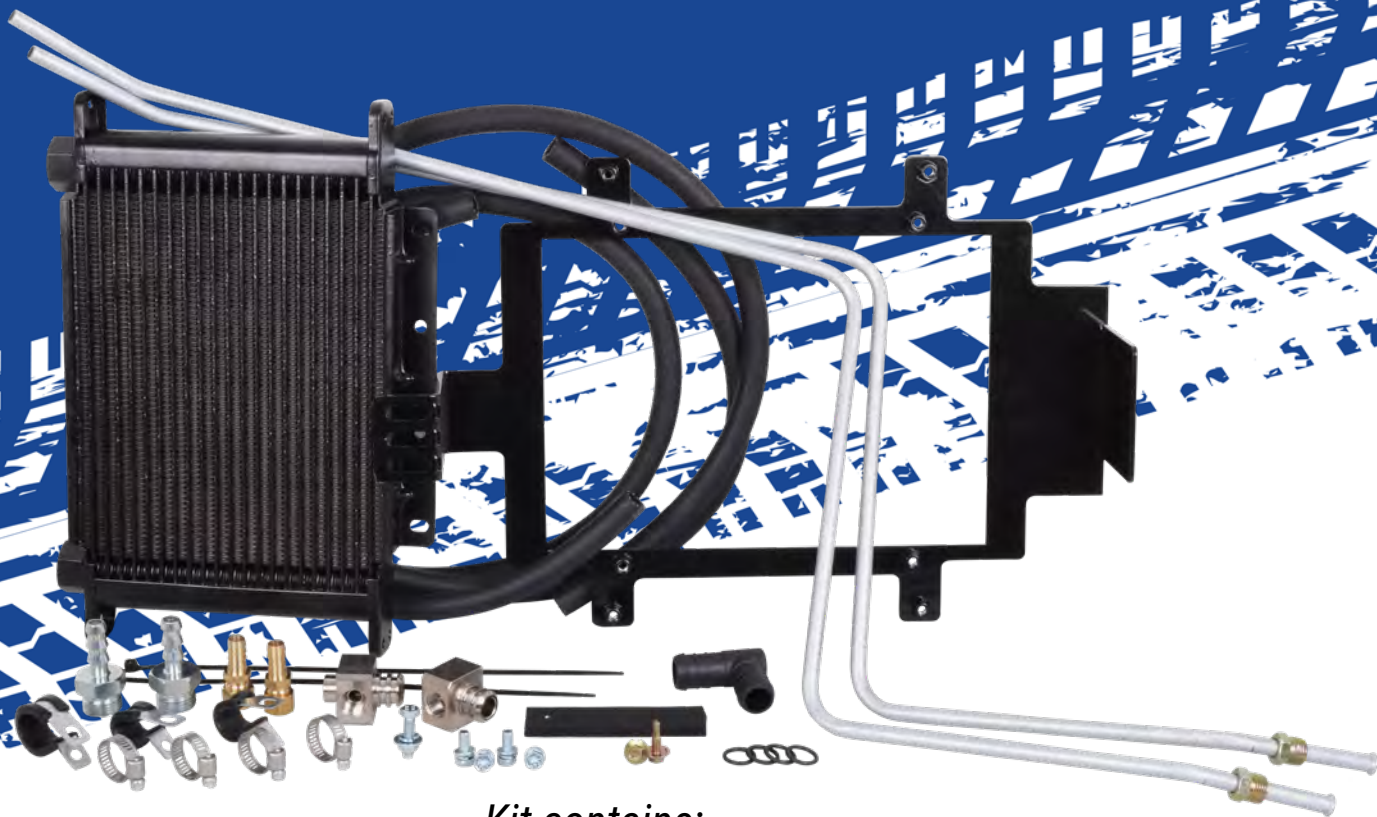


# COOLMASTER *OffRoad*

## Fitting Instructions

Part Nº **49491KS**



### Kit contains:

- Powder Coated Steel Bracket
- Extra Large High Flow Cooler
- 2 Cooler Fittings
- 2 meters Cooler Hose
- 2 Steel Lines
- 2 Heat Exchanger Fittings
- 4 O-rings for Heat Exchanger Fittings
- 4 Hose Clamps
- 90 degree fitting
- 4 M6x16 SEMS Bolts
- M6x25 Hex Bolt
- Nut
- Flat Washer
- Spring Washer
- 2 Self-Tapping Hex Screws
- 6 300mm Cable Ties
- 2 13mm P Clamps
- Support Bracket
- Instructions

## Quick mount for vehicles without bull bars

1. Remove front grille to expose condenser area. **(Pic 1)**
2. Remove bottom bash plate. **(Pic 2)**



**Pic 1**



**Pic 2**

3. Mount bracket using M6x25 bolt onto radiator support as illustrated. The cooler does not have to be mounted at this stage. **(Pic 3)**

Some models may be fitted with power steering lines in this position. Take care when sliding bottom of the bracket over or under these pipes, they do flex so installation should not be prohibited. Foam pads provided in these kits should be placed between the bottom section of the bracket and these lines. **(Pic 4)**



**Pic 3**



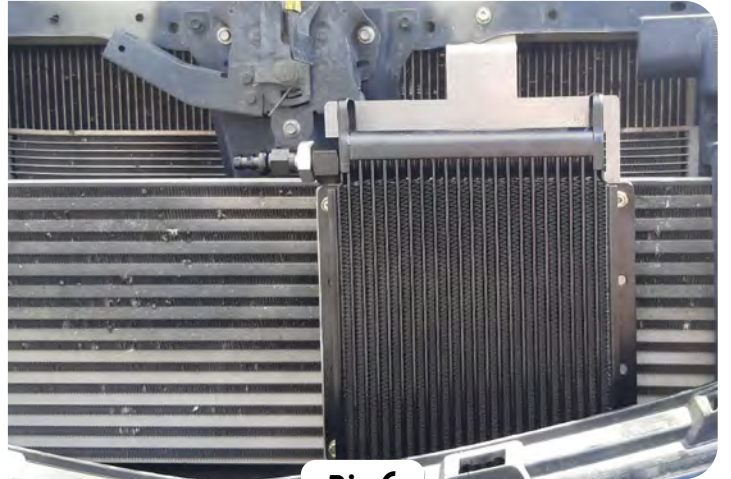
**Pic 4**

4. Mount bottom side of the bracket as shown on **Pic 5**. Slide till the tip of bracket reaches lip. Using self-tapping hex screws provided secure the bracket to this point.

5. Now install your fittings to the cooler using two spanners, then mount the cooler to the bracket using M6x16 bolts as shown with fittings facing the drivers side of the car. **(Pic 6)**



Pic 5



Pic 6

6. Remove front bolts from the front driveshaft and let shaft sit down to expose heat exchanger.
7. Remove heat exchanger retaining bolt to transmission, keep retaining bolt and bracket to secure new fittings. Crimp water lines to prevent coolant loss. Remove and discard the heat exchanger. **(Pic 7)**



Pic 7

Retaining Bolt

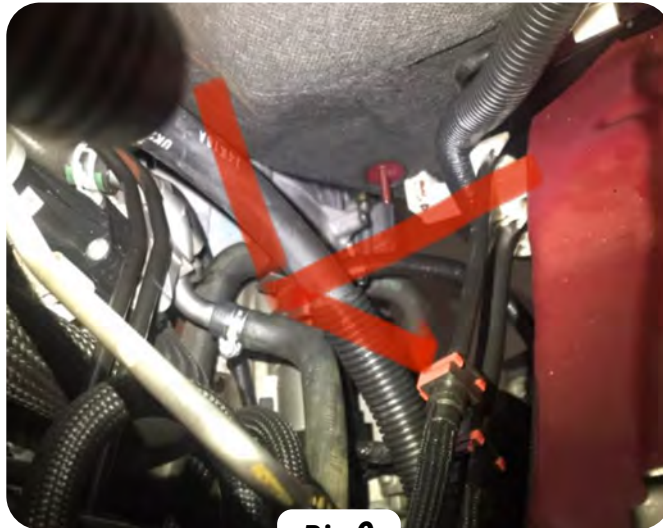
Mounting Bracket



Pic 8

8. Loop heater hose from the engine to heat exchanger with 90-degree fitting supplied **(Pic 8)**. Secure with hose clamps. \* Hose clamps not provided use clamps of your choice.

Alternatively, you can loop existing hoses - see steps 9 and 10. **(Pic 9)**



**Pic 9**

9. Remove short hose from the cooling system.
10. Cut as required long hose from the cooling system to heat exchanger until it forms a neat loop when connecting to both sides of cooling system pipes as shown. Secure with hose clamps. \* These hose clamps are not provided.
11. Fit new fittings with o-rings supplied to case and refit existing mounting bracket (do not completely tighten bracket at this point). **(Pic 10)**

**Attention:** Before mounting transmission pipes into heat exchanger fitting, you must bench fit first. It is best to screw it in tight and undo 3 or 4 times before tightening it for final time this will help the end of the cooling pipe seat inside the fitting. It is recommended to use thread sealer for final fitment.

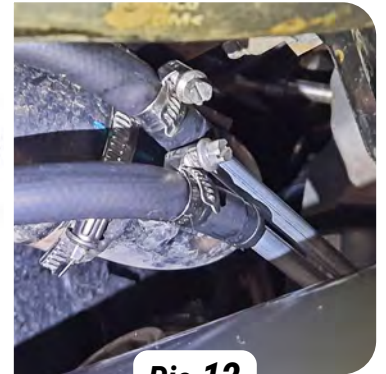
12. Fit new steel lines supplied finger tight, use mounting bracket and "P" clamps to support cooler lines from engine sump. **(Pic 11)**
13. Tighten lines into fittings. Once correct angle has been achieved completely tighten fitting support bracket. Manipulate cooler lines if required so they are not rubbing anywhere.



Pic 10



Pic 11



Pic 12

14. Install rubber hose from steel line to cooler fittings, cutting to length required. Clamp hose to cooler fittings. Use cable ties to secure if needed. **(Pic 12)**
15. Start vehicle and check for oil leaks and top up transmission oil (to manufacturer's specification).
16. Check engine coolant level and top up if required.
17. Road test vehicle and recheck above.
18. Replace all covers and ensure no rubbing on hoses and pipes.