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## **Document:** 19-0172 **Support**: info@radiumauto.com

CATCH CAN KIT BMW 135i/335i/535i, N54

**INSTALLATION INSTRUCTIONS** 

STEP	TOOLS NEEDED	INSTRUCTIONS	РНОТО
1		For safety purposes, open the trunk and disconnect the battery's negative terminal. Prop the hood. Remove the 2 sensors on both sides of the cowl. The RH side sensor requires a quarter-turn to release. Pull the wire clips up to disengage, as shown.	
2		Remove the access covers on both sides of the cowl, find the locking tabs found on the rear side. Gently lift the rear portion then the front will "pop- off".	
3	8mm Socket Wrench	Remove the cabin filter by unbolting the 6 perimeter fasteners. There are 2 on each side and 2 in the front.	
4		Unlatch the front electrical carrier that runs from left to right in front of the cowl, grab the plastic assembly and gently pull forward to release, as shown.	

5	Flat Head Screwdriver	Unlatch the rear electrical carrier, by inserting a flat blade or electrical pick into each of the 3 slots shown. Gently pry the locking tab downwards and simultaneously pull forward to release one at a time.	
6	8mm Socket Wrench	Remove the two 8mm hex head screws on the outer areas of the cowl.	
7		Remove the cowl from the vehicle by lifting the front side upwards and then gently pulling forward, as shown.	
8	5mm Allen Wrench	Remove the four M6 bolts that secure the engine cover to the valve cover. There are 2 bolts in the front and 2 bolts in the rear.	
9		Lift the electrical carriers and the engine cover upwards at the same time. Pull the engine cover out from underneath the electrical carrier and remove from the vehicle.	
10	Flat Head Screwdriver	Find the vent hose on top of the rear of the engine. Unplug the sensor by carefully using a mini flat blade screwdriver or electrical pick to pry the locking tab. Pull the sensor out as shown.	

11	Flat Head Screwdriver	Unlatch the elbow from the intake hose by prying the front locking tab (shown) and rear locking tab (not shown) using a flat blade screwdriver as shown. Simultaneously pull the elbow upwards to release.	
12	Flat Head Screwdriver	This step is optional, but it makes the following step easier. On the opposing side of the vent hose is the valve cover vent port. The vent hose is attached to the port via a 4 prong locking connector. Using a flat blade, pry the tabs outwards and simultaneously pull the vent hose rearward to release.	
13	Flat Head Screwdriver	Place the vent hose onto a workbench and remove the elbow from the hose by carefully prying the 4 tabs outwards while simultaneously pulling to release, as shown.	
14	10mm Socket Wrench	Find the power steering reservoir in the front LH side of the engine bay. NOTE: the reservoir may look slightly different than pictured depending if the vehicle has active steering. Remove the 2 nuts and washers that mount the reservoir but leave the bracket installed. NOTE: The OEM nuts will be resued. The washers will be replaced by the Radium catch can mounting bracket.	
15	Light Oil 1" Wrench Thread Locker 3mm Allen Wrench	Lubricate the 10AN ORB fitting and install to the catch can side port. Apply a medium strength thread locker to the four included M5 screws. Install the mounting bracket to the catch can and tighten the screws. BANJO FITTING NOTES: 1. For kits manufactured prior to August 2020, a green banjo fitting is included (shown). Rotate the banjo just enough that it will not interfere with the dipstick. Tighten using a 1-1/8" socket. 2. For kits manufactured after August 2020, a stainless steel banjo fitting is included (not shown). Tighten using a 6mm Allen wrench.	
16	10mm Socket Wrench	Lineup the 2 catch can mounting holes to the OEM reservoir mounting studs. Drop the catch can assembly down and place onto the OEM rubber grommets. Reinstall the 2 OEM locking nuts. Do NOT reuse the OEM washers.	

17	Hose Cutter Light Oil	Cut the included rubber PCV hose in half. Lubricate the PushLok barbs of one of the included straight -10AN hose ends. Fully seat the hose end into one of the rubber PCV hoses, as shown. Lubricate the barbs of the 180 degree PushLok hose end fully install it into the other rubber PCV hose (NOT the hose from above). NOTE: hose clamps are not required on PushLok connections. Install the included BMW male fitting adapter into the 180 degree hose end and hand tighten.	
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19	Light Oil 2.5mm Allen Wrench	Lubricate the O-ring on the included Radium BMW male adapter fitting (from previous step) and fully install it into the OEM BMW elbow. Lineup the 2 bolt holes on the Radium BMW lock to the Radium BMW male adapter fitting threads. Be sure the edge of the Radium BMW lock is up against the edge of the OEM BMW elbow barb. To secure the connections, install the 2 provided bolts and tighten.	
20	Light Oil 1" Wrench	Reinstall the OEM BMW elbow back onto the intake pipe. Apply light oil to avoid damaging the OEM O-ring. Make sure the OEM plastic lock has engaged, as shown. Rotate the 180 degree hose end around as shown and run the PCV hose along the engine's intake side towards the catch can side fitting. Tighten the connection at the 180 degree hose end with a non marring 1" wrench. Reinstall the electrical connector, as shown.	
21	1" Wrench Adjustable Wrench	Install the BMW female adapter fitting onto the other hose wih the straight hose end and tighten, as shown.	
22	Light Oil	Apply light oil to the OEM vent hose O-ring. Press the included Radium BMW female adapter fitting into the OEM vent hose connection until the lock engages. Run the PCV hose around the intake towards the catch can top fitting. Lubricate the OEM vent hose O-ring and reinstall it along with the new hose back onto the valve cover, as shown.	

23	Hose Cutter Light Oil	Temporarily install both provided straight -10AN hose ends to the catch can fittings. Use the included zip ties to secure the rubber PCV hoses. NOTE: The OEM crankcase vent plumbs to the catch can top port. The catch can side port plumbs to the turbo inlet intake tube. Measure each rubber PCV hose and cut to length. Remove the hose ends and lubricate the PushLok barbs. Fully seat the hose ends into the rubber PCV hoses. NOTE: hose clamps are not required on PushLok connections.	
24	1" Wrench Diagonal Cutter	Install the hose assemblies to the approriate catch can fitting. Position the hoses around the surrounding components to avoid chafing and tighten the hose ends and zip ties. Cut the long zip tie tails.	
25		Recheck that all connections are tight. Reinstall all OEM components in reverse order. Start the engine and confirm there are no leaks. INSTALLATION COMPLETE SERVICING: All engines and applications are unique. Unscrew and check the catch can's oil dipstick regularly until an appropriate service interval is found for the specific engine. If necessary, the catch can may be disassembled and cleaned with a mild degreaser. Never empty the catch can contents back into the engine. The contents should be disposed of the same way as engine oil.	