



INSTALLATION INSTRUCTIONS

BAFFLED OIL CAP

GM V8 Engines

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Kit # 20-0539, 20-0588, 20-0587

Document: 19-0324

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STEP	TOOLS NEEDED	INSTRUCTIONS	PHOTO
1	Oil Lubrication	20-0539 OIL CAP, GM	
	3/8" Allen Wrench	Lubricate the O-ring found on the 10AN ORB plug.	
		Secure the 10AN ORB plug to the Radium Engineering oil cap.	
2		Pop the hood and find the oil cap. Depending on the vehicle, this can be on the RH or LH side of the engine in the front or rear.	
		Spin counterclockwise and pull up to remove the OEM oil cap.	
3		Spin the Radium Engineering cap clockwise to install.	
		NOTE: If the OEM oil cap receiver only has one insertion tab, the Radium Engineering oil cap can be installed in 2 different orientations (180 degrees apart). Some OEM oil cap receivers have 2 dissimilar insertion tabs and can only be installed 1 way.	
		INSTALLATION COMPLETE	
4	Oil Lubrication	20-0588 BAFFLED OIL CAP VTA KIT, GM	
	1" Wrench	Lubricate the O-ring found on the 10AN ORB to barb fitting.	
		Secure the 10AN ORB to barb fitting to the Radium Engineering oil cap.	

5	<p>Flathead Screwdriver</p> <p>Insert and secure the air filter to the 10AN ORB to barb fitting.</p>	
6	<p>Pop the hood and find the oil cap. Depending on the vehicle, this can be on the RH or LH side of the engine in the front or rear.</p> <p>Spin counterclockwise and pull up to remove the OEM oil cap.</p>	
7	<p>Spin the Radium Engineering cap clockwise to install.</p> <p>NOTES: If the OEM oil cap receiver only has one insertion tab, the oil cap can be installed in 2 different orientations (180 degrees apart). Some OEM oil cap receivers have 2 dissimilar insertion tabs and can only be installed 1 way. INSTALLATION COMPLETE</p> <p>WARNING: If ever degreasing the engine, be sure to cover the air filter to prevent any foreign liquids from entering the engine.</p>	
8	<p>20-0587 BAFFLED OIL CAP VTE KIT, GM</p> <p>NOTE: Because of RHD and LHD variations, the terms "driver-side" and "passenger-side" will NOT be referenced. As depicted, these instructions will always reference "LH" and "RH".</p>	
9	<p>10mm Socket Wrench</p> <p>Open the trunk.</p> <p>On the RH side, remove the battery cover.</p> <p>Disconnect the negative battery terminal, as shown.</p>	
10	<p>At the front RH side of the engine, there is a short hose that loops from the crankcase to the intake manifold.</p> <p>If applicable, remove any potential obstruction to gain access to this area.</p>	

11	Pliers	Early GEN III engines use barbed connections. Simply pull off to remove.	
	Flat Head Screwdriver	Late GEN IV engines use SAE quick connections (shown). Gently pry and rotate the SAE locks. Simultaneously pull each connection to release, as shown.	
12		As shown, pull the OEM hose out. This will NOT be reused.	
13	Needle Nose Pliers	For early GEN III engines, the crankcase simply vents through the lower port which is connected to the rear valve covers.	
		For late GEN IV engines, GM replaced the mechanical PCV valve with a small 2.5mm fixed orifice integrated into the lower port. Without a PCV valve, pressure (equal to or greater than atmospheric pressure) will flow into the crankcase. This is undesirable making this port useless.	
		As shown, gently clasp the rubber cap included in the kit using long needle nose pliers.	
14		Push the appropriate rubber cap all the way onto the lower port on the engine as shown.	
15	Oil Lubrication	Lubricate the O-ring found on the provided 10AN ORB to PCV valve fitting. Install the PCV valve to the Radium Engineering oil cap, as shown.	
	1" Wrench		
16		Pop the hood and find the oil cap. Depending on the vehicle, this can be on the RH or LH side of the engine in the front or rear.	
		Spin counterclockwise and pull up to remove the OEM oil cap.	

17	<p>Spin the Radium Engineering cap clockwise to install.</p> <p>NOTE: If the OEM oil cap receiver only has one insertion tab, the Radium Engineering oil cap can be installed in 2 different orientations (180 degrees apart). Some OEM oil cap receivers have 2 dissimilar insertion tabs and can only be installed 1 way.</p>	
18	<p>Pliers</p> <p>For late GEN IV engines, insert the provided SAE quick connect fitting into the hose and secure using a spring clamp.</p>	
19	<p>Fully insert the hose onto the (upper) intake manifold.</p>	
20	<p>Hose Cutter</p> <p>Temporarily install the 90 degree PushLok hose end to the 6AN male portion on top of the PCV valve.</p> <p>Strategically route the hose tightly around the engine towards the hose end.</p> <p>Line up the hose and cut it to a length that will still permit the oil cap from spinning ON/OFF.</p>	
21	<p>Lubrication</p> <p>Remove the PushLok hose end and lubricate the barbed end, as shown.</p>	
22	<p>Fully insert the 90 degree PushLok hose end to the hose.</p> <p>NOTE: PushLok hose ends do NOT require hose clamps.</p>	

23

11/16" Wrench

Screw on the PushLok hose end to the PCV valve and tighten using a non marring aluminum wrench. Reinstall all components in reverse order.

SERVICING

This kit does not need much attention. Occasionally, check the stainless steel media inside the oil cap. If it ever becomes clogged, a mild degreaser can be used.

INSTALLATION COMPLETE