

Date: 18-Sep-2014

INVOICE 2136743

Customer:

KANSAS CITY

Equip: 3PS5047 - FREIGHTLINER M
 Cust Unit: FGHTL
 2005 FREIGHTLINER CORP.
 M2
 VIN: 1FVACWDC05HN85047
 Meter: 285030.000 MLS

Date In : Aug 12, 2014 -
 Date Out: Sep 18, 2014

Misc Power issues 8/12-9/9

VMRS SYSTEM / PART NUMBER	LABOR DESCRIPTION / PART DESCRIPTION	HRS	QTY	UNIT PRICE	AMOUNT
(TV) TOTAL VEHICLE					
TOW TO FOLEY FOR REPAIR					
Sublet Labor					143.00

(45) POWER PLANT

DRIVER SAYS THE ENGINE FEELS LIKE IT HAS VERY LOW POWER AT TIMES AND THEN IT WILL SNAP OUT OF IT AND RUN FINE ONLY TO START RUNNING POORLY AGAIN. I PULLED TRUCK IN SHOP AND CHECKED THE FUEL LINES AND FITTINGS FOR TIGHTNESS. THEY ALL LOOKED GOOD. I PLUGGED INTO THE ECM AND CHECKED FOR CODES. THERE WEREN'T ANY. I CHECKED THE THROTTLE RESPONSE WITH THE COMPUTER, IT WAS GOOD. I TOOK THIS TRUCK ON A TEST DRIVE AND WATCH THE INJECTION ACTUATION PSI AND THROTTLE ACTUATION. THEY WERE MINIMUM TOLERANCE I NOTICED THAT THE THE GEAR SHIFTER WAS SLOPPY AND THE SHIFT INDICATOR WAS OFF A LITTLE. AS THE TRUCK RAN AND GOT WARMER, THE HESITATION HAPPENED MORE OFTEN. I BROUGHT THE TRUCK BACK IN SHOP AND R&R THE STEERING COLUMN PANELS AND TIGHTENED THE SHIFTER MOUNT. I ALSO ADJUSTED THE GEAR INDICATOR. I SWITCHED OUT A THROTTLE PEDAL WITH ANOTHER TRUCK. I DROVE THIS ONE AGAIN AND IT STILL ACTED UP. I BY-PASSED THE FUEL WATER SEPERATOR AND DROVE IT AGAIN. IT STILL ACTED UP. FEELS LIKE IT STARVES FOR FUEL. 2210 I CHANGED OUT THE SECONDARY FUEL FILTER. I CHECKED ALL GROUND CONNECTIONS ON THE FRAME AND AT THE BLOCK. I UNPLUGGED AND CHECKED ALL SENSOR CONNECTIONS EXCEPT FOR THE ENGINE POSITIONING SENSORS. I TOOK THIS TRUCK ON ANOTHER TEST DRIVE. IT RAN GOOD FOR ABOUT 10 MILES, THEN IT STARTED ACTING UP. I COULDN'T KEEP IT AT 40 MILES AN HOUR, SO I HAD TO PULL OVER. I CHECKED COMPUTER SIGNALS ON THE COMPUTER READ OUT. IT WAS SHOWING READINGS FOR EVERYTHING. THE TRUCK WOULD IDLE FINE, BUT I COULDN'T GET MORE THAN 1000 RPM OUT IF IT. AFTER A LITTLE TIME I WAS

Dedicated to Your Success

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***** INVOICE IS NOT APPROVED
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GET MORE THAN 1000 RPM OUT OF IT. AFTER A LITTLE TIME I WAS ABOUT TO GET IT TO RUN A MILE ON TWO MORE AT A TIME, THEN I HAD TO PULL OVER AGAIN. I TRIED TO RUN A CYLINDER CUTOUT TEST, BUT IT WOULDN'T RUN WHEN THE ENGINE WAS RUNNING ROUGH. AFTER I GOT THIS TRUCK BACK INTO THE SHOP. I RAN A CYLINDER CUT OUT TEST AND IT RAN. IT SHOWED THAT #3 & #6 INJECTORS ARE QUESTIONABLE.

2210

INSPECTED ENTIRE FUEL SYSTEM FOR ANY SIGNS OF LEAKAGE OR SIGNS OF SUCKING AIR. INSPECTED WIRING HARNESSSES IN ENGINE BAY AND FOUND AIR COMP DISCHARGE LINE WAS RUBBING ON ECM HARNESS, DID NOT FIND ANY DAMAGE SO I SECURED THE DISCHARGE LINE TO KEEP IT FROM RUBBING. RAN UNIT FOR A COUPLE HOURS WHILE INSPECTING AND DOING DIAGNOSTICS AND FINALLY GOT UNIT TO START MISSING. HOOKED UP FUEL GAUGE AND ALSO DIAG COMP TO MONITOR VITALS AND TOOK UNIT FOR A TEST DRIVE. UNIT WOULD BARELY PULL ITSELF AROUND THE LOT. DID NOTICE INJECTION ACTUATION OIL PRESSURE WAS ERRATIC, THE ACTUAL AND DESIRED MET BUT THEY JUMPED UP AND DOWN AT TIMES. 5675 CHECKED READINGS FROM ACTUAL AND DESIRED PRESSURE AGAINST A ANOTHER TRUCK AND THERE WAS A LARGE DIFFERENCE. POSSIBLE PROBLEM WITH INJECTION ACTUATION PRESSURE SENSOR INJECTION ACTUATION PRESSURE SENSOR OR PUMP ITSELF. 5675 FOUND OLD INJ OIL PRESSURE SENSOR WAS STUCK IN OIL RAIL. WHILE REMOVING TOP OF UNIT BROKE OFF. MADE SEVERAL ATTEMPTS TO REMOVE, INCLUDING 2 DIFFERENT EASY OUTS AND SEVERAL HEAT CYCLES. EVENTUALLY REMOVED SENSOR AND INSTALLED NEW. TEST RAN AND UNIT RAN FINE. LET IT IDLE FOR OVER AN HOUR AND TESTED AGAIN. UNIT MISSES BAD. IDLE OIL PRESSURE IS VERY LOW APPROX 17 PSI. IF YOU SLIGHTLY RAISE RPMS UP JUST ENOUGH TO BUILD ENGINE OIL PRESSURE TO 50 PSI THE TRUCK WILL TAKE OFF AND RUN FINE, BUT IF YOU JUST LEAVE AT IDLE AND ACCELERATE HARD IT WILL STUMBLE AND NEVER BUILD RPM OR ENGINE OIL PRESSURE. POSSIBLE PROBLEM WITH HUI PUMP OR OIL SUPPLY TO PUMP. 5675

I PULLED THE VALVE COVER OFF AND CHECKED THE THE INJECTOR WIRING AND PLUGS. I RECORDED THE TRIM #'S AND CHECKED THEM ON THE COMPUTER TO MAKE SHURE THEY MATCHED. THEY WERE GOOD. MARK WANTED ME TO CHECK INTO THE LOW OIL PRESSURE. SO I PULLED THE AIR FILTER HOUSING AND INTAKE TUBING OFF. PULLED

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THE ALTERNATOR AND MOUNTING BRACKET LOOSE. DRAINED THE WATER AND PULLED THE OIL FILTER HOUSING AND WATER COOLER OUT. CHECKED THE BY-PASS VALVES IN THE FILTER HOUSING. ORDERED NEW GASKETS AND NEW VALVE SPRINGS. 2210 INSTALLED THE OIL COOLER AND FILTER HOUSING WITH NEW GASKETS AND SEALS. THERE WAS A BAD OIL LEAK FROM THIS HOUSING, SO THAT SHOULD STOP THE LEAK. REINSTALLED THE ALTERNATOR MOUNT AND ALTERNATOR. INSTALLED THE FILTER HOUSING AND INTAKE TUBING. PUT WATER BACK IN RADIATOR. PULLED THE HIGH PRESSURE INJECTION PUMP. ORDERED NEW HIGH PRESSURE PUMP. SWAPPED FITTINGS TO NEW PUMP AND INSTALLED NEW PUMP. STARTED TRUCK AND GOT IT UP TO OPERATING TEMP. TOOK IT FOR A SHORT TEST DRIVE AND IT STARTED ACTING UP. BROUGHT IT BACK IN SHOP WILL REMOVE NEW HIGH PRESSURE PUMP AND REINSTALL OLD PUMP. R&R THE INTAKE PIPE ON LEFT SIDE OF ENGINE. R&R THE FUEL FILTER HOUSING AND FUEL LINES. R&R OIL LINES AND REMOVED THE HIGH PRESSURE OIL PUMP. SWAPPED THE FITTINGS BACK OVER TO THE OLD HIGH PRESSURE PUMP. PULLED THE ENGINE POSITIONING SENSORS OUT. INSTALLED NEW ENGINE POSITIONING SENSORS. FOUND A BARE WIRE AND SEALED THEM UP WITH SILICONE. HOOKED WIRING BACK UP. INSTALLED THE OLD HIGH PRESSURE PUMP. STARTED TRUCK AND LET IT WARM UP. TOOK IT FOR A SHORT TEST DRIVE AND IT STILL HESITATES BAD WHEN IT GETS GOOD AND WARM. 2210 WILL SEND TRUCK TO FOLEY. FOLEY CALLED AND SAID THE HIGH PRESSURE OIL PUMP HAD BEEN DAMAGED BY METAL COMING FROM THE FAULTY ENGINE OIL PUMP. HUIE PUMP DELIVERED TO FOLEY EQUIPMENT TO BE INSTALLED.

(06) INSPECT

14.45

45-2147567	O-RING IAP	1.00
214-7568	O-RING HYD ADAPTER	4.00
2275904	O-RING HP OIL MTG	1.00
2213494	SEAL O RING	2.00
4P9653	O-RING HP PUMP DRAIN LIN	1.00
2284947	O-RING	2.00
2337655	GASKET OIL COOLER/ENG	1.00
3P1156	O-RING OIL COOLER	2.00
2337654	GASKET OIL FILT BASE	1.00
2423864	SPRING BYPASS	2.00
10R8899	PUMP HUIE HP OIL	1.00

Cat Dealer Repairs
Foley Equip-

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INVOICE 2137603

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Customer:

Equip: 3PS5047 - FREIGHTLINER M
Cust Unit: FGHTL
2005 FREIGHTLINER CORP.
M2

VIN: 1FVACWDC05HN85047

Meter: 285129.000 MLS

Date In : Sep 9, 2014

Date Out: Sep 12, 2014

Cat Dealer Repairs 9/9-9/12

VMRS SYSTEM / PART NUMBER	LABOR DESCRIPTION / PART DESCRIPTION	HRS	QTY	UNIT PRICE	AMOUNT
(45) POWER PLANT	REPAIR ENGINE FOR ROUGH IDLE AND MISS, SUDDEN POWER LOSS AND LOW OIL PRESSURE. FOUND LOW OIL PRESSURE DUE TO SCORED GEAR WORN BUSHING IN THE OIL PUMP. DRAINED OIL REMOVED PAN AND REPLACED THE OIL PUMP. STARTED TRUCK AND ENGINE RAN ROUGH BUT OIL PRESSURE WAS GOOD. NOTICED EXCESSIVE BLOW BY COMING FROM THE ENGINE VENT TUBE. TESTED BLOW-BY AND IT WAS WELL OUT OF SPEC. COMPRESSION LOW ON #3 & #4 SUSPECT HEAD GASKET MAY BE BLOWN. PULLED HEAD AND FOUND HEAVY SCORING ON ALL CYLINDERS. TOOK PICTURES AND ADVISED THE CUSTOMER. ENGINE WILL NEED TO BE BORED AND SLEAVED. INSTALLED 6 PISTON KITS. CHECKED MAIN AND ROD BEARINGS, FOUND BEARINGS SCORED AS WELL AS THE CRANK. REPLACE MAIN AND ROD BEARINGS, HAD TO POLISH SCORING OUT OF CRANK SHAFT. REASSEMBLE ENGINE AND START. INJECTORS STARTED DROPPING OUT AND MISFIRING. INJECTORS AND HIGH PRESSURE OIL PUMP DAMAGED FROM FINE METAL DEBRIS FROM FAILED ENGINE OIL PUMP. REPLACE ALL 6 INJECTORS AND PUMP. (PUMP SUPPLIED BY SUCCESS NATIONALEASE) STARTED ENGINE RUNNING GOOD NOW WITH SMOOTH IDLE. TOOK TRUCK FOR TEST DRIVE AND TRUCK RAN WELL BUT SUDDENLY SHUT DOWN AND WOULD NOT RESTART. HAD TRUCK TOWED BACK TO SHOP. FOUND NO SIGNAL COMING FROM THE ECM. INSTALLED A TEST ECM AND STARTED TRUCK, TOOK ON TEST DRIVE AND TRUCK RAN GOOD WITH NO PROBLEMS. INSTALLED NEW ECM AND PROGRAMED IT FOR TRUCK. TEST DROVE TRUCK AGAIN WITH NEW ECM WITH NO PROBLEMS.				

Sublet Labor
Sublet Charges

9874.04

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