# For rcs541 regular

#### **OPERATION MANUAL FOR RCS 541 AND 546**

Always wear protective devises for eyes and hands when operating the RCS Machine. Always set PARKING BRAKE and install fender covers when working on a vehicle.

CAUTION FLUID MAY BE HOT AND CAP UNDER PRESSURE RCS 546 Has two New fluid tanks (Green Hose and Red Hose)

Connect shop air to RCS. Open the radiator/expansion tank cap. Turn Right valve on top of the machine to exchange and check the gauges (New Tank gauge15-17 psi Used Tank Gauge vac -5 in)

If adjustment is needed set regulator by puling out on knob and turn it either clock wise to increase or counter clockwise to decrease the pressure, then push in the knob to lock.

Be sure proper amount of coolant is in the new coolant tank plus 2Lt or 2 Qt extra. Tighten the cap on the New coolant tank. If coolant is used with water Turn mixing valve to MIX for 2-5 min. Check used fluid tank to insure there is enough room for the used coolant.

Remove the top radiator hose at either the engine block or at the radiator whichever is the most accessible. If desired pour a radiator flush chemical into the radiator hose or into the radiator.

Connect one end of the adapter loop hose to the radiator, the other toward thermostat. Attach the long red hose to the loop hose towards the thermostat and the long black hose towards the radiator.

Do not use the OE spring style hose clamps. Use only gear hose clamps.

IMPORTANT - Top up with appropriate fluid and attach radiator cap.

NOTE: On reverse flow systems connect the opposite direction (long red hose towards radiator)

## PULL BY HANDLE ONLY

#### **EXCHANGE COOLANT**

- Open loop hose valve only, and close valves on the long red and black hoses.
- Start vehicle check fluid level in radiator after a few minutes of run time. Top up if required.
- If using a cleaner, run vehicle for suggested length of time for cleaning.
- Turn off vehicle Close loop hose valve
- Turn right diverter valve to EXCHANGE VEHICLE FLUID position
- At desired pressure (15-17 psi) open ball valves on black and red hoses
- When desired amount has been exchanged, close ball valve on red hose first then on black hose. Evacuate out approximately 2 LT (2 Qt) of coolant from radiator so that the level is below the top radiator hose

#### **DISCONNECT LOOP HOSE**

- Disconnect the red fill hose & black drain hoses
- Disconnect the adapter loop hose
- If desired, pour a conditioner into the radiator or top radiator hose
- Reconnect top radiator hose to radiator and make sure clamps are tight
- Top up radiator and overflow tank using evacuator hose attached to the red fill hose
- Start vehicle, check coolant level and check for sossible leaks

#### DRAIN USED COOLANT TANK

- Connect clear evacuation hose to long Black drain hose. Connect shop air to machine.
- Turn right valve to Drain RCS Used Tank (Set Used Tank regulator to 10 psi)
- Place the clear hose into a waste tank open ball valve on black hose, the air pressure will force used coolant out of the used coolant tank

## USE OF CONE ADAPTER CAUTION:FLUID MAY BE HOT AND UNDER PRESSURE

Then engine is turned on and running at normal operating temperature when using this system. IMPORTANT!

Turn Exchange regulator all the way counter clock wise to OFF and Remove the filler cap on the coolant machine.

- 1) Connect the Red and Black hoses to the cone adapter (with valves in the closed position)
- 2) If required attach the clear hose provided into the end of the rubber cone.
- 3) Turn left valve to OFF position and the right valve to EXCHANGE VEHICLE FLUID position (Set used tank vacuum regulator to -25in). Remove radiator or overflow tank cap and place the rubber cone tightly in the hole, then open the valve on the BLACK hose
- 4) When a sufficient amount of fluid has come out, close the Black hose valve and open the valve on the RED hose valve
- 5) If required, top up fluid by closing filler cap on coolant machine, turn the right valve to exchange vehicle fluid position and set the Exchange regulator to 15-17 psi.

### Valve Quick Reference Guide





