

Is removal hard?

It is really easy to remove the FICM. Just disconnect your batteries to begin. The FICM is located on the driver's side typically under and to the passenger side of the coolant overflow reservoir. There are two workable methods to remove it.

Without draining coolant method (provides less room to work, but is faster):

1. After letting the engine cool, remove and reinstall the reservoir cap to eliminate any built up coolant pressure.
2. Remove the two bolts holding the reservoir in place.
3. Using a plier, remove the hose clamp on the upper portion of the reservoir that is on the passenger side of the reservoir near the top. Set the hose aside, pointing it upwards to avoid coolant loss. Pull reservoir as far to the driver's side as possible to provide FICM screw access.

With draining coolant (dramatically more room to work):

1. Drain perhaps a gallon or so out from beneath the radiator (the petcock valve is located on the driver's side)
2. Remove the two bolts holding the reservoir in place
3. Use a plier to remove the clamps from the hoses connecting the reservoir to the various hoses (on the underside and the upper passenger side). Set reservoir aside.

Common Next Steps

Regardless of which method you used above, you will now notice that there are four bolts holding the FICM. Remove these and then lift up on the FICM and note the three wiring harness plugs. First, push the plugs **FURTHER IN** to relieve any pressure against the clips. Then, squeeze each plug one at a time one at the base on the long edges and then pull these plugs straight down or wiggle them to and fro to get them out. That's it. The two bolts on the front are nearly always 10mm. The two in the back are difficult to see, but are 8mm.

If you experience difficulty getting the plugs to come out, some have reported luck using a pair of channel locks to **GENTLY** squeeze on the base of the locking connector and then wiggling the plug side to side in order to get it out.

Can I test my FICM to ensure that it is the culprit?

If you aren't actually getting any codes, but would like to see if your FICM is the problem, you can easily test it. In fact, we encourage that all of our customers test their FICM's if it all possible just to be sure that it is indeed the cause of the issue they are experiencing!

If you have a ScanGauge II or Edge Insight CTS, you can directly determine the voltage of your module through it. Other monitoring tools also allow this functionality, so it may make sense to look. If you have a ScanGauge and are curious on how to program it to grab FICM data, see the near end of this page.

If you don't have a monitoring tool, consider getting one as they are incredibly powerful little money savers that can alert you to issues before they leave you stranded, but for now read on...

(Note that to get the clearance necessary for testing, you will likely have to drain some coolant and remove the reservoir, as described above)

On the top of the FICM there is a small rectangular plate held on with two T20 torx screws. Remove these and you'll see four or seven screws, depending on your model.

For Four Screw Models - place your volt meter's positive lead on the screw closest to the driver's side of the vehicle - **BE EXTREMELY CAREFUL NOT TO LET THIS LEAD SHORT OUT TO THE CASE.** Place the meter's negative side lead on the negative terminal on one of the batteries. To prevent the lead from touching the case, many wrap all but the lead tips in electrical tape.

For Seven Screw Models - place your volt meter's positive lead on the screw closest to the **PASSENGER** side of the vehicle in the row with four screws - **BE EXTREMELY CAREFUL NOT TO LET THIS LEAD SHORT OUT TO THE CASE.** Place the meter's negative side lead on the negative terminal on one of the batteries. To prevent the lead from touching the case, many wrap all but the lead tips in electrical tape.

You are looking for anything above 45 volts (48 is ideal) with the key in the on position and for this voltage to not drop during cranking and running.

If your voltage is lower than 45 (the owner's Excursion was setting at less than 30 volts as an example), repair is needed. If you show zero volts out of the FICM, check your FICM fuse - it is a 50amp maxifuse typically located in the panel behind the driver's left knee in (typically) position 103.

If your voltage DOESN'T drop below 45 and you want a more difficult stress test on your module, look for less than 45 volts in the morning when the engine is completely cold. You are looking to test the voltage during the following events:

1. Key off (0 volts)
2. Key on during buzz test (48 volts)
3. Key on after buzz test (48 volts)
4. Cranking (48 volts)
5. Running IMMEDIATELY after cold start and for the first minute (48 volts)
6. RPM's at 2000 after it's been started for a minute (48 volts)

Again, if the voltage drops below 45, even for a second, during any of these tests, the FICM needs repair.

Of course, it's materially easier to review these voltages with a monitor like the ScanGauge II or, even better, the Edge Insight CTS. We have both of these tools available on our [Intake Form](#).

What if my FICM isn't repairable?

In some very, VERY rare cases, units are not able to be repaired (generally as a result of having boards badly burnt following the catastrophic failure of one or more electronic components). If this is the case, we can set you up with a replacement board in most cases or even set you up with a completely different module.

Feel free to send an email to info@ficmrepair.com with any questions or concerns. THANK YOU!

My FICM has been worked on before. Will you still repair it?

We will indeed work on previously worked on modules, but require a \$50 additional fee in these cases given the additional time it consumes to correct the issues that this prior work caused.

What about reinstallation?

Reinstallation is the reverse of removal. One key point is to absolutely ENSURE that all three plugs 'click' back into place on both sides of each plug to ensure a good connection. The plug closest to the firewall is biggest bear of the three, but it's IMPERATIVE that it, too, clicks in. Some have had success using heavy duty zip ties like those used in the HVAC industry to help ratchet the plugs in as a way of getting them to click back on once again.

I've heard that heat and vibration are the real FICM killers. True?

We used to believe that heat and vibration took the top spots, but have since come to the realization that low supply side voltage should take the top spot.

Yes, it doesn't take a genius to determine the inherent design issues with placing these modules on the top of an engine that gets pretty warm and vibrates continuously. What's not so clear, however, is that each morning you start your truck it is essentially running only on batteries until your glow plug circuit has completed since the alternator is not able to keep up with the 230 amp load associated with the glow plugs and the base motor draw. See items 13 and 14 on our Maintenance Tips page for more information.

Of course, this wreaks havoc on a module already asked to take the nominal 12 volts of supply voltage and convert it to the 45-50 volts expected.

On that front, recognize the need to maintain fully charged batteries - batteries with a float voltage of 12.6 or higher that don't dip terribly for the first few minutes of engine run time. While it's common to have people report that their batteries' voltage dips down to 11.4 or so during this time, it's these same people that have their FICM's fail and are left to wonder why.

An excellent primer on batteries can be found at [Battery Stuff.com](http://BatteryStuff.com).

For the vibration, ensure that the grommets holding the mounting brackets to the FICM are still soft and pliable. If they aren't, get replacements. It might be a good idea to get different ones just regardless.

Is there anything I can do while my FICM is being repaired?

Yes. Please use this opportunity to electrically disconnect the batteries from each other by disconnecting the negative battery cable from one of them and get each fully charged using a charger that will desulfate your batteries. We recommend the Battery Tender and BatteryMINDER line of products, though any 'smart' charger should fit the bill. When the charge process is complete, you should see 12.7 or more volts at each battery. If you see less (anything less than, say, 12.5), recognize that your batteries have not been or are not able to any longer accept a full charge. If this is the case, please replace them before installing your replacement module to maintain your warranty coverage.

The average 6.0 user gets only about two years of life out of their batteries. Chances are good that yours are under warranty.

If you want to increase the life of your batteries moving ahead, consider picking up a 3 watt or so solar charger that you can leave on the dashboard to provide for a charging opportunity each time the sun shines.

Also, go ahead and check your FICM's wiring harness for any chaffing as this rubbing has been known to cause electrical shorts to ground. You'll obviously want to correct any issues noted before re-installing your freshly repaired module. Page six of the guide at Dealerconnection.com lists some of the more common chaffing locations.

What about after the repair? Anything to do?

All you have to do is reinstall your module and you are set! Just PLEASE ensure that all three connectors actively click into place on both sides of the connector. The back one nearest the firewall, especially, tends to give people the most trouble.

Once the truck starts again, use the opportunity to verify that the batteries are maintaining at least 11.8 volts right after startup and that the alternator is putting out 13.6 or more volts to the batteries (after the glow plug cycle is complete) to avoid having a repeat issue.

What if something goes wrong?

We understand the importance of your truck to you and your family and also understand that sometimes, although we work really hard to avoid it, electronics failures can and do occur. Though we agonize over these very, very few circumstances, we stand behind our work and will correct the failure either by repair or replacement as necessary.

The warranty covers your part from failure and damage caused by our work. Damage caused by an electrical short external to the module, flood, collision, and running with inadequate supply side voltage due to a lack of battery and/or alternator maintenance do not fall under the warranty. If a question remains over the cause of the damage following our inspection, we will accept responsibility and warranty the module. In most cases, we are able to determine the cause of the failure for you. Should something with your truck be the cause, we will consult with you on how to prevent it from occurring in the future. Note that if something should happen with your FICM, call us first. Like all automotive part warranties, we do not accept responsibility for anything other than the part itself (towing, shop charges, downtime, other vehicle components, etc).

Warranted modules will be returned to you USPS Priority Mail at our expense. Of course, Express Mail return shipping is also available, but at our current shipping rates.

Ultimately, we are in business to help people stay on the road, not to leave them holding the bag.

Most FICM's fail with cold start issues, but my 6.0 has warm start issues. Could it still be the issue?

There could be a logic board issue with the FICM, but more common with warm start trouble is an issue with the high pressure oil pump or the plumbing that connects to it. The pumps typically fail around 140,000 to 180,000 miles in the 03's and early 04's and sadly are a bear to replace. What happens in these earlier models is that a leak occurs in the system (from a popped out check ball or other failure) and then the pump loses the volume in the system necessary to fire the injectors. New versions of these oil pumps substitute a plug in lieu of a check ball.

The other pieces and parts that fail are the snap to connect (STC) fitting from the pump to the plumbing, the standpipes (accessible under the valve covers), or the dummy plugs on the oil rail (also under the valve covers). If you have a late 2004 or newer truck, this is nearly certainly where you'll want to check.

Most with high pressure oil system issues have symptoms including rough idle, hard to start warm (10-12 seconds is common), lack of typical acceleration, bucking and jerking at lower RPMs when driving down the road (when the pump is spinning more slowly), and a complete elimination of issues when the accelerator is pressed down enough to cause a downshift (since the oil pump now spins faster thus building up more oil volume). Also common with HPOP failures is for misfires to jump from one cylinder to the next.Â

Key to the diagnosis is also that HPOP issues have a tendency to come and go with changes in engine RPM, versus FICM issues which are consistent at given operating temperatures. A collection of videos on the diagnosis using an air test can be found on [YouTube](#). Part 2 is [here](#) with the wrapup [here](#). An air test showing the leak at the fitting is [here](#). Bill Hewitt's explanation goes into the standpipes and dummy plugs [here](#).

Of course, if you have a way to measure your IPR duty cycles and see 85% or so during cranking, this is a sure fire way to know that you've got a leak. If you don't see 500psi or more build-up of Injection Control Pressure (ICP) during cranking, then the

ECM won't give the green light to allow a start either. The IPR should be close to 24 at hot idle and 27 or so at cold idle.

If you don't have gauges to measure ICP, you can use a digital volt meter to convert the voltage to PSI, as follows:

Press Sensor (PSI) (MPA)	Voltage
0	0.02v
200	1.5 .4v
400	3 0.73v
600	4 .96v
800	5.5 1.2v
1000	7 1.4v
1200	8 1.6v
1400	9.7 1.9v
1600	11 2.1v
1800	12.4 2.3v
2000	13.8 2.6v
2200	15.2 2.8v
2400	16.5 3v
2600	18 3.3v
2800	19.3 3.5v
3000	20.6 3.8v

Most see 1.3V-1.5V during cranking (900-1100psi).

My FICM tested out with solid voltage, but I have a glow plug code. Is the FICM the issue?

If you have a glow plug code, you have a glow plug or glow plug harness issue and are not likely to have a FICM issue. Most find that replacing a glow plug necessitates changing out the glow plug wiring harness as well. A great write up is on [FTE](#).

I broke one of the connectors when removing the FICM. What can I do?

If all that broke is one or both of the clips that ensure that the plug doesn't work itself loose, many have had good luck using heavy duty zip ties around the module to keep the plugs fully seated. Others have had luck taking a maybe 10" section of radiator hose, slitting it length wise and installing it under the module as a way to press the plugs continually back in. If your damage is more severe or you just want the 'right' solution, there are two options. The first is a replacement harness, but be prepared for

some sticker shock. The injector harness (the plugs nearest the front bumper) retails in the \$200 range and the ECM harness (the biggest plug of the bunch) is closer to \$800. Alternatively, you can try replacing the plug ends. A great write up can be found [here](#). We can send you replacement plug ends, plug ends with pigtail wiring already attached to make life easier, harnesses, whatever you need!

My trunk will turn over but not start and I am seeing 0 volts after the FICM test. What can I do?

There is a 50 amp fuse under the steering wheel. It's worth removing it and reinstalling it to make a fresh connection. If this fuse is blown, replace it. If it blows again, it's time to get your FICM serviced!

My truck will turn over but not start and I have no logic power to the FICM. What can I do?

It's worth checking the 10 amp fuse in the black box under the hood near the drivers side hood hinge. Again, a removal and re-insertion can't hurt if its fine.

There is a grey FICM relay - most report it as being stamped with the 'engineering' part number F80B-14B192-AA - next to this 10 amp fuse near the drivers side hood hinge. The Ford part number is F8OZ-14N089-AA. You can get a replacement either at Ford, get a cross from near any auto parts store, or pick it up on [Amazon](#). Big shout out goes to Josh F. in Virginia for tracking down the part numbers!

I had you work on my FICM or ordered an exchange and my truck is doing the same thing as it did before!

We test all FICM's before working on them. If a FICM is not damaged, it only gets worked on if you expressly want it upgraded. We have seen plenty of cases where a module had an issue, but the issue it had wasn't causing the symptoms that a truck was experiencing (meaning that the truck actually had more than one issue!). If we repaired your module, we cannot be responsible if your non-FICM related symptoms continue.

If you have any question whatsoever as to whether your FICM is the root of your issues, please contact us prior to sending in your module. We would be happy to troubleshoot with you!

Of course, if we did an exchange with you, we never saw your old module ahead of time. If you wanted to return the exchanged module, see the returns question below.

I ordered parts (FICM's, alternators, dummy plugs, oil coolers, whatever) from you that it turns out I don't need. How do returns work?

Just drop us an email to returns@ficmrepair.com to get an Return Material Authorization (RMA) number and then ship the parts back to us. Note that the shipping and handling charges cannot be refunded and that there is a 20% restocking fee of the part price(s) on returns of all parts other than FICM's. Non-FICM electronic parts (electronic monitors, programmers, starters, alternators, glow plug control modules, etc) are returnable only if never installed and, in some cases, only if unopened. If evidence of installation is found, no credit will be given.

All returns must be within 30 days of the date on the sales receipt.

Some special order items are not eligible for return at all. Note that items need to be complete, unopened, and in the precise condition they were received in to be eligible for return credit - no one wants to receive a part from us that has been opened or that has dirt and grime all over it!

If a returned item is found to be NOT eligible for return credit upon receipt, it can be shipped back to you, but at your expense. Some parts may be eligible for partial credit, but this is on a case by case basis and at our sole discretion.

FICM's, as an electronic part, are subject to the greater of 20% restocking fee or \$75. As with other returns, they need to be returned in the same condition that they were sent in and some may be eligible for partial credit (if they come in dirty, with broken connectors, etc), but again is on a case by case basis and at our sole discretion.

Is there anything else I can do to make my injectors work more effectively and make my truck run better?

Yes! We offer the at [Hot Shot Secret](#) line of products to clean the coking that occurs over time around the injectors. Add this product to your crankcase at the next oil change in lieu of two quarts of oil and see the benefits! This product dramatically reduces injector stiction and prolongs the life of your injectors.

We also offer the [Fire Power](#) product (previously known as FP Diesel Extreme) to clean the fuel side of the injectors.

Ask us about including a bottle of each with your repaired FICM.

You mentioned programming the ScanGauge II. How can I do that?

Check out a great how-to video from one of our customers [here!](#)

Part of the draw of the ScanGauge II product is the ability to monitor items not native to the device - a feature not available on the Edge Insight CTS product. While it sure would be nice for a singular device to be able to support both audible alerts when thresholds are hit, monitor EGT's, AND be able to add in your own items of interest, for now, you may want to think about picking up BOTH the Insight CTS and the ScanGauge II.

For FICM voltage monitoring, program these 'X Gauges', by turning it on, clicking 'MORE' three times, and clicking the Version X-Gauge button:

FICM Vehicle Power - output is in volts. You are looking for numbers above 12.*

TXD: 07E02209CE

RXF: 0462450906CE

RXD: 3010

MTH: 006401000000

NAM: FVP

FICM Logic Power (Volts) (Should be 12 volts)

TXD: 07E02209CF

RXF: 0462450906CF

RXD: 3010

MTH: 006401000000

NAM: FLP

FICM Main Power (Volts) (Should be 47-49.5, but never less than 45)

TXD: 07E02209D0

RXF: 0462450906D0

RXD: 3010

MTH: 006401000000

NAM: FMP

* Ford's Technical Service Bulletin 09-24-03 says that this number should never drop below 10.25 volts for more than 60 seconds or below 9.0 volts for more than four seconds, but recognize that anything even remotely close to these numbers is putting wear on your FICM. If voltages drop into the 9's when cranking, it's time for a new pair of batteries.

On a 2005 Excursion fitted with the 6.0, a new set of 850CCA Energizer-branded batteries from Sam's Club at a 35° ambient temperature tested out at 12.78 volts at float (after they had been sitting all night), dropped to 12.0 volts during cranking,

registered 12.2 volts during the first couple minutes of running while the glow plug circuit was still running (yes, your truck operates on battery alone for up to two minutes EVERY cold start when it's cold outside, which is why short trips are murder on 6.0's batteries), comes up to 14.1 volts while the alternator is working to recharge everything, and ultimately dropped to 13.6 volts after the charging cycle was all but complete. Subsequent migration away from the stock alternator and into a 270XP DC Power alternator has resulted in voltages that never dip below 13.9.

The ScanGauge can have up to 24 X-Gauges programmed. Many enter the ones that they want alphabetically from #24 to #0 so it scrolls through logically. Here's a comprehensive (and alphabetized!) list of X-Gauges commonly of interest:

#1 cylinder cumulative misfires

TXD: 07E022160E RXF: 04620516060E RXD: 3010 MTH: 000100010000 NAM:
1CM

#2 cylinder cumulative misfires

TXD: 07E022160F RXF: 04620516060F RXD: 3010 MTH: 000100010000 NAM:
2CM

#3 cylinder cumulative misfires

TXD: 07E0221610 RXF: 046205160610 RXD: 3010 MTH: 000100010000 NAM:
3CM

#4 cylinder cumulative misfires

TXD: 07E0221611 RXF: 046205160611 RXD: 3010 MTH: 000100010000 NAM:
4CM

#5 cylinder cumulative misfires

TXD: 07E0221612 RXF: 046205160612 RXD: 3010 MTH: 000100010000 NAM:
5CM

#6 cylinder cumulative misfires

TXD: 07E0221613 RXF: 046205160613 RXD: 3010 MTH: 000100010000 NAM:
6CM

#7 cylinder cumulative misfires

TXD: 07E0221614 RXF: 046205160614 RXD: 3010 MTH: 000100010000 NAM:
7CM

#8 cylinder cumulative misfires

TXD: 07E0221615 RXF: 046205160615 RXD: 3010 MTH: 000100010000 NAM:
8CM

Accelerator Pedal Position %

TXD: 07E02209D4 RXF: 0462050906D4 RXD: 3008 MTH: 000100020000 NAM:
AP%

Battery Voltage (Volts)

TXD: 07E0221172 RXF: 046205110672 RXD: 3008 MTH: 000100100000 NAM:
BAT

Boost

TXD: 686AF1010B RXF: 0441850B0000 RXD: 2808 MTH: 00910064FF88 NAM:
BST

CVI VREF for calibration V

TXD: 07E0221155 RXF: 046205110655 RXD: 3010 MTH: 000133330000 NAM:
CVI

Exhaust Back Pressure

TXD: 07E0221445 RXF: 046285140645 RXD: 3010 MTH: 001D00500000 NAM:
EBP

EGR Duty Cycle (Percent)

TXD: 07E022166E RXF: 04620516066E RXD: 3010 MTH: 006440000000 NAM:
EGR

EGR Valve Position (Volts 0-5)

TXD: 07E022167E RXF: 04620516067E RXD: 3010 MTH: 000133330000 NAM:
EGV

Engine Oil Temperature

TXD: 07E0221310 RXF: 046245130610 RXD: 3010 MTH: 00090005F05F (
UNAM:Â EOT

Engine Run Time

TXD: 07DF011F RXF: 0441051F RXD: 2810 MTH: 0001003C0000 NAM: ERT (Mi

EGR Throttle Position Control Signal

TXD: 07E022096C RXF: 04620509066C RXD: 3010 MTH: 00647FFF0000 NAM:
ETP

EGR Valve Position Desired (%)

TXD: 07E02209D2 RXF: 0462050906D2 RXD: 3010 MTH: 00647FFF0000 NAM:
EVD

EGR Valve Position Measured (%)

TXD: 07E02209FE RXF: 0462050906FE RXD: 3010 MTH: 00647FFF0000 NAM:
EVM

EGR Valve Position (mm)

TXD: 07E022096A RXF: 04620509066A RXD: 3010 MTH: 000100010000 NAM:
EVP

Fuel Injector #1 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3001 MTH: 000100010000 NAM:
FI1

Fuel Injector #2 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3101 MTH: 000100010000 NAM:
FI2

Fuel Injector #3 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3201 MTH: 000100010000 NAM:
FI3

Fuel Injector #4 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3301 MTH: 000100010000 NAM:
FI4

Fuel Injector #5 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3401 MTH: 000100010000 NAM:
FI5

Fuel Injector #6 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3501 MTH: 000100010000 NAM:
FI6

Fuel Injector #7 Commanded on (On/Off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3601 MTH: 000100010000 NAM:
FI7

Fuel Injector #8 Commanded on (On/off)

TXD: 07E02209EF RXF: 0462250906EF RXD: 3701 MTH: 000100010000 NAM:
FI8

Fuel Level

TXD: 007E02216C1 RXF: 0462451606C1 RXD: 3010 MTH: 000101480000 NAM:
FL

FICM Logic Power (Volts - should be 12 or higher)

TXD: 07E02209CF RXF: 0462450906CF RXD: 3010 MTH: 006401000000 NAM:
FLP

FICM Main Power (Volts) - Spec is 45 volts or higher - NEVER EVER lower than 45

TXD: 07E02209D0 RXF: 0462450906D0 RXD: 3010 MTH: 006401000000 NAM:
FMP

Fuel Injector Pulse Width (microseconds)

TXD: 07E0221410 RXF: 046205140610 RXD: 3010 MTH: 000800010000 NAM:
FPW

Fan Speed Sensor (RPM)

TXD: 07E022099F RXF: 04620509069F RXD: 3010 MTH: 000100040000 NAM:
FSS

FICM Vehicle Power (Should be 12 Volts and not drop below 10.25 for more than 60 seconds, or 9.0 for 4 seconds. TSB 09-24-03)

TXD: 07E02209CE RXF: 0462450906CE RXD: 3010 MTH: 006401000000 NAM:
FVP

Horsepower

TXD: 00 RXF: 400080000000 RXD: 0000 MTH: 000A00240000 NAM: HPR

Intake Air Temperature 2 (Fahrenheit)

TXD: 07E02216A8 RXF: 0462051606A8 RXD: 3010 MTH: 000100010000 NAM:
IA2

Injection Control Pressure (MUST BE OVER 500psi to have truck start, and should be in the low 600's at idle!)

TXD: 07E0221446 RXF: 046205140646 RXD: 3010 MTH: 003900640000 NAM:
ICP

IPR Duty Cycle % (should be around 10-15% DC KOEO, 22-30 at hot idle, 60% or so cranking. 85% or so during cranking=HPO issue/leak)

TXD: 07E0221434 RXF: 046285140634 RXD: 3008 MTH: 0DCA03E8000A NAM: IPR%

Injector Timing Before Top Dead Center (Degrees)

TXD: 07E02209CC RXF: 0462850906CC RXD: 3010 MTH: 000A00400000 NAM: ITM

Mass Fuel Desired

TXD: 07E0221412 RXF: 046245140612 RXD: 3010 MTH: 006400100000 NAM: MFD

Manifold Absolute Pressure - PSI

TXD: 07E0221440 RXF: 046285140640 RXD: 3010 MTH: 012203200000 NAM: PSI

PSI Boost

TXD: 07E0221440 RXF: 046285140640 RXD: 3010 MTH: 012203200000 NAM: PSI

Crankshaft Position Sensor

TXD: 07E02209CD RXF: 0462050906CD RXD: 3000 MTH: 000100010000 NAM: SYC

Camshaft and Crankshaft in sync (1= in sync)

TXD: 07E02209CD RXF: 0462050906CD RXD: 3001 MTH: 000100010000 NAM: SYC

Transmission Fluid Temperature

TXD: 07E1221674 RXF: 046205160674 RXD: 3010 MTH:000100080000 NAM: TFT

Throttle Position 1 (Volts)

TXD: 07E0220917 RXF: 046245090617 RXD: 3010 MTH: 0064040000000 NAM: TP1

Throttle Position 2 (Volts)

TXD: 07E0220918 RXF: 046245090618 RXD: 3010 MTH: 0064040000000 NAM: TP2

Throttle Position Actual (Degrees)

TXD: 07E022093C RXF: 04624509063C RXD: 3010 MTH: 0064020000000 NAM:
TPA

It seems as if turbo issues are relatively common on these trucks. Where can I learn more?

Check out a great discussion on [FTE](#) with links to the [turbo re-learn procedure \(post #4\)](#) and tons of other useful information.