



Enabling Your Ideas

# Technical Document

## PCNC 440™ Flood Coolant Kit

**Product Identification:** PCNC 440 Flood Coolant Kit (PN 35719)

**Purpose:** This document details installation of a flood coolant kit on a PCNC 440 mill.

Qty.	PCNC 440 Flood Coolant Kit	PN
1	115 VAC Coolant Pump	32746
1	Coolant Tank	35711
1	Coolant Hose Adapter	35989
1	Chrome-Armored Hose (includes 2 washers)	30725
1	1/4" Coolant Hose	32833
1	3/4" ID Clear Tubing	37115
1	Chip Screen	37112
1	Funnel Tray	37113
2	Hose Clamp	37116
8	10-32 x 1/2" Screw	34100
4	Rubber Washer	37114
8	10-32 Nut	34101
1	Coolant Tank Cover	35710



**NOTE:** If any of these items are missing, contact Tormach Customer Service at (608) 849-8381 for a replacement.

**NOTE:** Wrap threads on pump's elbow adapter and Coolant Hose Adapter with thread seal tape (plumber's tape).

### Coolant System Installation

1. Place Coolant Tank Cover on top of Coolant Tank.
2. Using four 10-32 x 1/2" Screws and 10-32 Nuts, mount Coolant Pump to Coolant Tank Cover (see **Figure 1**); insert one end of 3/4" ID Clear Tubing in cover.

**NOTE:** One Hose Clamp can be used on end of 3/4" ID Clear Tubing to prevent hose pull out from tank.

### Required Tools:

- Plumber's tape
- Electric drill
- Center punch
- Silicone sealant
- Adjustable wrench
- Phillips screwdriver

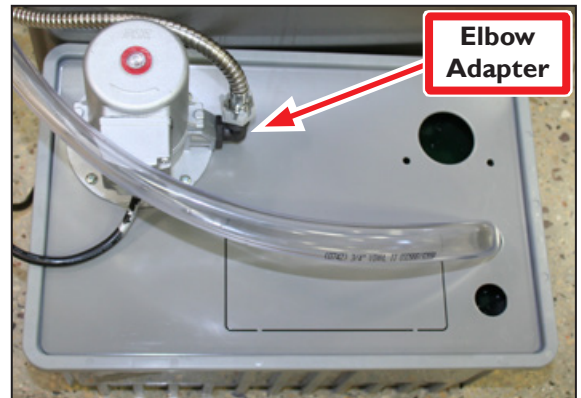


Figure 1

3. Insert Coolant Hose Adapter into pre-installed Mounting Bracket on mill column (see **Figure 2**).
4. Tighten fixing screw to secure adapter position.
5. Connect 1/4" Coolant Hose to Coolant Hose Adapter (see **Figure 2**).

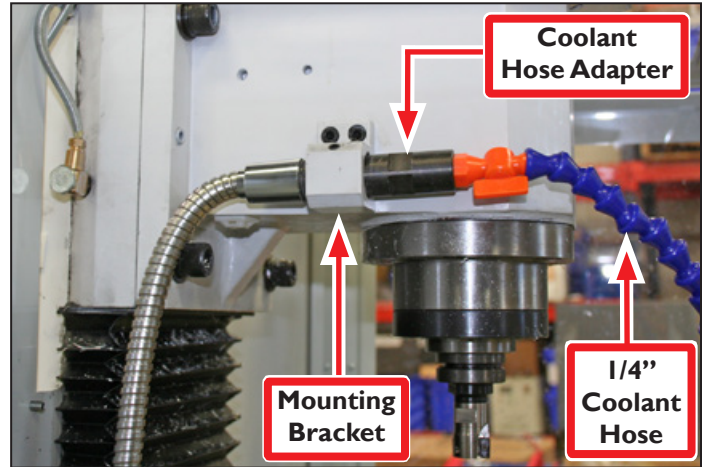


Figure 2

6. Insert one silicone washer (included) into each end of Chrome-Armored Hose (see **Figure 3**).
7. Route Chrome-Armored Hose around back of mill and connect to Coolant Hose Adapter (see **Figure 2**); connect opposite end of hose to Elbow Adaptor on pump (see **Figure 1**).



Figure 3

8. Remove Chip Pan Access Panel (see **Figure 4**) and drop in Chip Screen (see **Figure 4 inset**).

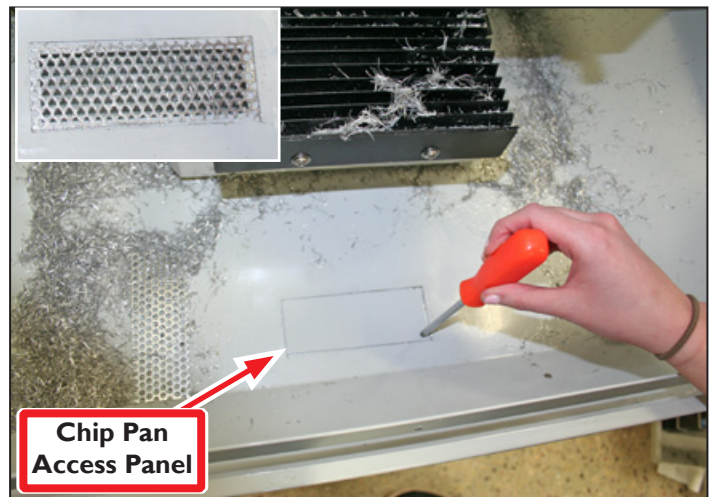
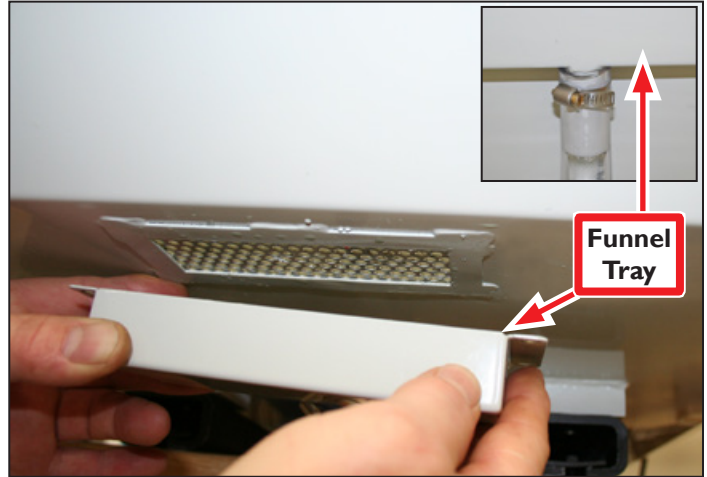


Figure 4

9. Slip Hose Clamp on loose end of 3/4" ID Clear Tubing and attach assembly to Funnel Tray (see **Figure 5** inset).
10. On underside of chip pan, match Funnel Tray up with Access Panel opening (see **Figure 5**); mark four screw holes with a marker.
11. Use center punch to mark four locations and use 7/32" drill bit (not included) to drill through chip pan at four marked locations.



**Figure 5**

12. Attach Funnel Tray to bottom of chip pan using four 10-32 x 1/2" Screws, Rubber Washers, and 10-32 Nuts (see **Figure 6** and **Figure 7**). Do not overtighten.



**Figure 6**

13. Clean perimeter of installed Funnel Tray with alcohol and lay bead of silicone (not included) around perimeter to seal tray against leaks (see **Figure 7**).
14. Connect Coolant Pump's 3-prong plug to power strip (not included).



**Figure 7**