Subject: GHG17 & GHG21 Detroit™ DD13, DD15, and DD16 ACM Software Reprogramming

Models Affected: GHG17 & GHG21 Detroit™ DD13 471.928, DD15 472.910, and DD16 473.910 vehicles built between January 2018 and July 2020

General Information

Daimler Trucks North America LLC, on behalf of its Detroit Powertrain Division, is initiating Field Service Campaign D20M8 to modify the vehicles mentioned above with ACM software 7.61.1.0. This software has been released to improve NOx sensor life. Programming the MCM, ACM, CPC, and TCM to a **MINIMUM** of the software and fuel map version listed below will be necessary for compatibility.

NOTE: Reference 20TS-04 – Detroit™ CPC501T GHG21 Only; Bootloader Update if New Cascadia CPC501T is not at the software level shown in this table.

		Vehicle Model	
		New Cascadia	**All Other Models**
Powertrain Software GHG17 DD13 built after June 5, 2019 & GHG21 DD13	**MCM Software Version**	14.2.1.3 with ZGS 002	14.2.1.3 with ZGS 002
	ACM Software Version	7.61.1.0 ZGS 002	7.61.1.0 with ZGS 002
	CPC Software Version	33.13.00 (CPC302T) & R19.32.00.00A (CPC501T)	R44_00_000A
	TCM Software Version (if equipped)	NAMT191402	NAMT191402

		New Cascadia	**All Other Models**
Powertrain Software 2018-2020 built GHG17 & GHG21 DD15/DD16, GHG17 DD13 DD13 built before June 5, 2019	**MCM Software Version**	6.8.0.1 with ZGS 002 (DD13 ZGS 001)	6.8.0.1 with ZGS 002 (DD13 ZGS 001)
	ACM Software Version	7.61.1.0 ZGS 002	7.61.1.0 ZGS 002
	CPC Software Version	33.13.00 (CPC302T) & R19.32.00.00A (CPC501T)	R44_00_000A
	TCM Software Version (if equipped)	NAMT191402	NAMT191402

The ACM software and fuel maps became effective for all GHG17 & GHG21 DD13, DD15, and DD16 engines, and was released on June 18, 2020. Any GHG17 & GHG21 DD13, DD15, or DD16 Platform engines in vehicles manufactured between January 2018 and July 2020, running older software and fuel map version ZGS, will need to have the ACM reprogrammed. Note that some trucks may already have been reprogrammed and will be excluded from this modification.

Note that the current software and fuel map levels may be higher than the minimum levels shown above.

Work Instructions

Please refer to the attached work instructions. Prior to performing the field service campaign, check the vehicle for a completion sticker (Form WAR261).

Labor Allowance

Table 1 – Labor Allowance D20M8

Procedure	Time Allowed (hours)	SRT Number	Corrective Action
D20M8			
INSPECTION ONLY	0.1 Hours	996-F080A	06 - Inspect
REPROGRAM ONE MODULE	0.3 Hours	996-F080B	12-Repair Recall/Campaign
REPROGRAM TWO MODULES	0.4 Hours	996-F080C	12-Repair Recall/Campaign
REPROGRAM THREE MODULES	0.5 Hours	996-F080D	12-Repair Recall/Campaign
REPROGRAM FOUR MODULES	0.7 Hours	996-F080E	12-Repair Recall/Campaign

Claim Reimbursement

You will be reimbursed for your parts, labor, and handling (landed cost for Export Distributors) by submitting your claim through the Warranty system within 30 days of completing this campaign. Please reference the following information in OWL:

Table 2 – Claim Reimbursement

Claim Type	Field Service Campaign
Campaign (number with appropriate condition code)	**D20M8**
Component Code	**043-007-205**
Cause Code	**A1 - Campaign**
Primary Failed Part	**DDC REPROGRAM3**
Procedure A[1]	
Labor Number	996-F080A **Inspection ONLY**
Labor Hours	0.1 Hours
Part Number	DDC REPROGRAM3
Parts Return	NONE
Use one (1) of the following labor operations if programming was REQUIRED.	

Procedure B[1]	
Labor Number	996-F080B **Reprogram One Module**
Labor Hours	0.3 Hours
Part Number	DDC REPROGRAM3
Parts Return	NONE
Procedure C[1]	
Labor Number	996-F080C **Reprogram Two Modules**
Labor Hours	0.4 Hours
Part Number	DDC REPROGRAM3
Parts Return	NONE
Procedure D[1]	
Labor Number	996-F080D **Reprogram Three Modules**
Labor Hours	0.5 Hours
Part Number	DDC REPROGRAM3
Parts Return	NONE
Procedure E[1]	
Labor Number	996-F080E **Reprogram Four Modules**
Labor Hours	0.7 Hours
Part Number	DDC REPROGRAM3
Parts Return	NONE
[1] Administrative time (SRT 939-6010A) for 0.3 hours is automatically added to the claim.	

IMPORTANT: OWL must be viewed prior to beginning work to ensure the vehicle is involved and the campaign has not previously been completed.

Note: NOx Sensor failures will not be reimbursed on this campaign. If NOx sensor failure was determined, the standard warranty guidelines must be followed. Please review Coverage Information screen in OWL for warranty eligibility at time of the failure.

All claims must be submitted within 30 days of the repair and within 30 days of the termination date of the campaign.

For questions, U.S. and Canadian dealers, contact the Warranty Campaigns Department via Web inquiry at DTNAConnect.com / WSC, or the Customer Assistance Center at (800) 385-4357. Export distributors submit a Web inquiry or contact your International Service Manager.

Field Service Campaign

Copy of Notice to Owner

Subject: Field Service Campaign D20M8

<u>GHG17 & GHG21 Detroit™ DD13, DD15, and DD16 ACM Software Reprogramming</u>

Daimler Trucks North America LLC, on behalf of its Detroit^{TM} Powertrain Division, is initiating Field Service Campaign D20M8 to modify the vehicles mentioned above with ACM software 7.61.1.0. This software has been released to improve NOx sensor life. Failure of the NOx sensor will not be reimbursed under this campaign. For any NOx sensor failures please contact your DTNA/Detroit Diesel authorized repair facility for warranty coverage determination.

The ACM software and fuel maps became effective for all GHG17 & GHG21 DD13, DD15, and DD16 engines, and was released on June 18, 2020. Any GHG17 & GHG21 DD13, DD15, or DD16 Platform engines in Model Year 2018-2020 vehicles, with an engine manufactured between January 2018 and July 2020, running older software and fuel map version ZGS, will need to have the ACM reprogrammed. Note that some trucks may already have been reprogrammed and will be excluded from this campaign.

Records available to us indicate that your vehicle has one of the eligible engines. Instructions for this Field Service Campaign have been sent to your local Detroit Diesel Authorized Repair Facility and the labor time required to perform this software update is approximately **0.7** hours.

Please contact a DTNA/Detroit Diesel Authorized Repair Facility to arrange to have the field service campaign performed. To locate an authorized facility, search online at **https://demanddetroit.com/find-a-dealer/**.

This service will be completed for you at no charge, prior to **August 03, 2021**, under the provisions of this notice.

We are sorry to cause you this inconvenience; however, we have taken this action in the interest of your continued satisfaction with our products.

DETROIT WARRANTY CAMPAIGNS DEPARTMENT

Enclosure

Work Instructions

Subject: Detroit™ GHG17 & GHG21 DD13, DD15, and DD16 ACM Software Reprogramming

Models Affected: Detroit™ GHG17 & GHG21 DD13 471.928, DD15 472.910, and DD16 473.910 vehicles built between January 2018 and July 2020

Corrective Procedure

1. Apply the parking brake, chock the wheels, and perform any other applicable safety steps.

2. You **MUST** use DiagnosticLink® Professional 8.12 Service Pack 1 (*or higher*) when reprogramming. **REFERENCE** DTNAConnect "My Communications" notice dated 07/24/2020 for more information on DiagnosticLink® 8.12 Service Pack 1, or 20CSA-10.

3. Begin the process by connecting DiagnosticLink® to the vehicle. Make sure that all the modules (ACM, CPC, MCM, and if applicable, the TCM) are connected.

> **NOTICE:**
>
> **BEFORE** you begin reprogramming, make sure the VIN is correct in all modules (ACM, CPC, MCM, and if applicable, the TCM). If the VIN is not correct in all modules, you will get an error message when attempting to reprogram.

4. Make sure the VIN is correct in all modules (ACM, CPC, MCM, and if applicable, the TCM) by looking at the "Identification" screen in DiagnosticLink®. If the VIN is not correct in all modules, you can correct the VIN under the Actions drop-down menu in DiagnosticLink® by selecting the "Check VIN Synchronization" item. Select "Start" from this panel and follow the prompts. You will be prompted to cycle the key until the routine has completed. When synchronization is complete, turn the key back on and continue with the download process.

5. On the Identification screen, check the current ACM, MCM, CPC, and TCM (if equipped) software and fuel map levels. Listed in the table on page 1, are the **MINIMUM** levels required. See Figure 1 for an example of the Identification screen for the ACM.
    1. ACM **software 7.61.1.0** and fuel map version **ZGS 002**

UDS-61 ACM21T - Aftertreatment Control Module 2.1

Device Configuration
Fuelmap Part Number   A024 448 82 54 ZGS 002
Certification Number
Software Mode   Running in Application
Application Code   06N04C1621
Application Code Part Number   A0514473854_007

Device Information
Software Version   7.61.1.0
Diagnostic Version   80
ECU Serial Number   16-0B-44-01
Hardware Part Number   A000 446 59 54 ZGS 002
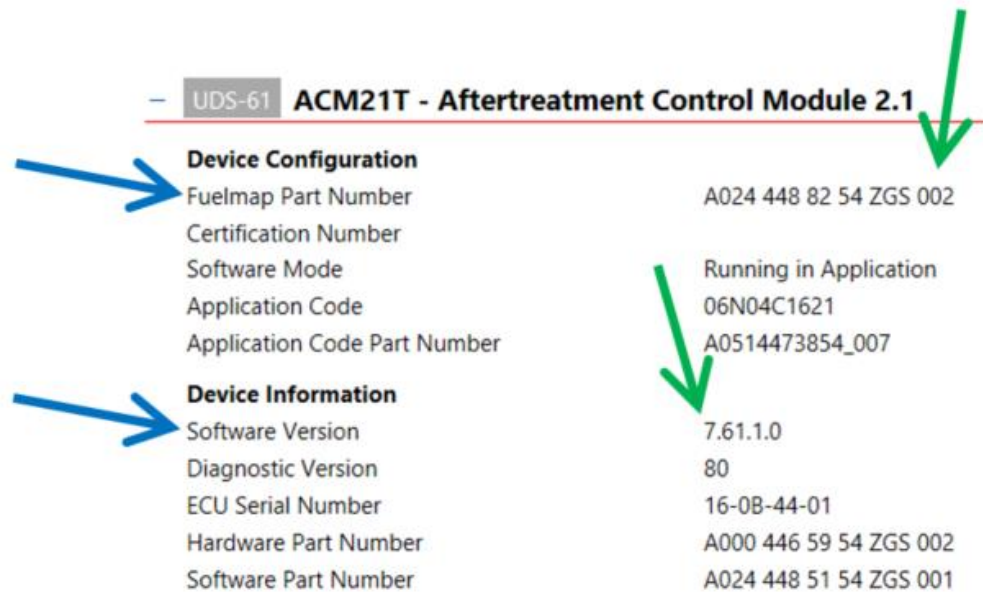Software Part Number   A024 448 51 54 ZGS 001

Figure 1 – MINIMUM MCM Software and Fuel Map ZGS levels

6. If this is a New Cascadia with CPC501T, check the software level. Is the software level at or above what is listed in table on page 1 "Software Levels"?
    a) Yes; go to step 7.
    b) No; refer to 20TS-04 to update the software level to the proper level then go to step 7.

7. Is the software and fuel map ZGS version level for the ACM, MCM, CPC, and TCM (if equipped) less than, equal to, or higher than the software and fuel map ZGS revision levels listed in the table on page 1?
   The ACM, MCM, CPC, and TCM (if equipped) software and fuel map ZGS version level must meet the **MINIMUM** requirements.

    a) If less than the minimum software and fuel map ZGS version levels, proceed to step 8.
    b) If equal to, or greater than, the minimum software and fuel map ZGS version levels, no programming is necessary. Proceed to step 14.

8. Select "Parameters" option along the left side of the DiagnosticLink® screen. Wait for parameters to be read.

9. Select "Program Device" option along the left side of the DiagnosticLink® screen. There will be "Data to Upload". Click "Connect to Server".

10. Select the "Add" button in the upper right corner of the DiagnosticLink® screen and enter the engine serial number. Then click the "Connect to Server" button in the bottom right corner of the DiagnosticLink® screen. See Figure 2.
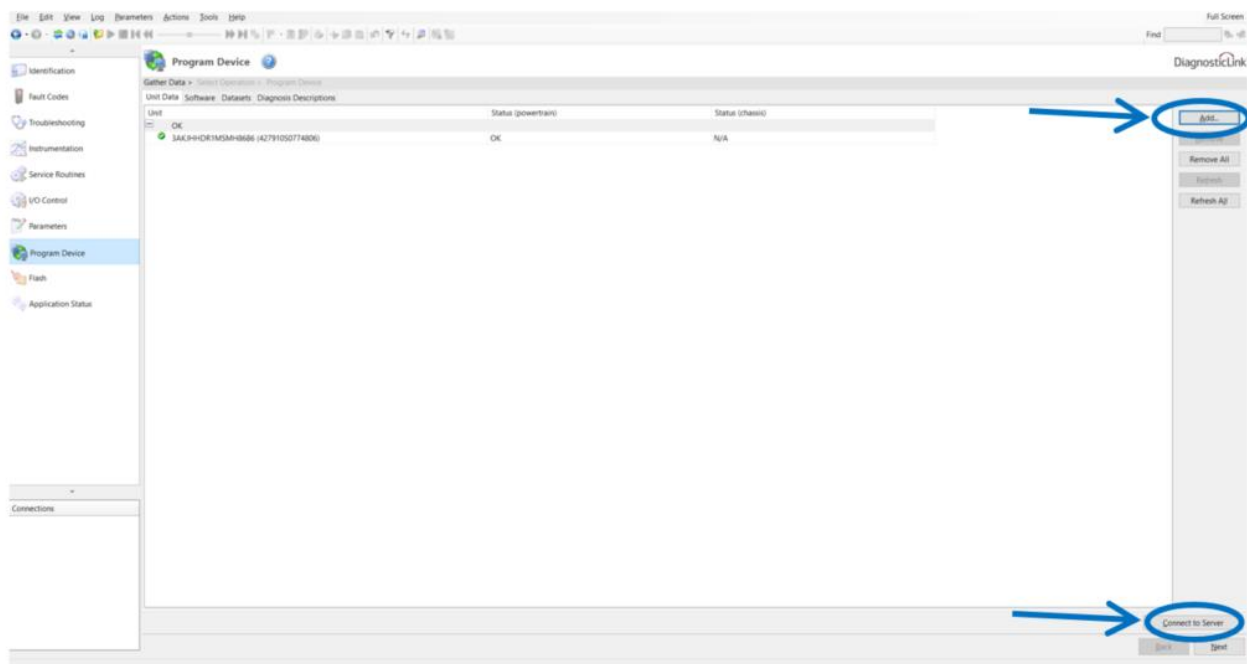

Figure 2 – Adding Engine Serial Number and Connecting To Server

11. Program the ACM, MCM, CPC, and TCM (if equipped), based on the above inspection results and engine serial number listing included with this field service campaign.

12. When programming is complete, click the "Finish" button and perform the following to allow the modules to synchronize with each other:
    a) Disconnect the USB Link at 9-pin vehicle diagnostic port.
    b) Turn the vehicle ignition OFF and wait one minute.
    c) Turn the vehicle ignition ON and wait one minute.
    d) Turn the vehicle ignition OFF and wait one minute.
    e) Turn the vehicle ignition ON and wait one minute.
    f) Reconnect the USB Link, reconnect DiagnosticLink® to the MCM, ACM, CPC, and if applicable the TCM, and confirm the proper software and fuel map levels.

> **NOTICE:**
>
> **CHECK** with the customer to see if Auto Elevate can be enabled. Auto Elevate can prevent Aftertreatment System (ATS) issues.

13. Ask the customer if they would like Auto Elevate activated. **REFERENCE** Detroit™ Technical Service letter 16 TS-18 for full details on Auto Elevate.

14. Repairs are complete.

Completion Stickers

- Upon completion of Field Service Campaign D20M8, clean a spot on the base label (Form WAR259), write the Field Service Campaign Number D20M8 on a blank, black completion sticker (Form WAR261), and attach the completion sticker to the base label.

- Label ordering info: DTNAConnect > Services and Reference > Publications & Warranty Supplies > Warranty