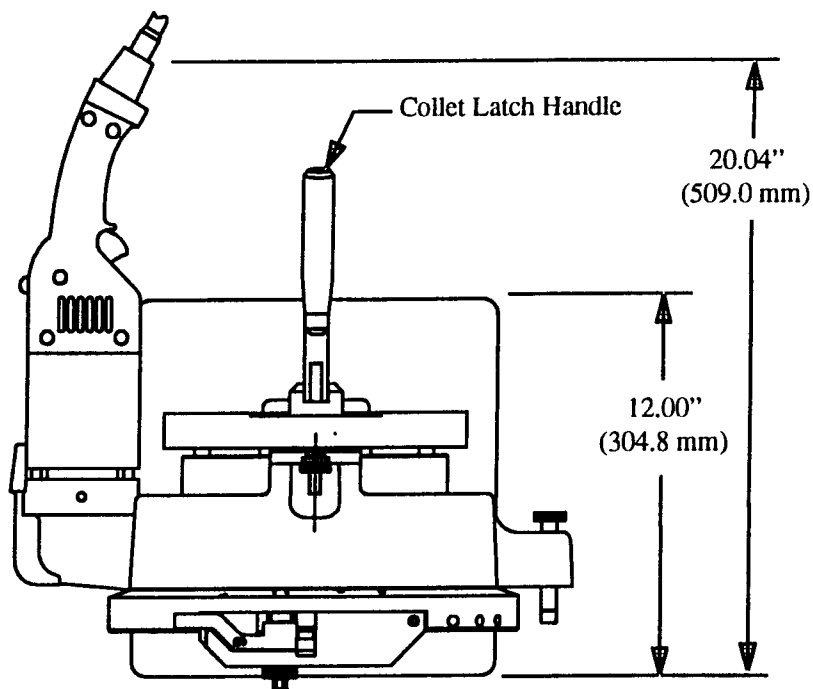
1. Pipe Cutting Capacities:
  - a. Part-off or sever:  
2" pipe through 6" pipe schedule 10  
2.00" ( 50.8mm ) through 6.63" ( 168.3mm ) diameter tubing up to .156" ( 4.0mm ) wall.
2. Material Cutting Capabilities:
  - a. Mild steels, chrome steels ( Rc 35 max ), stainless steel, copper-nickel and aluminum with- limitations except size and wall thickness as specified in paragraph 1.
  - b. Inconel and some other high temperature alloys may require special procedures as a function of wall thickness and type of end preparations. Contact Tri Tool's Engineering Department for details.
3. Clearances and Dimensions:
  - a. See Envelope Drawing.
4. Pneumatic Drive System:
  - a. Available on request.
5. Electric Drive:
  - a. Power requirements  
115 vac, 20 to 60 hz, 11 amp  
230 vac, 50 to 60 hz
6. Cutting Head Speed: ( Electric )
  - a. Maximum cutting head speed: 40 rpm
7. Mounting
  - a. Manually actuated collet clamping system.
8. Feed:
  - a. Autofeed system adjustment from .001" to .005" ( .02mm to .13mm ).

Spare parts and standard tool bits are available from stock. Engineering design services for custom tool bits and special function modifications are available from the factory.

All Tri Tool and allied equipment products are subject to design improvements and specification changes at any time with no obligation to units already sold.

Warranty (limited), parts and/or equipment are warranted against defects in material and workmanship for a period of one year from date of purchase. Full details supplied on request and/or with tools.

Filter, regulator, lubricator required to protect warranty on air powered tools.



**COMPANY CONFIDENTIAL**  
 PROPRIETARY PROPERTY OF TRI TOOL INC. NO REPRODUCTION, USE OR DUPLICATION OF THE DESIGNS SHOWN HEREON IS PERMITTED WITHOUT EXPRESS WRITTEN CONSENT FROM TRI TOOL INC.  
 3806 SECURITY PARK DRIVE  
 RANCHO CORDOVA, CA 95742-6990  
 COPYRIGHT TRI TOOL INC.



**TRI TOOL INC.**

3806 SECURITY PARK DRIVE  
 RANCHO CORDOVA, CA 95742-6990

Envelope Drawing  
**Model 576AC SEVERMASTER™**

APPROVALS		DATE	DWG NO. 77-1548	REV
DRAWN PFAFMAN		4/18/97		
CHECKED			DO NOT SCALE DRAWING	SHEET