



PREVOST

**SAFETY
RECALL**

SR19-31C

DATE :	December 2019	SECTION :	01 ENGINE
SUBJECT:	ENGINE CONTROL MODULE (ECM) SOFTWARE UPDATE - Engine Cooling Strategy in High Altitude Operation		

Revision C

VIN range in application box rearranged for H3 coaches

Nov 23-21

APPLICATION

IMPORTANT NOTICE TO SERVICE CENTERS <i>Verify vehicle eligibility by checking warranty bulletin status with SAP or via ONLINE WARRANTY SYSTEM available on Parts and Service / Warranty tab of PrevoSt's website.</i>	
Model	VIN
X3-45 VIP motorhomes Model Year: 2017 & 2019	 2PCBS349X <u>HC736199</u> 2PCBS3499 <u>KC736377</u>
X3-45 VIP commercial use Model Year: 2017 - 2020	Specific vehicles within the following range From 2PCCS3498HC73 <u>6187</u> up to 2PCCS3492LC73 <u>6517</u> incl.
X3-45 coaches Model Year: 2017 - 2020	Specific vehicles within the following range From 2PCG33491HC73 <u>6188</u> up to 2PCG33494LC73 <u>6520</u> incl. From 4RKG33494J973 <u>7448</u> up to 4RKG33490L973 <u>7689</u> incl. and 2PCS33496J <u>C736297</u>
X3-45 Commuter Model Year: 2019	2PCJ33491 <u>KC736432</u>
H3-41, H3-45 coaches Model Year: 2018 - 2020	Specific vehicles within the following range From 2PCH33493J <u>C710086</u> up to 2PCH33493J <u>C710184</u> incl. From 2PCH33493K <u>C710185</u> up to 2PCH33494LC72 <u>0922</u> incl.
H3-45 VIP motorhomes Model Year: 2019 - 2020	2PCVS3498K <u>C710477</u> 2PCVS3494K <u>C720651</u> 2PCVS3491K <u>C710501</u> 2PCVS3497L <u>C720838</u> 2PCVS349XK <u>C720573</u>
This Safety Recall does not necessarily apply to all the above-mentioned vehicles, some vehicles may have been modified before delivery. The owners of the vehicles affected by this recall will be advised by a letter indicating the Vehicle Identification Number (VIN) of each vehicle concerned.	

PART 1 – ENGINE SOFTWARE UPDATE

DESCRIPTION – PART 1

Part 1 of this safety recall applies to all the vehicles listed in the application table of the front page on which a notification identified SR19-31: PART 1- ENGINE SOFTWARE UPDATE exists.

On determined vehicles equipped with Green House Gas 17 (GHG17) or OBD18 Volvo D13 engine, perform the latest software update of the Engine Control Module.

Please contact your nearest Prevest Service Center or Prevest service manager and schedule an appointment to have the required software update applied.

SOFTWARE TOOL NEEDED

Description
Latest version of Premium Tech Tool (PTT) with appropriate communication interface equipment

PROCEDURE



DANGER

Park vehicle safely, apply parking brake, stop the engine.

Lock out & Tag out (LOTO) must be performed during set-up, maintenance or repair activities. Refer to your local procedure for detailed information regarding the control of hazardous energy.

1. Connect the vehicle's battery charger to a 120-Volt outlet.

2. Connect Premium Tech Tool (PTT) to the vehicle On-Board Diagnostics connector (OBD). Connect the PC to a functional LAN or Wi-Fi connection and a power source.

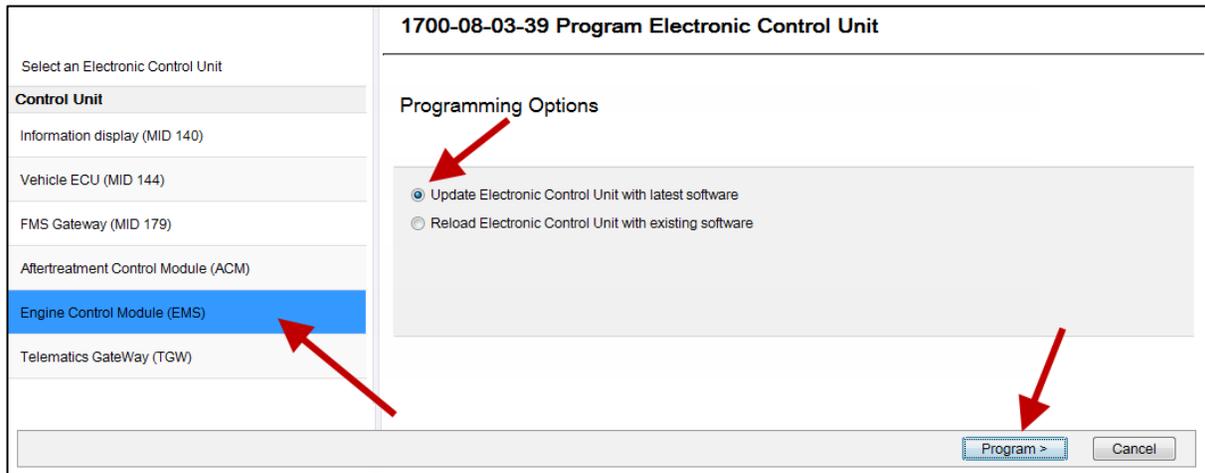
3. Turn the ignition switch to “ON”. Activate the hazard warning flashers to prevent the vehicle from entering sleep mode.

4. Log in to PTT.

5. On **Product** tab (item A), identify the vehicle (item B).

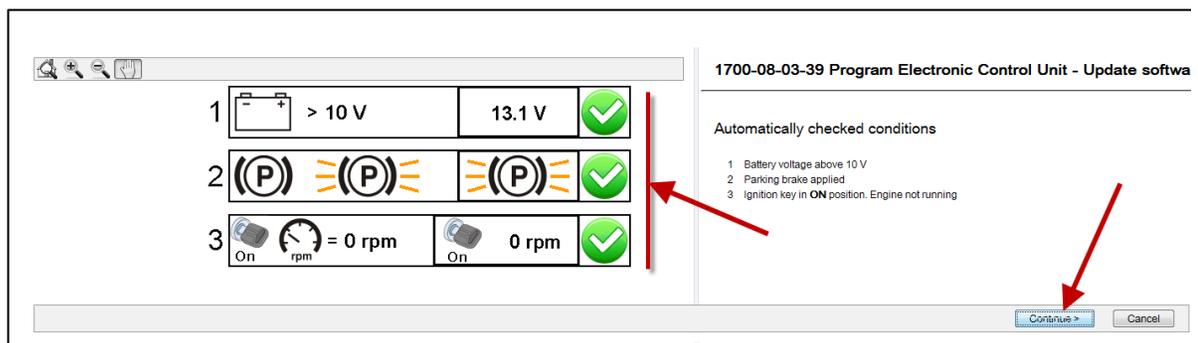
6. Select **Program** tab and then **1700-08-03-39 Program Electronic Control Unit**. Click **Start**.

7. Select **ENGINE CONTROL MODULE (EMS)**.
8. Select the following programming option "Update Electronic Control Unit with latest software".
9. Click **Program** button.



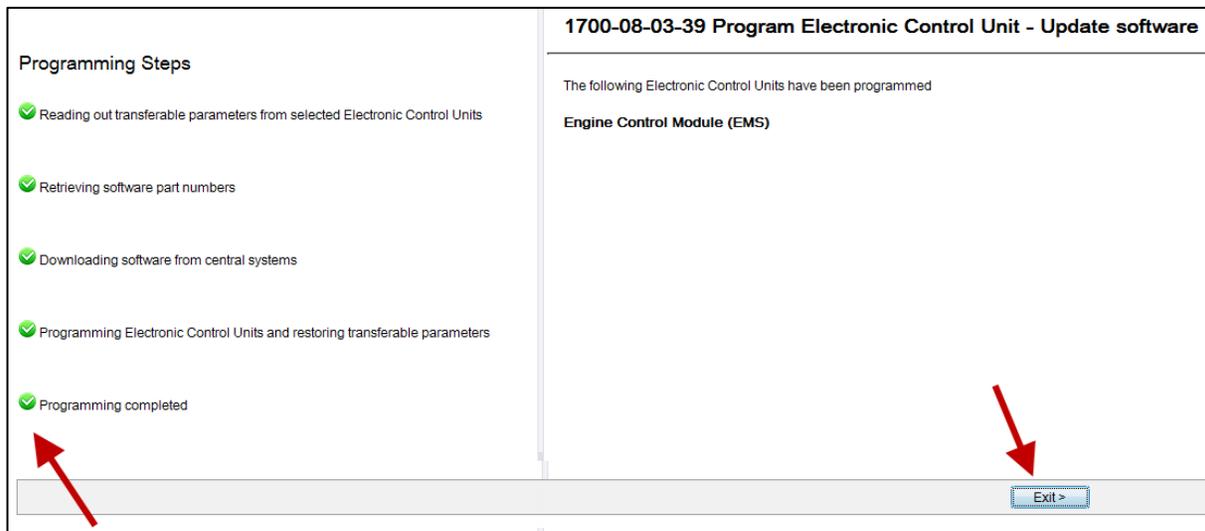
10. Certain conditions must be met to allow programming:
 - I. battery voltage above 10 Volts;
 - II. parking brake applied;
 - III. ignition key in ON position and the engine is not running.

When all conditions have been met, click **Continue** to proceed with programming.



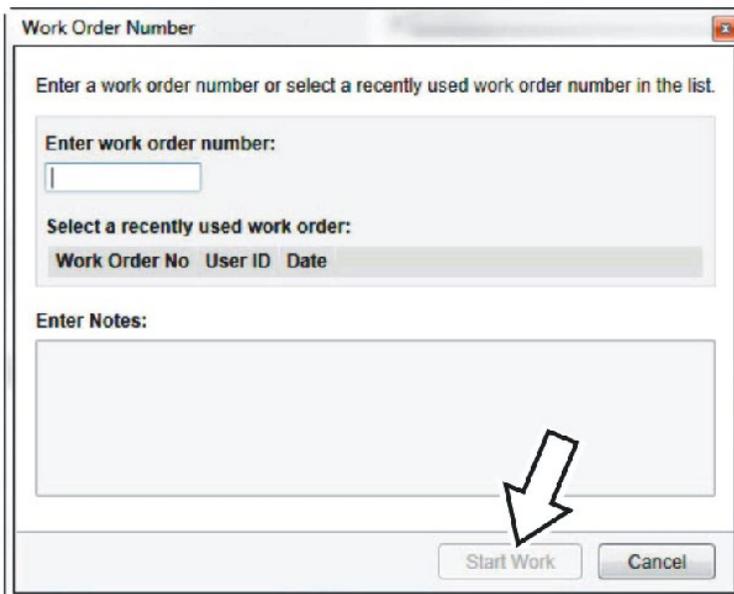
11. Wait until all Programming Steps check turn to green color (Programming completed).

12. When the programming is complete, click **Exit** button.



13. Clear any diagnostic trouble codes (DTC).

14. Enter the Work Order Number information and then click Start Work.



WARRANTY – PART 1

Part 1 of this safety recall is covered by Prevost's normal warranty. We will reimburse 1/2 hour (0.5) of labor upon receipt of a warranty claim. Please submit claims via our Online Warranty System, available at www.prevostcar.com (under Service \ Warranty section). Use Claim Type: "Bulletin/Recall" and select "Warranty Bulletin SR19-31".

OTHER

VBC Bulletin	N/A
Fail Code	01.00-2
Defect Code	49
Syst. Cond	R
Causal Part	3092091

Access all our Service Bulletins on
<http://techpub.prevostcar.com/en/>
or scan the QR-Code with your smart phone.



Are you a vehicle owner? E-mail us at
technicalpublications_prev@volvo.com and type "ADD" in the
subject to receive warranty bulletins applicable to your vehicle(s)
by e-mail.

PART 2 – CYLINDER LINER AND PISTON REPLACEMENT

DESCRIPTION – PART 2

PART 2 of this safety recall applies only to the vehicles listed in the application table of the front page on which a notification identified SR19-312*: PART 2-LINERS & PISTONS REPLAC exists. These vehicle mileage equals or exceeds 100 000 miles (160 000 km) at the launch of this campaign.

* SR19-312 stands for SR19-31Part2

IMPORTANT NOTICE TO SERVICE CENTERS

*Verify vehicle eligibility by checking warranty bulletin status with **SAP** or via **ONLINE WARRANTY SYSTEM** available on Parts and Service / Warranty tab of Prevost's website.*

On determined vehicles equipped with Green House Gas 17 (GHG17) or OBD18 Volvo D13 engine, perform the replacement of the **liner and piston of all six (6) cylinders**.

Refer to Impact for the procedures, torque and good practice guidelines.

Suggested procedures:

ID 2171-03-02-01 Oil Pan, Replacement

ID 2131-03-03-01 Cylinder Liners and Pistons, Replacement (All)

ID 2111-03-03-03 Cylinder Head, Replacement

Other procedures found on Impact that may be useful:

2515-03-03-02 Exhaust Manifold, Replacement

2115-03-03-01 Sealing Strip, Valve Cover, Replacement

2373-08-03-04 Common Rail, Fuel Leak Test

Kit SR19-31 includes the following parts:

#	STEP	DESCRIPTION	PART NO	QTY
OIL PAN		Use the following Impact procedure for reference: 2171-03-02-01 Oil Pan, Replacement		
1	3	oil pan seal	21293367	1
2		gasket, magnetic plug	20579690	1
LINERS & PISTONS		Use the following Impact procedure for reference: 2131-03-03-01 Cylinder Liners and Pistons, Replacement (All)		
3	6	cylinder liner kit (for 6 cylinders)	22724238 or 23775630	1
		or cylinder liner kit (for 1 cylinder)	22565407	6
4	23	bolt, piston jet	994445	6
5	25	fastener, stiffening frame	969445	24
6	25	gasket, oil pickup tube	22275838	2
7	25	fastener, oil pickup tube	994451	3
8	25	sealing ring, oil circuit, pipe on stiffening frame	21092243	4
9		connecting rod bearing shells kit	21610676	6
CYLINDER HEAD		Use the following Impact procedure for reference: 2111-03-03-03 Cylinder Head, Replacement		
10	187	gasket, cylinder head	21510072	1
11	196	screw, cylinder head	21345131	38
12	201	Timing gear plate screw	994447	6
13	209	seal, engine brake control valve	20526428	1
14	227	screw, sensor wheel	8192804	8
15	236	O-ring, injector kit (upper groove O-ring violet)	276948	6
16	241	screw, injector	21344774	6
17	268	pressure pipe, common rail	23000880	1
18	270	pressure pipe, common rail right	23000879	3
19	268	pressure pipe, common rail left	23000870	3
20	281	gasket, timing gear cover	21447682	1
21	295	O-ring, impulse sensor cam speed sensor	20966752	1
22	301	pipe, Volvo engine brake	22782247	1
23	339	gasket, valve cover & spacer	22777560	2
24	350	seal, thermostat	21503575	1
25	350	seal, thermostat I-Shift	975675	2

#	STEP	DESCRIPTION	PART NO	QTY
26	356	gasket, water manifold	21298915	1
27		sealing ring, water manifold	1547254	2
28	365	plane gasket, starter element, mixing camber	3979639	2
29	381	gasket, EGR valve	20850815	1
30	381	sealing ring, EGR valve	20841816	2
31	383	screw & sleeve, EGR valve	21528673	4
32	385	O-ring, EGR valve oil return hose	976014	1
33	385	seal/gasket, EGR valve oil supply hose	976014	1
34		O-ring, EGR coolant return pipe	1547253	2
35	389	V-clamp, EGR valve	20755169	2
36	392	seal, oil return pipe	21940615	1
37	395	turbocharger installation kit	85137676	1
38		seal, banjo coolant turbo act supply	947281	2
39		sealing ring, rubber (use as required)	1547252	1
40		sealing ring, banjo fitting (use as required)	20852765	2
41		V-clamp EGR crossover hot side	20504408	2
42		O-ring EGR crossover hot side	967343	2
43		V-clamp turbo to CAC pipe interface	20592787	1
44		O-ring, V-clamp turbo to CAC pipe interface	21096684	1
45		seal, transmission dipstick	571662	1
46		straight coupling, EGR crossover pipe	22889034	1
OTHER PARTS				
47		V-clamp, on Prevost exhaust pipe at flexible & at DPF	21021850	3
48		seal ring, on Prevost exhaust pipe at flexible & at DPF	21095726	3
49		oil filter, bypass	21707132	1
50		oil filter, long life	21707133	2
51		cable tie, nylon BLK (STD)	504637	30
52		cable tie, nylon (50 POUNDS)DOUBLE LOOP	507664	20
53		cable tie, nylon	G5007996	40
54		V-clamp, turbo outlet diffuser interface with Prevost pipe	21060426	1
55		gasket, turbo outlet diffuser interface with Prevost pipe	21095721	1
56		gasket, inlet elbow interface with mixing box	1675066	1
57		V-clamp inlet elbow interface with mixing box	20592783	1

NOTE

Material can be obtained through regular channels.

PART DISPOSITION

DO NOT RETURN THE REPLACED PARTS. Discard waste according to applicable environmental regulations (Municipal/State[Prov.]/ Federal)

WARRANTY – PART 2

This modification is covered by Prevost’s normal warranty. We will reimburse you the parts and up to 50 hours of labor upon receipt of a completed A.F.A. Please submit claim via our Online Warranty System, available at www.prevostcar.com (under service \ warranty section). Use Claim Type: “Bulletin/Recall” and select “Safety Recall SR19-31 ”.

Should you only wish to close the safety recall (without reimbursement), fill-in the “Safety Recall Certification Sheet” provided with this bulletin and return it to our warranty department by email at prevost.onlinewarranty@volvo.com or by fax at 418-831-9301.

OTHER

VBC Bulletin	N/A
Fail Code	01.00-2
Defect Code	09
Syst.Cond	R
Causal Part	22724238

Access all our Service Bulletins on <http://techpub.prevostcar.com/en/> or scan the QR-Code with your smart phone.
E-mail us at technicalpublications_prev@volvo.com and type “ADD” in the subject to receive our warranty bulletins by e-mail.



