

Item	Activity	Wiring Harness Engineer Responsibilities - F. Franchi 01/11/14
1	Design	
2		3D wiring harness NX (Team Center)
3		2D lay-out
4		Electrical schematic
5		Sketch drawings for lab and prototype builds
6		SLA parts fabrication using 3D print Makerbots
7		Conduct necessary calculation, such as wire resistance, voltage drop, bundle size etc, before design is complete
8	Material Procurement	
9		Prototype builds material support at engine and truck plants
10		Test cell jumper harness support material
11		Connector storage vault maintainance
12		Procure special sensors/actuators for engine calibration
13	Field support	
14		Engine plants in Huntsville (Big Bore and I6/V8)
15		Detroit Prototype shop
16		Truck plants (Fort Wayne Indiana, Springfield Ohio, Tulsa Oklahoma, West Point Mississippi, Sao Paulo Brazil)
17	Documentation (create and maintain)	
18		Material Deviatoin Authorization (MDA)
19		8D - Failure root cause analysis/resolution
20		DFMEA
21		DVP&R
22		Support quality engineer on SREA and PPAP submission
23		Product Change Request (PCR)
24		Design Freeze Checklist
25		Lessons Learned log for all department
26		Build manual input
27		Function objectives list
28		Work plans
29	Program Management	
30		Microsoft Project knowledge
31		Charts: Grantt, Pie, others
32		Design release time line
33		Work plan
34		Harness build time line
35		Familiar with VPN (remote login) and Peoplesoft
36	Lab Engines Test Cell Support	
37		Troubleshoot lab wiring issues
38	Other activities	
39		Convey models and pictures to engine and truck plants
40		Support QS9000 system, follow department documentation
41		Assist team in achieving program goals including milestone timing, tasrget and budget costs.
42		Manufacturing review and signoffs
43		Bench marking: compatitors engine harness review
44		Manage component and harness part delivery
45		Launch experience
46		Conduct quality history at beginning of design phase. Review past design issues, 8Ds campaign issues, warranty claims, etc., capturing "lessons learned"
47		Electrical Troubleshooting skills