# **Radiator Cooling System Cleaner**

WCS-9800

Operation Manual Book

#### 1. Attentions

- 1.1. Read the Manual Book carefully and fully understands it before use.
- 1.2. Operator should wear goggles and gloves to prevent the liquid spatter on the eyes and skin.
- 1.3. Before cleaning operation, check and confirm no leakage in water tank, water line and body.
- 1.4. Open water tank only under liquid cooling of water tank to protect from boiling.
- 1.5.Protecting from over pressure to damage water tank of vehicle, Air and water pressure must be less than 0.2Mpa.

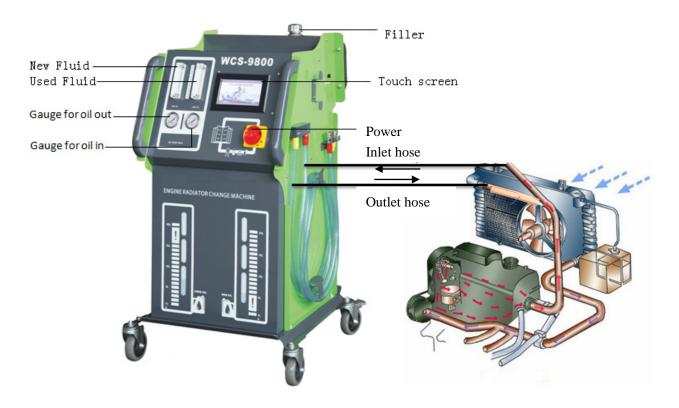
#### 2. Features

- 7-inch LCD touch screen display. color observation window design.
- Function with Cycle cleaning; Filling; Recovery of used fluid; Extraction coolant;
- Shortage fluid alert
- Intelligent electronic control the full automatic equivalent change of new/used fluid.

Power supply: 220V-250w
Pressure gauge: 0~2kg/cm²
Fluid outlet hose: 2.5 m
Fluid return hose: 2.5 m

• New/used fluid tank: 20L×2

#### 3. Structure



# **Detailed operation Main menu panel function**

Charge: Charge new coolant fluid into engine.

**Recovery**: Draw back used coolant fluid from engine.

**Cleaning**: Circulate clean engine radiator cooling Systems.

Equivalent exchange: Synchronous charge new liquid and recycle used fluid.

Empty coolant fluid tank: Empty new/used fluid tank.

**System setting**: Machine parameter setting.

# 4. Operating process

### preparation

Add enough new coolant to the new water tank of the machine.

Connect the machine to DC12V battery of the vehicle.

## **Pipe connection**





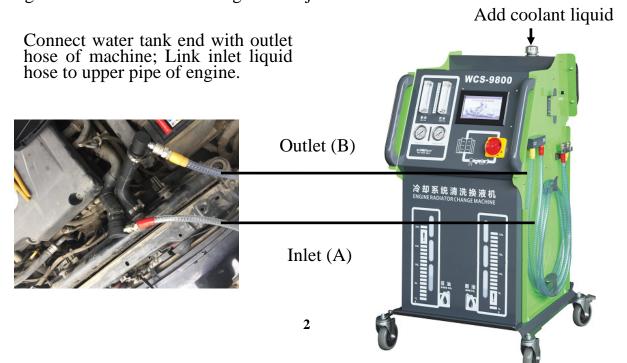
**R**emove the radiator upper pipe Choose the proper rubber hose from the toolbox





Tighten the hose

Tighten the joint into the hose



## **Circulation cleaning**



Confirm the engine off and in cooling state. Fill the cleaning agent into the water tank of engine and tighten the cover.

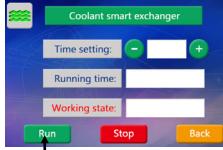


Turn on the power

Enter the operation interface







Start the engine. When liquid appears in the inlet hose A start the machine. (Adjusted water pressure must be less than 0.1Mpa). Select circulation on the LCD screen. Circulation realized between the engine and the machine.

The coolant amount to fill into the machine and running time is as following direction

Vehicle's cylinder No.	Added fluid (Lit.)
3cylinders	4
4 or 6cylinders	6
8 cylinders	8

Vehicle's cylinder No.	Time(min.)
3 cylinders	10
4 or 6cylinders	15-20
8 cylinders	25-30

#### Coolant fluid exchanged



Start the engine. When liquid appears in the inlet hoseA start the machine. (Adjusted water pressure must be less than 0.1Mpa). Select exchange on the LCD screen. Click run (press +, - to adjust pump pressure). New/used coolant fluid exchanged realized between the engine and the machine.

Compare with the new and used fluid's color through the windows, when the color of new and used fluid is closed in windows that means the exchange finished. Turn off the engine and the machine.



- \*Recover the original connection after the engine is cooling. Check the antifreeze fluid is enough, if not add to full.
- \*Start the engine and confirm there's no leakage. Turn off the engine.
- \*Drain used fluid from small water tank of vehicle and refilling new antifreeze fluid.
- \*Observe to the temp. of the vehicle during the engine running, stop engine immediately and troubleshooting if high temperature appears.
- \*Discharge the used fluid in time.

## Add coolant



Fill the tank with coolant

Coolant smart exchanger



Screw on the cap and test running for one minute, check leakage

# Empty the used and new liquid tanks of the machine

