

**PERFORMANCE WORK STATEMENT
For
Inspect Repair Only As Necessary (IROAN)
Of
Mine Resistant Ambush Protected (MRAP)
Cougar CAT I A1 ISS**

TAMCN D00257K

NSN 2355-01-552-5565/11202D

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PERFORMANCE WORK STATEMENT
For
Inspect Repair Only As Necessary
Of
MRAP Cougar CAT I A1 ISS

1.0 SCOPE.

This Performance Work Statement (PWS) establishes, sets forth tasks, and identifies the work efforts that shall be performed by the Contractor (for purposes of this PWS, Contractor is defined as the commercial repair facility or government entity performing the Depot IROAN effort of the Category (CAT) I Mine Resistant Ambush Protected (MRAP) Cougar Vehicles, hereafter referred to as the "Cougar". This document contains minimum requirements to install and/or verify the installation of referenced Capability Insertions (CIs), Modification Instructions (MIs), Technical Instructions (TIs), Maintenance Advisory Notices (MANs), Safety Advisory Notices (SANs) and Engineer Change Proposals (ECPs) to bring the Cougar to the approved baseline configuration as identified by the Cougar CAT I A1 ISS Indentured Bill of Material (IBOM) while simultaneously restoring the Cougar to Condition Code "A". For the definition of Condition Code "A", please refer Appendix A. Vehicle configuration information for the CAT I Cougars can be found in Appendix E.

1.1 Background.

The objective of this program shall be to utilize the best maintenance technique which determines the minimum repairs necessary to restore equipment components or assemblies to prescribed maintenance serviceability standards by utilizing all available diagnostic equipment and test procedures in order to minimize disassembly and parts replacement.

- a. Verify the existing technical documentation for the Cougar to gain organic capability through, Depot Maintenance Work Requirements (DMWR), National Maintenance Work Requirements (NMWR), and work processes. This should include tools, test fixtures, technical manuals, and personnel to perform tasks associated with these items.
- b. The referenced maintenance and parts manuals shall be used to conduct this IROAN. The IBOM shall reside in the Marine Corps Joint Configuration Management Information System (JCMIS) and can be obtained by contacting the Marine Corps Logistics Command (LOGCOM), Albany, GA, Attn: MRAP Configuration Management (Code P706).
- c. The service provider shall receive designated Cougar Category I vehicles (identified in Table 1) for this program. The Cougars will have CIs installed in accordance with existing approved installation documentation to ensure they all are brought to the final approved CAT I A1 ISS configuration. Progress shall be tracked and reported through the Production Status Reports. Production Status Report format can be found in Appendix B. CDRL A001.

Table 1.

VEHICLE	TAMCN	ID	NSN
CAT I A1	D00257K	11202D	2355-01-552-5565
CAT I A1 ISS	D00257K	11202K	2355-01-581-2392

d. Production Status Report Provide on a monthly basis. This information shall indicate the progress of work, the status of the program and of the assigned tasks. It shall also report costs at the program and the vehicle level, and inform of existing or potential problem areas. CDRL A001

e. In-Process Review (IPR), whether by teleconference or site visit, shall be conducted monthly initially to review the program status. Follow-on IPRs will be based on any problems or concerns that are identified during production. The review shall be coordinated by LOGCOM and will include PEO LS PMM-207 and LOGCOM representatives. CDRL A002 and A003.

f. Post Award Conference, In accordance with FAR 45.503, a post award conference or Start Of Work meeting shall be conducted within 30 days of contract award.

2.0 APPLICABLE DOCUMENTS.

The following documents form a part of this PWS to the extent specified. Unless otherwise specified, the issues of these documents are those listed in the Department of Defense, Index of Specifications and Standards (DODISS) and supplement thereto which is in effect on the date of solicitation. In the event of conflict between the documents referenced herein and the contents of this PWS, the contents of this PWS shall be the superseding requirement.

2.1 Military Specifications

MIL-DTL-64159	Coating, Water Dispersible Aliphatic Polyurethane Chemical Agent Resistant
MIL-PRF-46108	Armor: Transparent
MIL-PRF-22750	Epoxy Polyamide

2.2 Military Standards

MIL-STD-129	Military Marking for Shipment and Storage
MIL-STD-130	Identification Marking of U.S. Military Property
MIL-STD-196	Joint Electronics Type Designation System
MIL-STD-461	Requirements for the Control of Electromagnetic Interference Characteristics of Subsystems and Equipment
MIL-STD-464	Electromagnetic Environmental Effects Requirements for Systems
MIL-STD-810	Environmental Engineering Considerations and Laboratory Tests

MIL-STD-882	Standard for System Safety
MIL-STD-1472	Human Engineering
MIL-STD-2073-1	Standard Practice for Military
MIL-STD-3003	DOD Standard Practice; Vehicles, Wheeled: Preparation for Shipping and Storage of

2.3 Other Government Documents and Publications

DFARS 211.274	Defense Federal Acquisition Regulation Item Identification and Valuation Requirements
DFARS 252.211-7003	Defense Federal Acquisition Regulation Item Identification and Valuation
DFARS 252.211-7007	Defense Federal Acquisition Regulation Reporting of Government-Furnished Property
FAR PART 45	Government Property In addition, for commercial contracts:
DFARS 252.245-7001	Defense Federal Acquisition Regulation Tagging, Labeling, and Marking of Government-Furnished Property
DFARS 252.245-7002	Defense Federal Acquisition Regulation Reporting Loss of Government Property
DLM 4000.25-1	Military Standard Requisitioning and Issue Procedures (MILSTRIP)
FED-STD 595	Paint Color Code
TM-3080-50	Corrosion Control Procedures for Depot Maintenance Activities
TM 4750-OD/1	Painting, Coating, Underbody, and Registration Marking for Marine Corps Combat and Tactical Equipment
TM-4795-OR/1	Organizational Corrosion Prevention and Control Procedures for USMC Ground Combat Equipment
TB 9-2355-328-40	Inspection and Corrective Repair Action Procedure for Mine Resistant Vehicles.

Refer to the following appendices for Cougar Specific data:

- Engineering Change Proposals – Appendix G
- Technical Bulletins – Appendix H
- Maintenance Advisory Notices/Safety Advisory Notices – Appendix I
- Modification/Technical and Supply Instructions – Appendix J

2.4 Technical Manuals

TM 11202D-OR	Cougar Operator's Manual
TM 11202D-OI	Cougar Field Level Maintenance Manual, 4 Volumes
TM 11202D-OD	Cougar Repair Parts and Special Tools List (RPSTL) Manual

TM 11202D-OD/2	Technical Manual Supplement for the MRAP Cougar Family of Vehicles
TM 11202K-OI/1	Technical Manual Maintenance Supplement ISS Brake Upgrade for Cougar MRAP
TM 11202K-OR/1	Repair Parts and Special Tools List (RPSTL) For Cougar MRAP Gunner's Protection Package
TI 11202D-OD/1	Installation and Troubleshooting Procedures of Integrated Government Furnished Equipment for Mine Resistant Protected Vehicle, Cougar, Category I
TI 11202D-OD/2	Installation and Trouble Shooting Procedures of Integrated Government Furnished Equipment for Mine Resistant Protected Vehicle, Cougar, Category I

2.5 Military Handbooks (For Guidance)

MIL-HDBK-61 Configuration Management Guidance

2.6 Industry Standards

ANSI Z535.4	Product Safety Signs and Labels
ANSI/ISO/ASQ Q9001-20__	Quality Management Systems
SSPC-SP-10/NACE No. 2	Joint Surface Preparation Standard near White Blast Cleaning
ASME Y14.24	Types and Applications of Engineering Drawings
ASTM D3951	Standard Practices for Commercial Packaging

2.7 Industry Standards (For Guidance)

ANSI/EIA-649	National Consensus Standard for Configuration Management
SAE JA1011	SAE Standard for Reliability-Centered Maintenance
SAE JA1012	A Guide to Reliability-Centered Maintenance

Copies of Military Specifications and Standards are available from the DoD Single Stock Point, Document Automation and Production Service, Building 4/D, 700 Robbins Avenue, Philadelphia, PA 19111-5094, commercial telephone number (215) 697-6396, DSN 442-6396, or on the Internet at [ASSIST- QuickSearch](#).

Copies of other government documents and publications required by the Contractor in connection with specific PWS requirements shall be obtained from the Commanding General (P821A), Marine Corps Logistics Command, 814 Radford Blvd., STE 20250, Albany, Georgia 31704-0250, commercial telephone number (229) 639-5412/6258 or DSN 567-5412/6258

Copies of engineering drawings, if applicable, shall be obtained from the Marine Corps Engineering Data Repository. An application for access to the Marine Corps JEDMICS is located on the following website: <https://jedmicsweb.logcom.usmc.mil>. Click on New User Access

Request link and follow directions. Access to Indentured Bills of Material (IBOMs) and other Government MRAP engineering documentation for read only, may be obtained from the Marine Corps Joint Configuration Management Information System (JCMIS). Authorization to access JCMIS may be obtained from Marine Corps Logistics Command, Albany, GA, Attn: MRAP Configuration Management Office, Code P706, at (229) 639-6655.

3.0 REQUIREMENTS

3.1 General Tasks.

In fulfilling the specified requirements, the Contractor shall:

a. Provide all materials, labor, equipment, facilities and missing/repair parts, necessary to inspect, diagnose, restore, test, and complete each Cougar vehicle. Upon completion of each vehicle, the subject item shall be Condition Code "A" and fully mission-capable. All Cougar CAT I A1 vehicles processed under this PWS should be in a common configuration identified in the attached IBOM, Technical Bulletins, MANs/SANs, MIs/TIs, and Cougar Technical Manuals listed in the appendices and applicable documents section. Any MIs, TIs, SANs and approved ECPs not previously applied to the CAT I shall be applied during this IROAN. Pre-induction inventory of all modifications shall be conducted and documented by the contractor.

b. Conduct in-process and final on-site inspection and testing for witness by a representative from PEO LS PMM-207 or authorized representative from Defense Contracts Management Agency (DCMA).

c. Contractor shall institute appropriate management actions relative to subcontractor performance. Requirements that are contractually specified shall apply to subcontractor performance. The contractor is responsible and shall be accountable to ensure subcontractor deliverables and products are in compliance with the contract requirements.

3.1.1 Data Management (DM).

The Government reserves the right to review all contractor generated data associated with and developed for the Cougar IROAN.

3.1.2 Risk Management

The Contractor shall provide a Risk Management Report that will be used to monitor management, cost, and schedule of assigned contract tasks risk relative to the modernization effort. The Risk Management Report shall include reporting critical risks and associated mitigation actions monthly to the Government. CDRL A004

3.1.3 Configuration Control.

The Contractor shall apply configuration control procedures to established configuration items.

a. The Contractor shall not implement configuration changes to an item's documented performance or design characteristics without prior written authorization from the Government Contracting Officer. If it is necessary to temporarily depart from the authorized configuration, the Contractor shall prepare and submit a Request for Deviation (RFD) using MIL-HDBK-61 and

ANSI/EIA-649 as guidance. The Contractor shall ensure all RFD submissions identify the precise vehicle serial numbers and USMC Registration number affected by the deviation. No recurring deviations shall be allowed. CDRL C001

b. The creation and submission of RFDs shall be accomplished using the MEARS software application that resides at a secure website, <https://mears1.redstone.army.mil>. The Contractor shall request user-id and password privileges from the LOGCOM, MRAP Configuration Management (Code P706) for the purpose of gaining access to the web site. The Contractor shall direct any technical or functional questions concerning usage of MEARS software to the MRAP Configuration Management (Code P706) for guidance. The Contractor shall notify the Requiring Office by electronic mail when completed RFDs are ready for formal submission. CDRL C001

3.1.4 Configuration Status Accounting (CSA)

The contractor shall document and maintain a record of the final configuration of each Cougar CAT I vehicle completed under this PWS by Government Registration Number, Serial Number and Top Level Part Numbers. The Contractor shall utilize the Configuration Checklists contained in Appendices G through J for each Cougar repaired. Information recorded on the Configuration Checklists shall be used as a guide to record the final configuration of each vehicle and provided to the Government during final acceptance testing or inspection. CDRL C003

3.1.5 Corrosion Prevention and Control.

The contractor shall inspect for corrosion. Corrective actions required shall be performed in accordance with TM 3080-50. The Contractor shall adhere to USMC specific policy and procedures, TM-4795-OR/1, for corrosion prevention and control for any future items delivered to the Government. For any vehicle delivered, the Contractor shall identify any mitigations or instructions.

3.1.5.1 Restoration.

The Contractor shall be responsible for all structural, electrical, optics, fire control, mechanical, surface preparation, and painting requirements associated with the repair and restoration of the Cougar, as specified in this PWS. All corrosion shall be removed and treated in accordance with TM 3080-50.

3.1.6 Indentured Bill of Material (IBOM).

The IBOM constitute the baseline for the Cougar CAT I A1 with ISS and may be obtained from the MRAP Configuration Management Office (P706). Any recommended change or deviation to the approved baseline shall be documented and processed per Paragraph 3.1.3 of this PWS. CDRL C001

3.2 Detailed Tasks.

The Contractor shall conduct the Cougar IROAN for each vehicle within a 100 calendar day time period inclusive of the distinct phases which are below.

3.2.1 Phase I - Pre-Induction.

A pre-induction inspection analysis shall be performed in accordance with the Limited Technical Inspection (LTI) for each Cougar to determine extent of work and parts required. These findings shall be annotated on the LTI form and provided to PEO LS PMM-207 and MARCORLOGCOM

representatives for review at the beginning of the repair tasks. Refer to Appendix C. CDRL B001.

3.2.2 Phase II – IROAN.

After pre-induction tests and inspections have been completed, the IROAN of the Cougar shall be accomplished in accordance with this PWS.

3.2.2.1 Hull Crack Inspection and Repair.

All vehicles shall be cleaned to a “near white” metal finish with SSPC-SP-10/NACE No.2, with a surface profile of 0.002” to 0.0025” (2 to 2.5 mils) and inspected using ultrasound, dye penetrate or magnetic particle for cracked, corroded, bent, distorted, missing, dented, and unserviceable components. Weldments, doors frames, doors, and suspension shall be inspected by visual and magnetic particle inspection, dye penetrate, or x-ray. Magnetic particle inspection shall be performed on all lifting eyes, tow lugs, and tie downs. Dye penetrates or magnetic particle inspection testing shall be done on all weld repairs. All hull cracks will be reported by LTIs CDRL B001 and Production Status Reports CDRL A001. Welding repair and inspection procedures shall be followed IAW TB 9-2355-328-40, Inspection and Corrective Repair Action Procedure for Mine Resistant Vehicles.

3.2.2.2 Detailed Crack Inspection.

The detailed hull crack inspection shall be concentrated in the following areas:

- a. All CVRJ mounts
- b. All Hoods adjacent to where the Engine Grill makes contact with the hood when closed
- c. All engine compartment firewall below and around front windshield.
- d. All Upper Control Arms on previously installed ISS equipped vehicles
- e. All Steering Arms near the Ball Mount on previously installed ISS equipped vehicles
- f. All field welding repairs

3.2.2.3 Hull Surface Preparation.

After inspection and repair of cracks, the hull surfaces and applicable external components shall be prepared for painting in accordance with TM 4750-OD/1. The hull and components shall be painted in accordance with TM 4750-OD/1 Chapter 2. The specified topcoat color shall be FED-STD-595, FS 33446, tan 686A, on exterior surfaces. The specified interior color shall be a MIL-PRF-22750 Class H Grade B semi-gloss tan corresponding to FS 23446, tan 686A.

Requirements:

1. Zinc-rich primer per CID A-A-59745 shall be applied over abrasively blasted steel surfaces (including armor steel) that shall have a minimum 1-mil profile and be blasted to a near white metal finish (SSPC SP-10 or NACE No. 2). Zinc-rich primer per CID A-A-59745 shall be applied per manufacturer's instructions to 2.5 to 3.5 mils dry film thickness (DFT), but at least 1-mil greater than the profile thickness.
2. CARC Epoxy primer (EP) MIL-DTL-53022 or MIL-DTL-53030 Type II or III shall be applied to a thickness of 3 to 5 mils DFT in accordance with Section 2.5 of TM 4750-OD/1.
3. The exterior topcoat, MIL-DTL-53039 or MIL-DTL-64159 shall be applied to a DFT of 2 to 4 mils.

4. In the case of interior surfaces, interior topcoat, MIL-PRF-22750 shall be applied in one coat to the required DFT of 2 to 4 mils or two coats of 1 to 2 mils each.

3.2.2.4 Vehicle Repairs.

Deficiencies noted during the Phase I LTI shall be repaired or replaced. The following tasks are required to support this IROAN effort:

- a. The Contractor shall install all previously un-installed referenced MI's/TI's, and/or TB's/ECPS/SANs as required by the current modernization strategy, to bring the Cougar to Condition Code "A" in the most updated approved configuration and capability. Refer to Appendices G-J for Capability Insertions. CDRL C002 and CDRL C003

- b. The Contractor shall replace all missing assemblies and missing piece parts of those assemblies to return the vehicles to a Condition Code "A" condition.

Note

For missing assemblies & missing piece parts not covered by one of the MI, TI, TB, ECP, SAN, etc., then the Contractor is responsible for purchasing and replacing any missing assemblies or piece parts on the vehicle.

- c. The Contractor shall perform all Preventative Maintenance Checks and Services as required IAW TM 11202D-OR.
- d. The Contractor shall replace all fluids and filters IAW TM 11202D-OI.
- e. The Contractor shall repair/replace all unserviceable assemblies and piece parts of those assemblies if the assemblies and/or piece parts are found unserviceable in accordance with best commercial practices.
- f. The Contractor shall replace broken, unserviceable and/or missing hardware including nuts, bolts, screws, washers, turn-lock fasteners, safety wire, and one-time use items IAW TM 11202D-OI.
- g. The Contractor shall ensure proper hardware locking devices are present on all moving mechanical assemblies.
- h. The Contractor shall install/replace hardware supplied with commercial parts unless specifically prohibited.
- i. The Contractor shall ensure that all Cougar engines are of current production configuration consisting of the Caterpillar C7 Engine, Build Number 298-6151, with the latest 10 groove pulley arrangement and fan clutch, NSN 2815-01-556-1644. The Contractor shall perform a Pre-Shop Assembly (PSA) before performing Dynamometer testing on all Cougar engines and ensure that they meet OEM specifications and all accessories are applied and are Condition Code "A".

Note

With application of the 570 Alternator Upgrade the NSN for this engine (noted in Paragraph 3.2.2.4.i) is changed to 2815-01-615-4535 which is currently reflected in latest version of the Cougar IBOM.

j. The Contractor shall ensure that all Cougar transmissions are of current production configuration consisting of the Allison 3500 Transmission, GEN IV, NSN 2520-01-547-4017. The Contractor shall perform Dynamometer testing on all Cougar transmissions and ensure that they meet OEM specifications and all accessories are applied and are Condition Code "A".

Note

The NSN for the Allison 3500 Transmission, GEN IV, NSN 2520-01-547-4017 is being phased out and to be used until all stock has been exhausted. The approved replacement is NSN 2520-01-580-9860 which is currently reflected in latest version of the Cougar IBOM.

k. The Contractor shall ensure that all Cougar transfer cases are configured to the current production configuration consisting of the Cushman 315N Transfer Case, NSN 2520-01-561-1293. The Contractor shall perform Spin testing on all Cougar transfer cases and ensure that they meet OEM specifications and all parts, linkages and accessories are applied and are Condition Code "A".

Note

Refer to OEM Service Manual to identify correct version of Cushman 315N Transfer Case utilized on vehicle.

l. The Contractor shall inspect 100% of installed Overhead Gunners Protection Kits (OGPK). Vehicles received with MCTAGS installed will be replaced with OGPK. Vehicles that arrive without a turret will have the OGPK installed. The Contractor will ensure all OGPK turrets have Improved Turret Drive System (ITDS) and M1114 Turret Bearing Catcher Ring installed upon completion of IROAN. Any Long Lead Time concerns related to Repair Cycle Time is to be reported to PEO LS PMM-207 personnel and LOGCOM representative on the Production Status Report CDRL A001. PEO LS PMM-207 will in turn provide direction via LOGCOM on repair, replacement or Selective Interchange of turrets or turret parts in accordance with guidance given in this section and the government documents and publications referenced in this PWS:

1. M1114 Turret Bearing Catcher Ring - Ensure rotation with required amount of torque
2. ITDS components - Ensure functionality of electrical components and to ensure motor meets torque and speed requirements

m. The Contractor shall inspect 100% of the following parts and repair/replace in accordance with guidance given in this section and the government documents and publications referenced in this PWS:

1. Ballistic Glass - In accordance with Appendix F and MIL-PRF-46108
2. Tires - IAW OEM wear specifications
3. Brake Drums
4. Steering Wheel - For end play
5. Front End - Alignment
6. Cougar ISS Upper Control Arms - Cracks, fractures or deformation damage
7. Cougar ISS Steering Arms - Cracks, fractures or deformation damage
8. Drive Shaft between Transfer Case and Transmission
9. Spall liners
10. Nuclear, Biological and Chemical (NBC) System - Inspect where installed.
11. Vehicle Electrical Harnesses
12. Ibis Tek Light Kits - Check for operability and completeness of light assemblies. Install kits where not installed.
13. Turret Brush Ring for damage and/or missing mounting hardware.
14. Turret Hatch Hinge for operability damage and/or missing mounting hardware.
15. Steering Shaft and U-Joints for operability, damage and/or missing mounting hardware.

n. The Contractor shall replace 100% of the following parts:

1. Wiper Blades
2. Air hoses, both metallic and non- metallic
3. Coolant hoses
4. Hydraulic fittings, quick disconnects and hoses
5. Drive belts
6. Gauges in Instrument Panel (all Instrument Panels will be blasted, primed and painted FS 23446 tan 686A)
7. OEM supplied data plates and markings and replace with IROAN Data Plate
8. Headlight/Brake Lamp/Marker Light assemblies
9. Light Bulbs
10. Winch Cables
11. Brake Shoes and all associated hardware - Springs and Brake Pistons
12. Mud-flaps
13. Tie Rod Ends and Boots
14. Ball Joint Boots
15. Batteries and Battery Cables
16. Laminate on all windows that are not replaced

3.2.3 Phase III – Audits, Inspection, Testing, and Acceptance.

The Contractor will notify the PEO LS PMM-207 Program Manager, Mine Resistant Ambush Protected (PM-MRAP) Vehicles in advance of required Special Audits on Marine Corps MRAP variant product lines.

The PEO LS PMM-207 may send a delegate to accompany the audit team during the audit. The Contractor's audit team lead will identify to the Assistant Program Manager for Engineering, Mine Resistant Ambush Protected Vehicles (APM (E)-MRAP) the audit team representative prior to each scheduled audit. The PEO LS PMM-207 delegate will fully coordinate and cooperate with the

audit team. The audit team will provide a copy of the audit report to the APM (E)-MRAP to include Corrective Action Requests (CAR), root-cause, and corrective actions taken to prevent recurrence.

The Contractor's Quality Division will perform two types of audit; Element and Special. PEO LS PMM-207 will be provided the published schedule for the Element Audits upon request. PEO LS PMM-207 office will be notified as soon as special audits are determined to take place.

Descriptions of the two types of audits follow:

- a. "Element" audits are scheduled and published in February for the year. These audits are comprised of a Lead Auditor and audit team members. Element audits are thorough reviews of a particular element of the ISO 9001:20__ and past non-conformances identified and corrected in that element for the prior year.
- b. "Special" audits are initiated by "triggers" and normally have a much more narrow scope. Triggers may be a request by a manager or in-plant engineer, request from a customer, defect trends, a planned change in the process or a serious defect found at final inspection. Special audits are conducted over a one or two day period. Depending on the trigger, the audit will be conducted within 24 hours to 2 weeks.
- c. Audit criteria should be based on repeated, non-conformances from the vehicle final inspection as well as from using unit complaints.

An effective and collaborated communication between the Contractor and PEO LS PMM-207 will be maintained for continuous improvement process to meet our ultimate, common goal to support our war fighters by providing on time and defect free products.

Inspection, testing and acceptance of the Cougar shall be conducted in accordance with the Final Inspection Report (FIR) Checklist in Appendix D, directives contained within this PWS and appropriate Cougar MIL-STD Technical Manuals (TMs) below:

- d. TM 11202D-OR – Cougar Operator's Manual
- e. TM 11202D-IN – Cougar Field Level Maintenance Manual
- f. TM 11202D-OD – Cougar Repair Parts and Special Tools List (RPSTL) Manual
- g. TM 11202D-OD/2 – Technical Manual Supplement for the MRAP Cougar Family of Vehicles
- h. TM 11202K-OI/1 – Technical Manual Maintenance Supplement ISS Brake Upgrade for Cougar MRAP
- i. TM 11202K-OR/1 – Repair Parts and Special Tools List (RPSTL) For Cougar MRAP Gunner's Protection Package

3.2.3.1 Acceptance.

The Contractor will notify the MARLOGCOM Representative/ COR and PEO LS PMM-207 personnel at least 48 hours in advance of the final acceptance (Green Tagging) process. If PEO LS PMM-207 or delegates are not available for final acceptance, the contractor shall request an alternate date. PEO LS PMM-207 will send a delegate to perform a joint, final inspection of the vehicle referred to a "Customer Acceptance" inspection. All vehicle inspection criteria, testing and rebuild records and reports will be available for review and provided electronically to PEO LS PMM-207 Equipment Specialists and/or PEO LS PMM-207 Field Service Representatives (FSR) or other delegate prior to inspection. During the final acceptance process at the production facility, the Contractor's QA Division will allow access to PEO LS PMM-207 Equipment Specialists

and/or PEO LS PMM-207 Field Service Representatives (FSR) or delegate, for all variants, to review and audit their entire “Yellow Tagging” procedures from LTI to Final Assembly along with adequate documentation, certifications, etc. as applicable. The Contractor shall be responsible for correcting any deficiencies identified during the final inspection/testing.

3.2.3.1.1 FIR Reports.

Upon final inspection and acceptance by PEO LS PMM-207 or its delegate, the Contractor shall provide a FIR Report for each vehicle, CDRL B002.

3.2.3.2 Rejection.

Failure to comply with any of the specified requirements listed herein shall be reason for rejection by PEO LS PMM-207. The Contractor shall, at no additional cost to the Government, correct the deficiencies and repeat the verification until an acceptable compliance with acceptance test procedures is demonstrated.

3.3 Government Furnished Equipment (GFE)/Government Furnished Materiel (GFM).

Table 2 identifies material the Government has on hand and will provide upon request as GFE/GFM to support this IROAN effort should the vehicle require replacement or repair of these items. The Contractor, in accordance with FAR PART 45, shall be responsible for receipt, accountability, security, storage, and reporting requirements for the GFE provided, CDRL A007. The Contractor shall return any unused GFE in the original condition as received to LOGCOM to be returned to PM MRAP, Cougar Program stores. Any repairs required as a result of Contractor possession and use shall be borne by the Contractor at no cost to the Government. The Management Control Activity (MCA), Marine Corps Logistics Command (LOGCOM), Marine Corps Logistics Base, Albany, GA will coordinate GFP request and maintain a central control system on all government assets with the performing activity or another service possession. The performing activity or other service will be notified of the availability of GFP. The performing activity or other service shall be responsible for receipt, accountability, security, storage, and reporting requirements under those processes for the GFP provided. The performing activity or other service shall acknowledge receipt of GFP to the MCA within 10 days of receipt. The performing activity will receipt in Wide Area Work Flow (WAWF) as a Vendor Property Receiver. The performing activity will return the GFP in WAWF as a Vendor Property Shipper. GFP shall be returned in the original condition as received. Any repairs required as a result of performing activity possession and use shall be borne by the contractor at no cost to the government. The requiring activity must authorize any deviations.

If Organic source of repair is mandated, assets being worked at a Marine Corps Facility shall NOT be considered GFP.

For the purposes of this PWS, GFP items are to be reported to the OSD IUID Registry and Marine Corps TDS. In compliance with GFP requirements, DoD Contractors will electronically submit UII data to the Marine Corps TDS and OSD IUID Registry for GFP in their possession. When processing in WAWF, this OSD IUID Registry will automatically be updated with the appropriate information.

Table 2.

Reference Material	Item	Part Number	NSN
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Reference Material	Item	Part Number	NSN
COUGARECP-10008	Safety Warning Labels for MRAP Vehicles	0-54	N/A
TB C00084 REV B	Modify Rear Tow Points to Accept MTRV Tow Bar	10014879	N/A
TB C00106 REV C	Release a 570A Alt Mod for Cougar Fleet Modernization	10019789	N/A
TM 11202D-OD/2			
TB C00110	Fuel Tank Protection Upgrade Kit (w/ Tanks)	10020066	2910-01-590-5420
TB C00108 REV A	AFES Modernization	10024163	6350-01-590-5440
TB C00111 REV B	Transfer Case Restraint Kit (A1)	10023633	3040-01-590-5300
TM 11202D-OD/2			
TB C00107 REV A	First Responder (A1)	10023161	2540-01-590-5569
TM 11202D-OD/2			
TB C00120	Roof Top Mount for CVRJ – REF GOVTECP10054	10024348	N/A
TM 11202D-OD/2			
TB C00097 REV F	CAT I ISS TAK4 Upgrade (23.1 K FR-25K RR)	3813062	2530-01-580-2750
TM 11202D-OI			
TM 11202D-OD			
TB C00110	Fuel Tank Protection Upgrade Kit (w/o Tanks)	10032533	N/A
TB C00127	CAT I A1 Seat Survivability Upgrade	10033818	N/A
TM 11202D-OD/2			
TB C00131	4x4 ISS Brake Upgrade	10044063	N/A
TM 11202K-OI/1			
MI 11202D-IN/1	Door Window Seam Armor (CAT I)	M6211	N/A
COUGARECP-10028FR2A0			
MI 11202D-OR/3	Rollover Detection Warning System (RDWS)	6406665G1	2590-01-616-8378
COUGARECP-10017FR2A0			
MI 11202K-OR/2	Gunners Accessory Package 2.0	14003559	N/A
COUGARECP-10020			
MI 11202K-OR/1	Neptune Ammo Storage Kit	19200-13034717	8140-01-610-6186
COUGARECP-10012			
TI 11202D-OR/1	Stowage Safety and Awareness Kit	12563955	2540-01-603-7739
COUGARECP-10007F			
COUGARECP-10021	TOCNET, MRAP Kit A&B Cougar CAT I	5485320-001	N/A
MI 11202I/11202J-IN/1	Improved Turret Drive System (ITDS)	6452810-200M1	1005-01-591-0452

Reference Material	Item	Part Number	NSN
COUGARECP-10009			
MI 11202I/11202J-IN/1	Turret Catcher	13039096-1	2510-01-603-7727
COUGARECP-10009			
MI 11202/11291-IN/3	CAT II GPP KITS	1626	2540-01-568-4016
COUGARECP-10010FR0A0			
MI 11202/11291-IN/3	CAT II Gunners Platform Upper Assembly	1751	N/A
COUGARECP-10010FR0A0			
COUGARECP-10021	CVRJ A-Kit Installation Cougar CAT I	09003G2001	N/A
COUGARECP-10021	Cougar Whale Tail Antenna Mounting Kit	529236	N/A
COUGARECP-XXXX	Cougar Egress Modification	XXXXXX	XXXXXXX
COUGARECP-10037R1	GS2R Seat Only	103-000	N/A
MI 11588C-OD/1			

3.3.1 Vehicle Installed Government Furnished Equipment (GFE).

Upon inspection of vehicle to be inducted, additional GFE found to be installed in the vehicle shall be inspected, inventoried and reported to Cougar Program Office for further action. If repairs are needed, the contractor shall conduct the necessary repair actions on vehicle mounted GFE to return it to Condition Code "A". Vehicles will have MRAP Communication Suite Interface Material kits installed to accommodate use of all authorized configurations (Appendix K). Any wiring and bracketry that can be reused will remain in the vehicle to facilitate its use as needed. Repair procedures will be in accordance with TI 11202D-OD/1 and TI 11202D-OD/2 as referenced in this PWS.

3.4 Contractor Furnished Materiel (CFM).

The Contractor may requisition materiel as required in the performance of the PWS through the DOD Supply System or procure commercially. DLM 4000.25-1 (MILSTRIP), Chapter 11, provides guidance to Contractors on the requisitioning process. The Contractor's decision to utilize CFM procured from the DOD Supply System or commercially shall be based upon cost effectiveness, availability of materiel, and the required completion/delivery date. CDRL A008.

3.5 Packaging, Handling, Storage and Transportation (PHS&T)

- a. USMC Organic Depots.

(1) Principle End Items (PEIs) - The Distribution Management Center (DMC) shall be responsible for Preservation, Packaging, and Preparation (PP&P) for shipment of Principal End items (PEIs) being rebuilt by the Marine Depot Maintenance Command (MDMC) under the terms of this PWS. DMC shall prepare items scheduled for long-term storage or shipment to overseas destinations shall be in accordance with the Level "A" requirements (unless otherwise directed) of MIL-STD-3003(AT) and MIL-STD-2073-1, Method 10 (Physical protection). DMC shall prepare items scheduled for domestic shipment for immediate use or short-term storage shall be in accordance with Level "B" requirements. This ONLY applies to PWSs for USMC PEIs undergoing rework at USMC depots.

(2) Secondary Repairables (SecReps) and select PEIs - The MDMC shall be responsible for Preservation, Packaging and Packing (PP&P) for shipment of all Secondary Repairables (SecReps) and select PEIs being rebuilt by MDMC under the terms of this PWS. MDMC shall prepare all items rebuilt for storage, domestic shipment or transit in accordance with the Level "A" requirements of MIL-STD-3003(AT) and MIL-STD-2073-1, Method 10 (Physical protection). This statement applies to PWSs for USMC SecRep's and select PEI's undergoing rework at USMC depots. MDMC shall also be responsible for PP&P for shipment of secondary repairables and PEI's rebuilt for other Services/Customers under the terms of this PWS.

b. DIMSA or Commercial Source of Repair (SOR)

(1) SecReps and PEIs - The MDMC shall be responsible for PP&P for shipment of the SecReps and PEIs being rebuilt under the terms of this PWS. The DIMSA or Commercial SOR shall prepare all items rebuilt for domestic shipment or transit considering immediate use upon receipt by customer and in accordance with the requirements of MIL-STD-3003(AT) and MIL-STD-2073-1, Method 10 (Physical protection). Items scheduled for domestic shipment for immediate use or shipment to overseas destinations shall be Level "B", Drive-on/Drive-off. Items being prepared for overseas shipment shall have a label affixed which reads, "NOT FOR WEATHER DECK STORAGE". Items scheduled for shipment to Maritime Prepositioned Ship (MPS) shall be Level "B", MPS Modified Drive Away.

(a) Drive-on/Drive-off - Item batteries shall be hot and connected to the vehicle electrical system. Fuel tank shall be 1/4 full. The air intake, exhaust and brake systems, drive train and gauges will not be preserved.

(b) MPS - NALEB Modified Drive Away - Item batteries shall be hot and connected to vehicle electrical system. Fuel tank shall be filled 3/4 full. Air intake system, exhaust and brake systems, and gauges will not be preserved. Fire extinguisher bracket and seats (all) shall be installed.

c. Marking and Identification - For shipment and storage of all SecReps and PEIs, marking shall be in accordance with MIL-STD-642 & MIL-STD-129, ensuring the use of the Military Shipping Label (MSL).

d. The Marine Corps will provide the Contractor with the shipping address(es) for delivery of the repaired equipment. The Contractor shall be responsible for arranging for shipment

to the predestinated site(s). The Marine Corps will be responsible for transportation costs associated with the shipping the subject equipment to and from the Contractor

3.6 Quality Assurance Provisions.

The Repair Facility shall provide and maintain a Quality System that, as a minimum, adheres to the requirements of ANSI/ISO/ASQ Q9001-20__, Quality Management System-Requirements. The program shall ensure quality throughout all areas to include fabrication, processing, assembly, inspection, test, maintenance, and preparation for delivery and shipping. Unless otherwise specified in the contract, the Repair Facility shall be responsible for performance of all inspection requirements. PEO LS PMM-207 or their designated representative reserves the right to perform any of the inspections set forth in the contract where such inspections are deemed necessary to assure products and services conform to the prescribed requirements. The contractor shall provide a copy of their repair facility Quality Assurance Program Plan to the Government. CDRL A005

3.7 Unique Identification (UID).

The Contractor shall implement an IUID program in accordance with and as defined in MIL-STD-130,DFARS clause 252.211-7003, DFARS clause 252.211.7007 to include all configuration changes. The Contractor shall ensure IUID tags are on any replacement item that is over \$5,000 in addition to those items deemed by the Government as a serially managed, mission essential or controlled inventory item in Paragraph 3.7.c. The Contractor shall update the DoD IUID Registry to identify all changed equipment that affects the IUID hierarchy. Bar coding and the 2-D IUID data matrix shall be machine-readable with common optical scanning devices and be accompanied by the corresponding human readable markings when practical. Applicable items shall be marked by a data plate that contains the IUID data matrix (whenever practical, the location of the marking on the item shall ensure its readability during normal operational use). See DFARS 211.274-2, Policy for IUID. CDRL A006

a. Vehicle Data plate. The Contractor shall ensure all vehicle data plates are permanently affixed. If missing, the Contractor shall provide data plates marked with a two dimensional UID data matrix defined in MIL-STD-130. The vehicle data plate shall use MIL-STD-130, Figure 1, as a guide. All data plate information shall also include bar coding. The data plate shall be located in the driver’s compartment attached to the transmission tunnel in the location of the original data plate.

The Contractor that performed the IROAN	_____
USMC No	_____
Nomenclature	_____
NSN	_____
Part Number	_____
ID Number	_____
Original Manufactures CAGE Code	_____
Original Manufactures Registration Number	_____
Odometer reading at Limited Technical Inspection	_____
Curb Weight	_____
Payload Maximum	_____
Gross Weight Maximum	_____
Date (of IROAN)	_____

Figure 1

b. Configuration Item Data Plate. Shall be a minimal dimension of .750 in. X .20 in. X .020 in. thickness Flat Black Aluminum Laser etched. The 2-D Data Matrix, shall not be less than

1 cm wide and no less than 40% in contrast. The data plate shall be placed on a suitable and visible location. Parent child relationship shall be established. UID data plate is to be placed where the scanner can read the UID data plate while installed in truck.

The following information shall be etched on the new data plate:

1. Nomenclature: _____
2. National Stock Number: _____
3. Original Manufactures CAGE Code: _____
4. Original Serial Number: _____
5. Government Ownership Designation shall be: US PROPERTY
6. IROAN date: _____

c. Data Plate Location.

1. Cougar Vehicle. Data plate shall be placed on the driver's side door centered 1" beneath the vehicle serial number.
2. Cougar Engine. Data plate shall be placed on the rear of the engine's valve cover on driver side visible after mounting for scanning in the field where the scanner can read the UID data plate while the engine is installed in the truck.
3. Cougar Transmission. Data plate shall be placed on the end of the transmission where the scanner can read the UID data plate while the transmission is installed in the truck.
4. Cougar Transfer Case. Data plate shall be placed on the end of the transfer case where the scanner can read the UID data plate while the transfer case is installed in the truck.
5. Cougar Differentials. Data plates shall be placed on the differentials that are visible after mounting for scanning in the field where the scanner can read the UID data plate while the differentials are installed in the truck.
6. Cougar Alternator. The data plate shall be placed on a suitable and visible location where the scanner can read the UID data plate while the alternator is installed in the truck.

4.0. REPORTS.

4.1 Production Status Report.

Contractor shall provide Production Status Reports (Appendix B), CDRL A001 summarizing the progress and status of the IROAN effort.

4.2 Item Unique Identification (IUID) Marking Activity and Verification Report.

Contractor shall provide Item Unique Identification (IUID) Marking Activity and Verification Reports shall be delivered in accordance with CDRL A006 summarizing the progress and status of the IUID effort.

APPENDIX A - DEFINITIONS

1. **PURPOSE.** The definitions contained in this appendix are provided to assure a more complete understanding of the contents of this PWS.

2. **DEFINITIONS.**

2.1. **Capability Insertion.** Vehicle modifications identified as part of The Cougar Capability Insertion Program to assist in rapidly developing, integrating and fielding solutions to make the vehicles more survivable and effective.

2.2. **Modification.** Equipment modification consists of those maintenance actions performed to change the design or assembly characteristics of equipment systems, end items, components, assemblies, subassemblies, or parts in order to improve equipment functioning, maintainability, reliability, and/or safety characteristics.

2.3. **Condition Code "A".** Serviceable/issuable without qualification, new, used, repaired or reconditioned materiel which is serviceable and issuable to all customers without limitation or restriction, including materiel with more than six months shelf-life remaining.

2.4. **Repairable Item.** A repairable item is an item of supply subject to economical repair for which repair (accomplished under a repair contract) is considered in satisfying computed requirements at any inventory level. A major end item (aircraft, ship, combat vehicle, etc) is not normally considered a repairable item. Examples of repairable items include, but are not limited to, engines, alternators, transmissions, and electronic circuit boards.

APPENDIX C

**MINE RESISTANT AMBUSH PROTECTED (MRAP)
COUGAR CAT I & II
LIMITED TECHNICAL INSPECTION (LTI)**

Inspector:	Date:
Vehicle Serial #:	Vehicle Type:
Miles/KM:	Hours:

Vehicle Type	NSN
CAT I A1	2355-01-552-5565
CAT I A1 ISS	2355-01-581-2392
CAT I A2	2355-01-564-3420
CAT I A2 ISS	2355-01-579-8929
CAT II A1	2355-01-552-5199
CAT II A1 ISS	2355-01-579-8931
CAT II A2	2355-01-564-3423
CAT II A2 ISS	2355-01-579-8920
CAT I A1 ISS SABER/TOW	2355-01-589-1279
CAT II A2 ISS Ambulance	2355-01-583-1029

Instructions:

- i. Upon completion of this Limited Technical Inspection (LTI), all discrepancies and findings shall be annotated on form DA-2404 and provided to PEO LS PMM-207 and LOGCOM representatives for review at the beginning of the repair process.
- ii. Discrepancies approved for repair on the LTI and form DA-2404 shall be inspected during the FIR for completeness of the repair. The completeness of repairs and in-depth inspections will be accomplished using TM 11202D-OI.

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment/Remarks
1	Hull	Inspect hull armor plating for cracked or broken welds, bent or missing armor plates, or structural damage.		
2	Non-Skid Paint	Inspect non-skid painted surfaces: Front fender, fuel tank cover. Ensure coating is in good condition with no smooth spots.		
3	Exterior Ballistic Glass	Inspect all ballistic glass and laminate for damage.		
4	Fuel Tank	1. Inspect fuel tank sending unit and wiring for any signs of damage.		
		2. Inspect fuel tank for leaks, fuel tank cap, chain and strainer for damage or miss hardware.		
		3. Inspect fuel hose connections are tight and not leaking		
		4. Check fuel tank mounting straps for loose or missing hardware, damaged or missing rubber isolators, or any sign of visible damage.		
		5. Inspect fuel tank ballistic blankets for damage and/or missing blankets.		
5	Fuel Tank Cover	1. Inspect fuel tank ballistic cover for loose and missing mounting hardware. Damage or missing door locks hardware.		
		2. Inspect fuel tank ballistic cover for damage, missing or damaged hinges.		
J	Backup Alarm (A2 Only)	Check backup alarm for loose or missing mounting hardware, or any visible damage.		
J	Work-Light Connection	1. Inspect connector for any signs of arcing, burnt, or damage connector.		
		2. Inspect connector for loose or missing mounting hardware.		
J	NATO Connector	1. Inspect NATO connector for any signs of arcing, burnt, or damage connector.		
		2. Inspect NATO connector for loose or missing mounting hardware.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
	NATO Connector Cont.	3. Inspect for correct cable connections on NATO plug to ensure polarity is correct		
J	Glad-Hand Supply and Control Connections	1. Check supply and control air coupling connections for loose or missing mounting hardware, missing or deteriorated coupling rubber grommet, or missing coupling cover.		
		2. Check for operational relief valve on glad hands on suspension with ISS.		
J	Trailer Connection	1. Inspect connection for any signs of arcing, burnt, or damage connector.		
		2. Inspect connection for loose or missing mounting hardware.		
J	Tow Pintle	1. Inspect pintle for cracked or broken welds, bent or missing arms, missing mounting hardware, or structural damage.		
		2. Test operation of upper pintle jaw.		
J	Doors	Test operation of doors and latches.		
J	110 V AC Outlet	1. Inspect outlet for any signs of arcing, burnt, or damage connector.		
		2. Inspect outlet for loose or missing mounting hardware.		
J	Steps and Ladder	1. Check for missing, cracked, or damaged rungs.		
J	Rear Fenders	Inspect fender for cracked or broken welds, bent or missing armor plates, or structural damage.		
J	Front Fenders	Inspect fender for cracked or broken welds, bent or missing armor plates, or structural damage.		
J	Exterior Stowage Bins	1. Check for loose or missing mounting hardware.		
		2. Check stowage compartment doors for proper operation and broken or missing latches.		
J	Exhaust System	Check exhaust pipes, muffler, clamps, and heat shields for dents, leaks, loose clamps, missing or loose heat shields, restrictions, or any visible signs of damage.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
J	Exterior Air Supply System (120psi) Components	1. Check hoses and fittings for leaks.		
		2. Check air coupling connections for loose or missing mounting hardware, missing or deteriorated coupling rubber grommet, or missing coupling cover.		
J	Hood	1. Inspect hood armor plating for cracked or broken welds, bent or missing armor plates, or structural damage.		
		2. Check hood for missing plates and loose or missing mounting hardware.		
J	Front Grille	1. Inspect grille latches for cracked or broken welds, bent or missing armor latches, or structural damage.		
		2. Check mounts for loose or missing mounting hardware.		
J	Windshield Wipers	1. Check operation of windshield wipers to ensure the arms move smoothly		
		2. Check tension on windshield wiper arm and wiper blades for excessive wear, cracking, or deterioration		
J	Blackout Drive Light	1. Inspect for loose or missing hardware.		
		2. Inspect for cracked or missing lens.		
J	IR Drive Light	1. Inspect for loose or missing hardware.		
		2. Inspect for cracked or missing lens.		
J	Side Marker Lights	1. Inspect for loose or missing hardware.		
		2. Inspect for cracked or missing lens.		
J	Remote Winch Control Connector	Inspect for loose or missing hardware.		
J	Front Signal Lights	1. Inspect for loose or missing hardware.		
		2. Inspect for cracked or missing lens.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
J	Headlight	1. Inspect for loose or missing hardware.		
		2. Inspect for cracked or missing lens.		
J	Cooling Fan	1. Inspect cooling fan for cracked blades or missing blades		
		2. Inspect cooling fan pulley for looseness, warping, seizing or worn bearings.		
J	Idler Pulley	1. Check idler pulley for proper spring tension.		
		2. Inspect idler pulley for looseness, wobbling, seizing or worn bearings.		
F	Vibration Damper	1. Inspect vibration damper for loose or missing mounting bolts.		
		2. Inspect vibration damper for wobble or any signs of visible damage.		
F	Engine Mounts	1. Inspect engine mounts for loose or missing mounting bolts.		
		2. Inspect engine mounts for deteriorated rubber mounts or any signs of visible damage.		
F	Valve Cover	Check valve covers for damage or loose or missing mounting hardware.		
F	Serpentine Drive Belt	Check serpentine belt for cracks, frays, and proper tension.		
38	Alternator	1. Check alternator, mounting bracket, and adjusting bracket for loose or missing mounting hardware.		
		2. Inspect alternator cooling fan for bent fins or looseness.		
		3. Inspect alternator pulley for looseness, wobbling, seizing, or worn bearings.		
		4. Inspect all alternator wiring for damaged insulation, deterioration, bare conductors, or any visible damage.		
		5. Inspect alternator cabling for cut/frayed insulation and corrosion.		
F	Water Pump	1. Inspect water pump for loose or missing mounting hardware.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
	Water Pump Cont.	2. Check water pump hoses for cuts, abrasions, or loose clamps.		
		3. Check water pump pulley for looseness, warping, seizing or worn bearings.		
F	Oil Filter Housing	1. Check oil filter housing for loose or missing mounting hardware.		
		2. Inspect oil filter housing hose for cuts, abrasions, or loose fittings.		
F	Turbocharger and Waste gate Actuator	1. Check turbocharger and waste gate actuator for loose or missing mounting hardware.		
		2. Inspect turbocharger housing for cracks or signs of overheating.		
		3. Inspect waste gate actuator rod for unobstructed movement or seizure.		
		4. Inspect waste gate actuator vacuum hose for signs of deterioration and cuts.		
		5. Check turbocharger oil feed and return lines for any signs of damage		
F	Exhaust Brake	1. Inspect exhaust brake hoses and fittings for loose or damaged fittings.		
		2. Inspect exhaust brake actuation solenoid for proper operation.		
		3. Inspect mounting clamps for damage and leaks.		
		4. Inspect air actuation hose for cuts, abrasions or restrictions.		
		5. Check exhaust pipe from exhaust brake for cracks, deterioration, or any visible signs of damage.		
F	Thermostat Housing	Inspect thermostat housing for cracks and loose or missing mounting bolts.		
F	Exhaust Manifold	1. Inspect exhaust manifold for cracks, deterioration, or any visible signs of damage.		
		2. Check exhaust manifold for loose or missing mounting bolts.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
	Exhaust Manifold Cont.	3. Inspect gaskets between exhaust manifold and engine and turbocharger for signs of leakage.		
F	Transfer Case Cooler	1. Check transfer case cooler fins for damage, foreign material, or restrictions.		
		2. Check transfer case cooler for loose or missing mounting bolts, deteriorated or missing rubber isolator mounts or cracked or damaged mounting brackets.		
		3. Inspect transfer case cooler hydraulic hoses for cuts, abrasions, kinks, and restrictions.		
F	Secondary Fuel Filter, Housing, and Primer Pump	1. Check fuel filter housing for loose or missing mounting bolts.		
		2. Check primer pump for proper operation.		
F	Primary Fuel and Water Separator	1. Inspect fuel/water separator for loose or missing mounting bolts.		
		2. Inspect fuel/water separator for cracks, damaged drain valve or any signs of visible damage.		
F	Intake Air Heater Relay	1. Check relay for loose or missing mounting bolts.		
		2. Check intake air heater high voltage wire for cuts, abrasion, and any visible signs of damage.		
F	Air Inlet Manifold	Inspect air inlet manifold and elbow for loose or missing mounting bolts.		
F	Crankcase Breather	1. Inspect crankcase breather for loose or missing mounting bolts.		
		2. Inspect crankcase breather hose for restrictions, loose clamp, tears, or deterioration.		
F	Hydraulic Unit Injector Pump	1. Inspect hydraulic unit injector pump for cracks, loose mounting bolts, or any signs of visible damage.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
	Hydraulic Unit Injector Pump Cont.	2. Inspect hydraulic unit injector pump fuel and oil hoses for restrictions, cuts, abrasions, deterioration, or any signs of damage.		
F	Air Compressor	1. Inspect air compressor for loose or missing mounting bolts.		
		2. Inspect oil, coolant and air hoses for restrictions, cuts, abrasions, deterioration, or any signs of damage.		
F	Starter	1. Check starter for loose or missing mounting bolts.		
		2. Inspect starter ground and positive studs for tight connections.		
F	Engine Compartment Wiring and Components	1. Inspect engine compartment for damaged electrical components: relays, circuit breakers, sensors, or fuses.		
		2. Check all engine compartments wiring for cuts, damaged insulation, bare wires, and any signs of visible damage.		
F	Engine Control Module (ECM)	1. Check ECM for deteriorated or missing rubber mounts and loose or missing mounting hardware.		
		2. Check ECM main harness connector for cracks or any signs of visible damage.		
		3. Inspect ECM for missing or damaged test port cover, if applicable.		
		4. Check batteries and power leads for deterioration, damaged connectors, bare wire, corrosion, or damaged insulation.		
		5. Inspect battery disconnect switch cabling and connectors for cuts, frayed insulation, or corrosion.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
F	Engine Compartment Air Conditioning Components	Check high pressure switch for looseness, cracks, or damaged electrical connectors.		
F	Shocks	1. Inspect shocks for missing, bent rods, oil leaks, or any sign of visible damage. 2. Inspect shocks for deteriorated shock mount bushing or loose or missing mounting hardware.		
F	Suspension	1. Check leaf springs for cracked or missing leaves. 2. Inspect U-bolts for cracks, bends, or loose mounting hardware. 3. Inspect leaf spring mounts for cracks or loose or missing mounting hardware. 4. Inspect rear axle torque arms for missing mounting hardware, bends, cracks, or inability to adjust. 5. Check bump stop for dry rot or missing parts.		
F	Drive Shafts and Universal Joints	1. Check drive shafts for bends, twists, cracks, or other visible damage. 2. Inspect drive shaft for loose or missing companion flange mounting hardware. 3. Check drive shaft slip joints for excessive play. 4. Check universal joints for cracks and worn or missing needle bearings. 5. Check drive shafts and universal joints for missing grease fittings and improper lubrication.		
F	Steering Gear and Linkage	1. Check steering gear, hoses, and fittings for any signs of leakage. 2. Inspect steering gear for loose or missing mounting hardware. 3. Inspect Pitman arm for cracks, bends, or loose or missing pinch bolt.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
	Steering Gear and Linkage Cont.	4. Inspect drag link for loose ball joints, bends, missing pinch bolts or will not adjust.		
		5. Inspect tie rod for loose ball joints, bends, missing pinch bolts or inability to adjust.		
		6. Check steering arm for cracks or loose mounting hardware.		
		7. Check tie rod arm for cracks or loose mounting hardware.		
		8. Inspect engine compartment steering linkage for worn or loose universal joints, support bearing, upper and lower steering knuckles, and damaged shaft splines.		
		9. Inspect steering assist cylinder for bent cylinder rod, loose ball joints or inoperability.		
F	Brake Components	1. Inspect slack adjuster for wear, bends, or any signs of visible damage.		
		2. Inspect slack adjuster for proper adjustment.		
		3. Inspect brake pads and brake shoe wear limits.		
F	Axles and Hubs	1. Inspect axles for restricted or missing breather hoses, breather caps, and vent lines.		
		2. Inspect axle input and output shaft yokes for cracks, excessive wear, and loose or missing mount nuts.		
F	Transmission	1. Check transmission for loose or missing bell housing bolts.		
		2. Check transmission output shaft and yoke for looseness.		
		3. Inspect transmission sensors, wiring and connectors for looseness, bare wires, or any signs of visible damage.		
M	Transfer Case	Check transfer case input and output shafts and yokes for looseness.		
M	Hull	Check hull access plates for missing plates and loose or missing mounting hardware.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
M	Interior Ballistic Protection Module (IBPM) Panels and Spall Liners	1. Inspect IBPM panels and spall liners for missing or excessive damage.		
		2. Inspect IBPM panels and spall liners for loose or missing mounting hardware.		
M	Interior Electrical Wiring and Components	1. Check all visible wiring inside the vehicle for cuts, damaged insulation, bare wires, and any signs of visible damage.		
		2. Check all interior electrical for damaged components: relays, circuit breakers, sensors, or fuses.		
M	Automatic Fire Extinguisher System (AFES)	1. Check battery backup module.		
		2. Inspect chemical bottle pressure.		
		3. Check lock wire on manual discharge handles.		
		4. Check for damaged or obstructed automatic sensors.		
		5. Check for damaged or obstructed discharge nozzles: interior, engine, and transmission locations.		
		6. Inspect hoses for cuts, abrasions, kinks, restrictions, or any signs of visible damage.		
		7. System electronic test using valid test set.		
M	Interior Ballistic Glass	Inspect all ballistic glass for damage.		
M	Searchlight	1. Verify searchlight operation.		
		2. Inspect lens, searchlight hull seal, and other damage.		

Item No.	Item to Be Checked	Procedure	Pass/Fail	Comment
M	Troop Hatch and Turret Hatch	1. Inspect hull armor plating for cracked or broken welds, bent or missing armor plates, or structural damage.		
		2. Test operation of hatches, latches, lift cylinders, and support rods.		
M	Lift Eye Rings	Inspect eye rings for cracked or broken welds, bent or missing rings, or structural damage.		
M	Engine Operation	1. Perform Engine Startup (AW TM 11202D-OR Manual, connect CAT ET software tool and ensure engine parameters are set.		
		2. Check engine oil for correct level and any oil contamination.		
		3. Inspect engine for leaks		
M	Starter Operation	Ensure starter engages normally and engine starts quickly without unusual noises.		
M	Transmission Operation	1. Check transmission for smooth shifting through all gear ranges.		
		2. Check transmission fluid for contamination or dilution (burned).		
		3. Inspect transmission for any signs of leaks.		
M	Transfer Case Operation	1. Check that transfer case shifts into all ranges: high, low and neutral.		
		2. Check for proper operation of Speed Limiting Circuit (SLC) in All Wheel Drive (AWD) and transfer case LO Speed mode.		
M	Brake Operation	Check that brakes function properly and stop vehicle effectively.		
M	Parking Brake Operation	With parking brake applied and engine at 600-900 rpm, shift transmission into the first gear.		
M	Steering Operation	Check steering to ensure there is no binding, stiffness, excessive play or shaking.		

APPENDIX D

**MINE RESISTANT AMBUSH PROTECTED (MRAP)
COUGAR CAT I & II
FINAL INSPECTION REPORT (FIR)**

Inspector:	Date:
Vehicle Serial #:	Vehicle Type:
Miles/KM:	Hours:

Vehicle Type	NSN
CAT I A1	2355-01-552-5565
CAT I A1 ISS	2355-01-581-2392
CAT I A2	2355-01-564-3420
CAT I A2 ISS	2355-01-579-8929
CAT II A1	2355-01-552-5199
CAT II A1 ISS	2355-01-579-8931
CAT II A2	2355-01-564-3423
CAT II A2 ISS	2355-01-579-8920
CAT I A1 ISS SABER/TOW	2355-01-589-1279
CAT II A2 ISS Ambulance	2355-01-583-1029

Instructions:

- i. Upon completion of this Limited Technical Inspection (LTI), all discrepancies and findings shall be annotated on form DA-2404 and provided to PEO LS PMM-207 and LOGCOM representatives for review at the beginning of the repair process.
- ii. Discrepancies approved for repair on the LTI and form DA-2404 shall be inspected during the FIR for completeness of the repair. The completeness of repairs and in-depth inspections will be accomplished using TM 11202D-OI.

ISS			
CAT I A1, CAT I A2, CAT II A1, CAT II A2 (Non ISS), CAT I A1 Saber/TOW, CAT II A2 Ambulance			
Item No	Item to be checked	Pass/Fail	Comment
GENERAL INSPECTION			
1	All hose ends associated with the TAK-4® ISS install are coated with Dow Corning 3140.		
2	All hardware associated with the TAK-4® ISS install are marked as torqued.		
3	Windshield washer fluid reservoir filled.		
4	Wheel lug nuts are marked as torqued.		
AXLE #1			
5	All hull mounts are properly welded to the hull.		
6	Hardstops are installed with the longer side facing the sideplate.		
7	Toe link castle nuts were torqued initially to 145 ft lbs and cotter pin installed correctly. Sample Value: Gage ID#		
8	Wheel ends and differential are full.		
9	All hose ends are coated with Dow Corning 3140.		
10	CTIS QRV vent tube installed and routed down.		
11	All 3/4 inch hardware was torqued to 375ft lbs. Sample Value: Gage ID#		
12	All 5/8 inch hardware was torqued to 210ft lbs. Sample Value: Cage ID#		
13	Differential lock sensor from straight axle installed and connected properly.		
14	All brake, CTIS, differential lock, and vent lines are connected.		
15	ABS and differential lock wiring harnesses are connected.		
AXLE #2			
16	All hull mounts are properly welded to the hull.		
17	Hardstops are installed with the longer side		
18	Wheel ends and differential are full.		
19	CTIS QRV vent tube installed and routed		
20	All 3/4 inch hardware was torqued to 375ft lbs. Sample Value: Gage ID#		

Item No	Item to be checked	Pass/Fail	Comment
21	All 5/8 inch hardware was torqued to 210ft lbs. Sample Value: Gage ID#		
22	Differential lock sensor from straight axle installed and connected properly.		
23	All brake, CTIS, differential lock, and vent lines are connected.		
24	ABS and differential lock wiring harnesses are connected.		
25	Timing marks lined up properly on the anti-sway bar and arms.		
26	Anti-sway bar link castle nuts were torqued initially to 145ft lbs and cotter pin installed correctly. Sample Value: Gage ID#		
27	RTV sealant has been applied to anti-sway bar splines and slot in arm, with excess removed.		
	AXLE #3		
28	All hull mounts are properly welded to the hull.		
29	Hardstops are installed with the longer side facing the sideplate.		
30	Wheel ends and differential are full.		
31	CTIS QRV vent tube installed and routed down.		
32	All 3/4 inch hardware was torqued to 375ft lbs. Sample Value: Gage ID#		
33	All 5/8 inch hardware was torqued to 210ft lbs. Sample Value: Gage ID#		
34	Differential lock sensor from straight axle installed and connected properly.		
35	All brake, CTIS, differential lock, and vent lines are connected.		
36	ABS and differential lock wiring harnesses are connected.		
37	Timing marks lined up properly on the anti-sway bar and arms.		
38	Anti-sway bar link castle nuts were torqued initially to 145ft lbs and cotter pin installed correctly. Sample Value: Gage ID#		

Item No	Item to be checked	Pass/Fail	Comment
39	RTV sealant has been applied to anti-sway bar splines and slot in arm, with excess removed.		
STEERING SYSTEM INSTALL			
40	System and reservoir is full.		
41	Steering gear poppets were set.		
42	Steering pump and system was primed.		
43	U-joints don't bind or go out of phase during operation.		
44	Steering shafts connected and splines are coated with Tef-Gel.		
AIR SYSTEM INSTALL			
45	No leaks in the air system.		
46	Check valves installed in the proper orientation before each of the existing reservoir tanks.		
47	All tubing and harnesses are secured through cushion clips or with cable ties.		
48	All seats and access panels were reinstalled.		
49	All tubing is free of kinks.		
AFTERCOOLER INSTALL			
50	Fire sleeve installed on braided 2001 line.		
51	Braided 2001 line is kept away from other nylon tubes or other heat sensitive material.		
52	All wire harness connections are connected.		
53	All tubing and harnesses are secured through cushion clips or with cable ties.		
54	Grounding terminal was connected when battery box was reinstalled.		
ELECTRICAL SYSTEM INSTALL			
55	All wire harnesses are secured through cushion clips or with cable ties.		
56	CTIS controller lighting is off in Black Out Mode.		
SUSPENSION ALIGNMENT			
57	All toe link jam nuts are tight.		
58	All toe link jam nuts have the washer bent over.		
59	All wheels are straight to a 1/16" toed in.		
FENDER REWORK			
60	All fenders have been reworked.		
61	No sharp edges on the fender exterior from the rework.		
Item No	Item to be checked	Pass/Fail	Comment
TRANSFER CASE COVER			
62	Cover does not contact any hoses or prop shafts.		

	SKYDEX FLOOR		
63	All panels are securely attached to the floor.		
	ROAD TEST		
64	No noise or vibration in axles.		
65	No heat buildup in axles (Place hand near axle to detect).		
66	No noise or vibration from prop shafts.		
67	CTI passes functionality test.		
68	No heat buildup on brakes (Place hand near axle to detect).		
69	Brake spring hold functional check.		
	REWORK		
70	Any associated FIR characteristics affected during rework have been rechecked.		
Crew Seat Support Structure (Seat Stanchions)			
CAT I A2, CAT II A2, CAT I A2 ISS, CAT II A2 ISS			
Item No	Item to be checked	Pass/Fail	Comment
1	Ensure each rear crew seat is equipped with a Seat Support.		
2	Inspect each rear crew seat support Vibration Damping Isolator Pad for correct adjustment and jam nuts are tightened.		
Seat Survivability			
CAT I A1, CAT I A1 ISS			
Item No	Item to be checked	Pass/Fail	Comment
1	Inspect Secondary and CTIS Air Tank mounts for loose or missing mounting hardware.		
2	Inspect Secondary and CTIS Air Tank hoses to ensure connections are tight.		
3	Inspect air lines and hoses in transmission tunnel area (interior and exterior) to ensure all connections have been made and are tight.		
4	Inspect Driver Dead Pedal for proper installation and paint.		
5	Inspect Air Tank Protection Box, CTIS controller Inspection Plate and Primary Air Protection Plate for proper installation and missing mounting hardware		
6	Inspect Weldment Storage Cover and Plate for missing mounting hardware.		
7	Inspect Radio Rack installation for loose or missing mounting hardware.		

Item No	Item to be checked	Pass/Fail	Comment
8	Ensure Skydex Panels have been installed on Crew, Driver, Co-Driver floor and Driver Dead Pedal.		
9	Inspect Driver and Co-Driver seat for loose or missing hardware and mounted correctly.		
10	Inspect Crew seats for loose or missing hardware and mounted correctly.		
11	Inspect 300A Inverter Fuse for loose or missing mounting hardware and ensure cables are connected and tight.		
12	Inspect all welded areas, exposed metal, and "45 degree hull" for CARC paint.		
13	Inspect weld areas.		
Transfer Case Restraint			
CAT I AI, CAT II AI, CAT I AI ISS, CAT II AI ISS			
Item No	Item to be checked	Pass Fail	Comment
1	Inspect Transfer Case mounts for missing or loose hardware.		
2	Inspect air lines and hoses in transmission tunnel area (interior and exterior) to ensure all connections have been made and are tight.		
3	Ensure hoses are connected to ISS After Cooler mounted inside fuel tank enclosure (co-driver side).		
4	Inspect weld areas for cracks.		
5	Inspect transfer case containment shield and weld areas to ensure CARC paint has been applied.		
Automatic Fire Extinguishing System (AFES)			
CAT I AI, CAT II AI, CAT I AI ISS, CAT II AI ISS			
Item No	Item to be checked	Pass/Fail	Comment
1	Check battery backup module.		
2	Inspect chemical bottle pressure.		
3	Check lock wire on manual discharge handles.		
4	Check for placement and damaged or obstructed automatic sensors.		
5	Check for placement and damaged or obstructed discharge nozzles: interior, engine, and transmission locations.		
6	Inspect hoses for cuts, abrasions, kinks, restrictions, or any signs of visible damage.		
7	Conduct system electronic test using valid AFES test set.		

First Responder			
All Cougar Vehicles			
Item No	Item to be checked	Pass/Fail	Comment
1	Inspect operation of First Responder unlatching arm to ensure the rear hatch can be unlatched from the outside using the First Responder tool when rear hatch combat lock is engaged.		
2	Inspect weld areas for cracks.		
3	Inspect First Responder weld areas to ensure CARC paint and any markings have been applied.		
Fuel Tank Protection			
CAT I A1, CAT II A1, CAT I A1 ISS, CAT II A1 ISS			
Item No	Item to be checked	Pass/Fail	Comment
1	Ensure a 60 gallon fuel tank is mounted on the driver side and a 10 gallon fuel tank is mounted on the co-driver side of the vehicle.		
2	Ensure fire suppression blankets surround both fuel tanks.		
3	Inspect fuel lines and air lines to ensure connections are tight.		
4	Inspect weld areas around fuel tank support brackets for cracks.		
5	Inspect Fuel Tank support bracket weld areas to ensure CARC paint has been applied.		
570 Amp Alternator			
All Cougar Vehicles			
Item No	Item to be checked	Pass/Fail	Comment
1	Inspect alternator mounts for loose or missing hardware.		
2	Ensure regulator set point is set to position 1 (on underside of regulator).		
3	Ensure serpentine belt has been routed correctly.		
4	Inspect cables and wiring for loose or missing hardware.		
5	Inspect routing of cables and wiring and ensure cables and wiring are secured with appropriate tiedowns.		
6	Inspect positive bus bar, located on battery box, to ensure rubber coating has been applied.		
7	Inspect negative bus bar, located on steering gear bracket, to ensure rubber coating has been applied.		
8	Inspect batteries for correct placement IAW vehicle battery connection diagram.		
9	Start engine and check battery gauge to ensure batteries are charging.		
Seat Survivability			
CAT II A1, CAT II A1 ISS			
Item No	Item to be checked	Pass/Fail	Comment
1	Inspect Secondary and CTIS Air Tank mounts for loose or missing mounting		

	hardware.		
2	Inspect Secondary and CTIS Air Tank hoses to ensure connections are tight.		
3	Inspect air lines and hoses in transmission tunnel area (interior and exterior) to ensure all connections have been made and are tight.		
4	Inspect Driver Dead Pedal for proper installation and paint.		
5	Inspect Air Tank Protection Box, CTIS controller Inspection Plate and Primary Air Protection Plate for proper installation and missing mounting hardware		
6	Inspect Weldment Storage Cover and Plate for missing mounting hardware.		
7	Inspect Radio Rack installation for loose or missing mounting hardware.		
8	Ensure Skydex Panels have been installed on Crew, Driver, Co-Driver floor and Driver Dead Pedal.		
9	Inspect 300A Inverter Fuse for loose or missing mounting hardware and ensure cables are connected and tight.		
10	Inspect all welded areas, exposed metal, and "45 degree hull" for CARC paint.		
11	Inspect weld areas for cracks.		
18K Winch			
CAT I A2, CAT II A2, CAT I A2 ISS, CAT II A2 ISS			
Item No	Item to be checked	Pass/Fail	Comment
1	Inspect winch mounting bracket for missing or loose hardware.		
2	Ensure winch cable pays out on top of winch drum.		
3	Inspect winch electrical cabling for correct routing and connections.		
4	Inspect winch fairlead for missing or loose hardware. Ensure rollers are secured correctly.		
5	Ensure safety hook and coupler halves are secured to the winch cable.		
6	i. Verify winch operation using WINCH switch on dash: (a) With vehicle BATTERY switch in ON position, press and hold top of WINCH switch (b) Have assistant verify that winch pays out wire rope until switch is released (c) Press and hold bottom of WINCH switch (d) Have assistant verify that winch reels in wire rope until switch is released.		
7	i. Verify winch operation using winch remote controller: (a) With vehicle BATTERY switch in ON position, push up on button of winch remote controller and verify that wire rope pays out (b) Push down on button of winch remote controller to pay in wire rope.		

APPENDIX E**Cougar Vehicle Configuration Tree**

Readily Identifiable Characteristics				
Identification Number	11202D	11202K	11291D	11291I
Variant	MRAP A1	MRAP A1	MRAP A1	MRAP A1
Number Of Axles	2	2	3	3
Side Body Windows (Passenger)	1	1	3	3
Roof Height Above Side Body Windows (inches)	3	3	3	3
Spare Tire Mount	No	No	No	No
Solid Front Bumper With Pintle Hook	No	No	No	No
Blast Deflection Under Body, Window Or Door (B, W, D)	W		WD	
Lifting Eyes Tabs/Rings	Rings	Rings	Rings	Rings
HVAC Unit Installation Drivers Side/Passenger Side (LS, RS)	No	No	LS	LS
Other Features	Note			
1 Tabs may have been replaced with rings but original base will remain.	1			
2 3 Two prong hinges per rear door.	2			
3 2 or 3 alternately placed roof hatches, front on centerline of vehicle.	3			
4 Bumper integrated winch	4			
5 Drop down tables and storage cages	5			
6 No tire ramps or mounts.	6			
7 Rectangular headlights	7			

APPENDIX F

MRAP Transparent Armor (Ballistic Glass) Inspection Criteria

The purpose of these inspection criteria is to provide generic inspection procedure to perform checks on the transparent armor/ballistic glass installed on MRAP vehicles with non-ballistic damage. Each window glass surface outside and inside are covered by laminates. All peel ply layers of protective laminates on the windows should be removed prior to inspection. If window passes inspection in accordance with the below criteria, install new laminates on the outside and inside window surfaces in accordance with TM 11202D-OR (WP 0005-1 and WP 0005-2). This does not supersede or replace any vehicle specific maintenance checks and criteria already in the vehicle technical manuals or DOD specifications.

Vehicle Serial Number:

Vehicle Category:

Inspected By:

Date Inspected:

Criteria	Pass	Fail
1. Severe damage that perforates more than one layer of glass (i.e. exposing glass below the first layer). The decision for replacement should be made based on visibility concerns rather than concerns of degraded ballistic.		
2. Any rock chip or spider crack that impairs vision over more than 20% of viewing area or in direct line of sight of occupant's view through ballistic glass. Cracks in any layer except the plastic layers opposite the strike face are ballistically insignificant and the decision for replacement should be made based on visibility concerns rather than concerns of degraded ballistic performance.		
3. Significant delamination or cloudiness covering over 30% of viewing area which impairs vision and may possibly compromise the coating which adds to the integrity characteristics of the glass. The decision for replacement should be made based on visibility concerns rather than concerns of degraded ballistic performance.		
4. Any size crack in the interior plastic layer as this layer serves as the spill containment layer.		
5. Broken or damaged potting seals which have the potential to lead to delamination, subsequent clouding and loss of visibility. The criteria for replacement should be made based on visibility concerns rather than concerns about degraded ballistic performance.		

APPENDIX G
Cougar ECP Checklist

Vehicle Serial Number:

Vehicle Category:

Inspected By:

Date Inspected:

ECP NUMBER	TITLE	CAT I A1	CAT II A1	YES/NO /NA
FPIECP10050R1	Release A 570A Alternator Modification For Cougar Fleet Modernization	X	X	
FPIECP10170	Cougar - Engine Air Pre-Cleaner Kit (CN 00512)	X	X	
FPIECP10191R1	Cougar-5031: Add Co-Driver Kickplate	X	X	
FPIECP10201	Cougar - CAT I TAK4 ISS Upgrade	X		
FPIECP100004R1	Modify Tow Points to Accommodate US Marine MTRV Tow Bar Front	X	X	
FPIECP10006	Modify Rear Tow Points to Accept MTRV Tow Bar Rear	X	X	
FPIECP10022R1	MRAP Front Tie Down Assembly Update- Updated to Future A1 Retrofit	X	X	
FPIECP10026	MRAP CAT1 and CAT2 Hatch Module Handle Change	X	X	
FPIECP10039	Front Trailer Tow Compliance, Female to Male Fitting - PERF. SPEC 3.1.21.5	X	X	
FPIECP10139	Transfer Case Restraint Fleet Modernization (A1)	X	X	
FPIECP10164R2	Cougar - Release First Responder Kit (A1)	X	X	
FPIECP10182R1	Cougar - Provide Roof Top Mount For GFE CVRJ -REF GOVTECP10054	X	X	
FPIECP10203FR2A0	Cougar - Modernization: Fuel Tank Protection Kit W/O Tanks (A1)	X	X	
FPIECP10112R2	Cougar Modernization: Fuel Tank Protection Kit W/Tanks	X	X	
FPIECP10196	AFES Modernization Crew Protection 4X4	X		
FPIECP10204	Cougar -Modernization: CAT I A1 Seat Survivability Upgrade	X		
FPIECP10213R4	COUGAR - 4x4 ISS Brake Upgrade	X		
FPIECP10100	New Battery Cutoff Switch Release	X		
COUGARECP-10008	Safety Warning Labels for MRAP vehicles	X	X	
COUGARECP-10015	Battery Box Mod Kit	X	X	
COUGARECP-10021	GFE A-Kit USMC Cougar CAT I A1 DV184	X		
COUGARECP-10017FR2A0	Rollover Detection Warning System (RDWS)	X	X	
COUGARECP-10020	Gunners Accessory Package (GAP) 2.0	X	X	
COUGARECP-10012	Neptune Ammo Storage Kit	X	X	
COUGARECP-10007F	Safety Stowage and Awareness Placards	X	X	
COUGARECP-10009	ITDS and Turret Catcher	X	X	
COUGARECP-10028R2	Door Window Seam Armor (CAT I)	X		
COUGARECP-10010	Gunner Protection Platform	X	X	
COUGARECP-XXXXX	Cougar Egress Modification	X	X	
COUGARECP-10037R1	GS2R Seat Only	X	X	

**APPENDIX H
Cougar Technical Bulletins**

Vehicle Serial Number:

Vehicle Category:

Inspected By:

Date Inspected:

TB NUMBER	TITLE	REMARKS	YES	NO
TB C00059 REV A	Cougar Front Towing Receptacle Retrofit (Revision A)			
TB C00084 REV B	Front and Rear Tow Eye and Tiedown Attachment Upfit			
TB C00087 REV A	Battery Disconnect Switch Relocation			
TB C00097 REV F	Cougar Independent Suspension System (ISS) Retrofit			
TB C00106 REV C	Cougar 570 Amp Alternator Upfit			
TB C00107 REV A	Cougar First Responder Upgrade			
TB C00108 REV A	Cougar A1 Automatic Fire Extinguisher System Upgrade			
TB C00110	Fuel Protection Modernization Kit Installation			
TB C00111 REV D	Cougar A1 Transfer Case Restraint Kit			
TB C00116 REV B	Cougar Co-Driver Kick Panel Upfit			
TB C00120	Crew Vehicle Receiver/Jammer Roof Mount			
TB C00127	Cougar CAT I A1 Seat Survivability Upgrade			
TB C00131	Cougar CAT I A1 ISS Brake Upgrade			

APPENDIX I
Cougar MAN/SAN Checklist

Vehicle Serial Number:

Vehicle Category:

Inspected By:

Date Inspected:

SAN NUMBER	TITLE	REMARKS	YES	NO
MAN-C-0024	ISS Rear Axle Pinion Nut And Input Shaft Seal			
MAN-C-0035	Differential Drain and Fill Plug Torque Specification			
SAN-C-018	Bendix SR-7 Brake Valve			
SAN-C-021A	Reversed Winch Cable Spooling			
SAN-C-022	Door Latches and Lock Pins			
SAN-C-023	Steering Column Weld			
SAN-C-024	Radio Electrical Cable Chafing			
SAN-C-025	Reversed ABS Sensor Wiring			
SAN-C-026A	AFES Deactivation			
SAN-C-027	Power Up Power Down Procedures			
SAN-C-028	Inverter Shock Hazard			
SAN-C-029	Front Air Brake Line and Fittings			
SAN-C-031	Cougar MRAP Driver and Co- Driver Seat height Adjuster			
SAN-C-033	Cougar MRAP Transportability Tie down			
SAN-C-035	Cougar NATO Cable Wiring			
SAN-C-038	ISS Rear Axle Pinion Nut and Pinion Shaft Seal			
SAN-C-039	Rear Hatch Gas Strut Failure			

**APPENDIX J
Cougar MI/TI/SI Checklist**

Vehicle Serial Number:

Vehicle Category:

Inspected By:

Date Inspected:

MI/TI/SI NUMBER	TITLE	Install Date	YES	NO
MI 11202/11291-IN/3	Gunners Protection Package System Installation for Force Protection Industries Inc., Category I and II Mine Resistant Ambush Protected Vehicle (GPP FPII Conversion Instructions)			
MI 1A.ANTBAR	Whaletail			
MI 11202D/11291D-OR/1	12K Winch OLI			
MI 11202D-OI/1	Windshield Wiper, Control Module and Jumper Harness Replacement			
MI 11202K-OD/1	Installation Instructions for Front Towing Receptacle Retrofit and Steering Column Diode Jumper Harness			
MI 2350-IN	Relocation of Front Towing Harness Receptacle MRAP Vehicle			
MI 8J934B-IN	Cougar CAT I 360 Degree Light Upgrade Kit			
MI11202D-OD/1	Spall Liner Upfit CAT I A1 IBPM Blanket Kit			
TI 11202D-IN	Install Instructions Egress Light Kit Tape CAT I			
SI 11202K-OD/1	Replacement and Evacuation Program For The Family Of Mine Resistant Ambush Protected Vehicles			
MI 11202I/11202J-IN/1	Installation of M1114 Turret Bearing Catcher Ring with Improved Turret Drive System Upgrade and Battery Box Upgrade onto Cougar Mine Resistant Ambush Protected Vehicles			
TI 11202D-OR/1	Installation Instructions for the Stowage Safety and Awareness Kit on the Cougar Category 1 and Category 2 Mine Resistant Ambush Protected Vehicle			
MI 11202K-OR/1	Installation of the Neptune Ammo Storage Kit onto Cougar Mine Resistant Ambush Protected Vehicles with Objective Gunner Protection Kit M1114			
MI 11202K-OR/2	Installation Instructions For Gunner Accessory Package 2.0 Cougar Mine Resistant Ambush Protected Vehicle			
MI 11202D-OR/3	Rollover Detection and Warning System Installation onto the Cougar Mine Resistant Ambush Protected Family of Vehicles			
MI 11202D-IN/1	Door Window Seam Armor Modification For Mine Resistant Ambush Protected Cougar, A1 and A2 Vehicles			
MI 11588C-OD/1	Installation of Gunner Seat Replacement for Cougar Mine Resistant Ambush Protected Vehicles.			

APPENDIX K**Approved Table of USMC MRAP Authorized Configurations**

Vehicle Serial Number:

Vehicle Category:

Inspected By:

Date Inspected:

Function	GRE	PRE-RESET	POST-RESET	UURI/SSRI	Yes/No
Weapon Station	OGPK	1:1	1:1	SSRI	
CREW	CVRJ	1:1	1:1	SSRI	
Vision Enhancer	DVE	1:1	1:1	SSRI	
	VOSS (R2C) (190)	2:1 ea. R2C SET	2:1 ea. R2C SET	UURI	
Vehicle Intercom	VIC-3 (Retained Where Installed)	1:1	1:1	SSRI	
	TOCNET	1:1	1:1	SSRI	
COMM	VRC-103 (Retained Where Installed)	1:5	X	UURI	
	VRC-104 (Retained Where Installed)	1:15	X	UURI	
	VRC-110	1:1	1:1	SSRI	
	MT-6352	1:1	X	SSRI	
C2	FBCB2 - BFT	1:1	1:1	SSRI	
	DAGR	1:1	1:1	SSRI	
C4ISR	Integrated Bridge System (IBS)	1:1	1:1	SSRI	
Safety	Gunners Restraints	1:1	1:1	SSRI	
	360 Degree Lighting	1:1	1:1	SSRI	
	Check Six system rear Camera	1:1	1:1	SSRI	

DATA ITEM DESCRIPTION

Form Approved
OMB No. 0704-0188

Public reporting burden for this collection of information is estimated to average 110 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Service, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503.

1. TITLE Depot Maintenance Production Report		2. IDENTIFICATION NUMBER DI-ALSS-80728A	
3. DESCRIPTION/PURPOSE 3.1 The depot maintenance production report is a two-part report which provides the government with monthly maintenance production figures, status of assets at the contractor facility, anticipated production for the next month, and a summary of unresolved problems at the end of the report period.			
4. APPROVAL DATE (YYMMDD) 970124	5. OFFICE OF PRIMARY RESPONSIBILITY (OPR) F/AFMC-FM	6a. DTIC APPLICABLE	6b. GIDEP APPLICABLE
7. APPLICATION/INTERRELATIONSHIP 7.1 This data item description contains the format, content and preparation instructions for the data product generated by the specific and discrete task requirement as delineated in the contract. 7.2 This data item description may be used on any depot level maintenance contract. 7.3 This DID supersedes DID DI-ILSS-80728.			
8. APPROVAL LIMITATION		9a. APPLICABLE FORMS AFMC Form 413	9b. AMSC NUMBER F7225
10. PREPARATION INSTRUCTIONS 10.1 <u>Content and format.</u> This report shall be on an Air Force Materiel Command Form 413, Depot Maintenance Production Report. The report shall consist of two parts and contain data as follows: a. <u>Part I.</u> (1) <u>As of date.</u> The year, month and day applicable to the report. Data must be through the end of the month. (2) <u>Block 1, Air Force management code.</u> The Federal Supply Class (FSC) and the Materiel Management Code (MMC) when appropriate. (3) <u>Block 2, Contractor and activity address code (AAC).</u> The name of the business and the DOD activity address code (AAC) assigned to you for shipment of material. (4) <u>Block 3, Contract number.</u> Contract number. (5) <u>Block 4, Item manager Air Logistics Center (IM ALC).</u> The applicable account code of the prime ALC. (6) <u>Block 5, Contracting ALC or AFMC procuring agency.</u> The designation of the agency that awarded the contract. (7) <u>Block 6, Contract administration office (CAO).</u> The office designated as CAO in the contract. (8) <u>Column A, item identification.</u> The national stock number (NSN) of the item being reported. (9) <u>Column B, call number.</u> When the awarded contract is a call (order) type,			
11. DISTRIBUTION STATEMENT DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.			

Block 10, Preparation Instructions (Continued)

this is the applicable call number. When an item is awarded on more than one call, it is repeated for each call until completed. If the current report completes the call, the word "completed" is in the blank block.

(10) Column C, C/ELIN. The contract exhibit line item number assigned to the NSN in the contract.

(11) Column D, quantity on contract or call. D-1 is the quantity of the end items to be repaired on each call or contract quantity when calls do not apply. D-2 is the quantity scheduled for repair during the quarter including the report month. D-3 is the quantity scheduled for repair cumulative to date.

(12) Column E, reparable received. Number of reparable items received for repair. E-1 is the quantity of reparable received during the report month. E-2 is the quantity of reparable received cumulative from the start of contract through report month.

(13) Column F, quantity inducted to work. The quantity inducted to work during report month.

(14) Column G, quantity produced. The quantity produced during the month.

(15) Column H, serviceables shipped. Serviceables shipped from repair facility. H-1 is the serviceables shipped through report month. H-2 is serviceables shipped cumulative from start of contract.

(16) Column I, serviceables on hand. The quantity of reparable on hand awaiting input or condemnation.

(17) Column J, reparable on hand. The number of reparable on hand awaiting input or condemnation.

(18) Column K, reparable shipped. The reparable shipped during report month.

(19) Column L, quantity condemned. The quantity condemned. L-1 is the quantity condemned during report month. L-2 is the quantity condemned cumulative from start of contract.

(20) Column M, forecast in to work. The number of items scheduled to be input to work during next month.

(21) Column N, forecast to complete. The quantity of items scheduled to be completed next month.

b. Part II, production problems. The report shall contain a second part in narrative format which shall be attached to the Air Force Materiel Command Form 413. This part is required if:

- (1) Previous reports production forecast was not shipped.
- (2) Current forecast does not equal contract scheduled quantity.
- (3) Contract anticipates a problem in the near future.

DATA ITEM DESCRIPTION

Form Approved
OMB No. 0704-0188

Public reporting burden for this collection of information is estimated to average 110 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Service, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503.

1. TITLE Conference Agenda		2. IDENTIFICATION NUMBER DI-ADMN-81249A	
3. DESCRIPTION / PURPOSE 3.1 The conference agenda provides information concerning purpose, location, and schedule of conferences required to manage the acquisition of systems equipment, related items, and services.			
4. APPROVAL DATE (YYMMDD) 931001	5. OFFICE OF PRIMARY RESPONSIBILITY (OPR) F/ESC/EN-4	6a. DTIC APPLICABLE	6b. GIDEP APPLICABLE
7. APPLICATION / INTERRELATIONSHIP 7.1 This Data Item Description (DID) contains the format and content preparation instructions for the data product generated by the specific and discrete task requirement as delineated in the contract. 7.2 This DID supersedes DI-ADMN-81249.			
8. APPROVAL LIMITATION		9a. APPLICABLE FORMS	
		9b. AMSC NUMBER F6968	
10. PREPARATION INSTRUCTIONS 10.1 <u>Format</u> . Contractor format is acceptable. 10.2 <u>Content</u> . The agenda shall include the following, where applicable: <ul style="list-style-type: none"> a. The purpose and objective of the conference. b. The conference location, date, and duration. c. A daily chronological listing of each major topic or subtopic to be discussed and the time to be devoted to each topic. d. A list of activities to be represented and identification of their responsibilities. e. A list of subcommittees to be established during the conference and the proposed activity representation for each subcommittee. f. Reference to and brief description of the results of previous meetings, when relevant. 			
(Continued on Page 2)			
11. DISTRIBUTION DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.			

Block 10, Preparation Instructions (Continued)

- g. Location, schedule, and purpose or subject area to be covered by each subcommittee, when applicable.**
- h. Names of the conference chairperson, co-chair, and subcommittee chairs, when applicable.**
- i. Information on billeting, messing, transportation, and administrative services available to conference attendees.**
- j. Complete list of all documentation to be available for review.**
- k. Brief description of progress on actions or problems identified at previous meetings, when applicable.**
- l. Other pertinent information such as forms to be used, identification of any deviations or waivers, security classification, and clearance requirements.**

DATA ITEM DESCRIPTION

Form Approved
OMB No. 0704-0188

Public reporting burden for this collection of information is estimated to average 110 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and reviewing the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Service, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503.

1. TITLE Conference Minutes		2. IDENTIFICATION NUMBER DI-ADMN-81250A	
3. DESCRIPTION / PURPOSE 3.1 Conference minutes provide documentation of technical information provided, and decisions and agreements reached, at meetings.			
4. APPROVAL DATE (YYMMDD) 931001	5. OFFICE OF PRIMARY RESPONSIBILITY (OPR) F/ESC/EN-4	6a. DTIC APPLICABLE	6b. GIDEP APPLICABLE
7. APPLICATION / INTERRELATIONSHIP 7.1 This Data Item Description (DID) contains the format and content preparation instructions for the data product generated by the specific and discrete task requirement as delineated in the contract. 7.2. This DID supersedes DI-ADMN-81250.			
8. APPROVAL LIMITATION		9a. APPLICABLE FORMS	9b. AMSC NUMBER F6969
10. PREPARATION INSTRUCTIONS 10.1 <u>Format</u> . Contractor format is acceptable. 10.2 <u>Content</u> . The minutes shall include the following information: <ul style="list-style-type: none"> a. A title page containing the following: <ul style="list-style-type: none"> (1) Title - type of meeting and date. (2) Identification of the acquisition (system, equipment, contract number) for which the meeting was held. (3) Space for signatures of the designated representatives of the contractor and acquisition activity. (4) The name of the contractor and address to which the acquisition activity should acknowledge receipt of comments. b. The purpose and objective of the conference. c. The conference location. d. A summary of the discussions, decisions, agreements reached, and directions of the conference or individual subcommittees thereof. 			
(Continued on Page 2)			
11. DISTRIBUTION DISTRIBUTION STATEMENT A. Approved for public release; distribution is unlimited.			

Block 10, Preparation Instructions (Continued)

e. A list of attendees by name, rank, rate, grade or position, activity represented, activity code, and phone numbers as appropriate.

f. Action items resulting from the conference.

DATA ITEM DESCRIPTION

Title: Risk Management Status Report

Number: DI-MGMT-81809

AMSC Number: N9132

DTIC Applicable: N/A

Preparing Activity: SH/PMS-408

Applicable Forms: N/A

Approval Date: 20100426

Limitation: N/A

GIDEP Applicable: N/A

Use/relationship: The Contractor's Risk Management Status Report will be used to document the contractor's progress for: risk identification; risk mitigation planning; risk management plan implementation; and risk tracking. This data will allow management to make informed decisions.

This Data Item Description (DID) contains the format, content, and preparation instructions for the data product resulting from the work task specified in the contract.

Requirements:

1. **Format.** The Risk Management Report shall be in contractor's format.
2. **Content.** The report shall contain a title page identifying the following:
 - a. Contractor's Name
 - b. Contract Number and Dates of Award (including the latest modification)
 - c. All dates inclusive to the tasks for the reporting period.
- 2.1. The report shall contain the contractor's progress in risk identification, analysis, implementation of mitigation, and tracking.
- 2.2. The report shall identify efforts made in assessing the current consequence of the identified performance (P), schedule (S), and cost (C) risks on the program, and shall contain a projection of the risk mitigation implementation.
- 2.3. The report shall contain a five (5) by five (5) matrix to identify risks to Performance (P), Schedule (S), and Cost (C). A vertical axis shall indicate the "Likelihood" and the horizontal axis shall indicate the "Consequence" of a root cause occurrence. The level of risk for each root cause shall be identified as green low, yellow for moderate, or red for high.
- 2.4. The report shall contain a narrative briefly describing the risk, title, type (P, S, or C), root cause, current mitigations, and planned mitigations efforts identified, along with critical dates (risk reduction milestones).

DI-MGMT-81809

3. Media requirements. The report shall be presented in electronic media, MS Word version 2003-2007.

4. END OF DID DI-MGMT-81809.

DATA ITEM DESCRIPTION

Title: QUALITY ASSURANCE PROGRAM PLAN

Number: DI-QCIC-81794

AMSC Number: F9112

DTIC Applicable: N/A

Office of Primary Responsibility: 70 (OO-ALC/526 ICBM)

Application Forms: N/A

Approval Date: 20091208

Limitation: N/A

GIDEP Applicable: No

Use/Relationship: The purpose of the Quality Assurance Program Plan (QAPP) is to provide complete coverage of all of the information, instructions and documentation necessary to produce a quality part, component, equipment, subsystem, or system of high acceptance and in complete conformity with contractual requirements. The QAPP will contain measurable quality objectives and the metrics by which they are to be measured.

This Data Item Description (DID) contains the format and content preparation instructions for the data product generated by the specific and discrete task and requirements as delineated in the contract.

Requirements:

1. Reference documents. The applicable issue of the documents cited herein, including their approval dates and dates of any applicable amendments, notices, and revisions, shall be as cited in the contract.

2. Format: Contractor format acceptable.

3. Content: The QAPP will contain the information required to identify how the contractor will satisfy the specific quality tasks within the contract and describe the contractor's understanding of all documentation tasks required for meeting the contractual requirements. The QAPP includes the technical and manufacturing aspects of production, raw materials, facilities involved, and personnel required. The QAPP will cover the following:

3.1 Reference Documents: A complete list of compliance and reference documents (e.g. ISO 9100A, MIL-STD-1686) that are used to guide the writing and implementation of QAPP.

3.2 Management: Provides the organizational structure, and their responsibilities that will influence the quality of the products. Examples of elements to be addressed include quality planning, implementation, control and monitoring; significant interfaces that affect products, contracts, sellers, problem reporting and resolution; review of audit results; authorization for deviation to quality policy; and control of corrective and preventive actions. Additional elements based on the program requirements will be agreed to prior to contract award.

- 3.3 **Design Control:** Identifies and describes the standards, practices, conventions and metrics that are to be applied to this project. Also identifies and describes how quality will monitor compliance to these standards and how conformance to requirements will be verified.
- 3.4 **Purchasing:** Provides details of all critical or key products that will be purchased and any relevant quality assurance requirements for these products. Depicts the method used to evaluate, select and control sellers.
- 3.5 **Control of Customer Supplied Products:** Provides specifics on how customer supplied products are identified and controlled and the method used to verify that these products meet the requirements.
- 3.6 **Process Control:** Give details of the method employed to verify process controls are in place and being used at the manufacture/assembly. Verification should include process documentation, monitor and control of characteristics, acceptable workmanship standards, use of qualified processes, equipment and personnel, adequate and appropriate tooling and test equipment. List all critical processes used on this project and the method or plan to use to control each of them.
- 3.7 **Inspection and Testing:** Delineates the required inspection and testing. Describing what characteristics will be verified at each step in the process, how customer or regulatory established witness points, and use of third party verification. Provides a description of the type, quantity, and format of the test data, including any unique or specific requirements used in identifying inspection and test status of the products.
- 3.8 **Problem Reporting and Preventive/Corrective Action:** Identifies methods used to detect, report, track, and resolve product/process problems and trends. Provide a description on how the U.S. Government will interface with this process.
- 3.9 **Handling, Storage, Marking, Packaging, Preservation and Delivery:** Describe the methodology used to verify that specific parts and product handling, storage, marking, packaging, and delivery requirements are met. Includes the method used to verify that the delivered products have not degraded beyond the requirements.
- 3.10 **Control of Quality Records:** Depicts what records are to be kept, for how long, where, by whom, and what form these records will exist. Provides a description of how the records will be stored, retrieved, disposition, confidentiality requirements, and the method used to implement them.
- 3.11 **Quality Audits:** Identifies the nature and extent of the quality audits to be performed (e.g: internal, customer supplier, regulatory, seller and ISO registration), how the results will be used in the corrective and preventive action system, and to what extent the customer's involvement in internal quality audits.

DI-QCIC-81794

3.12 Statistical Techniques: Includes the statistical techniques to be used to evaluate and maintain consistent quality control.

4. End of DI-QCIC-81794

CONTRACT DATA REQUIREMENTS LIST
(1 Data Item)

Form Approved
OMB No. 1704-0188

The Public reporting burden for this collection of information is authorized to average 110 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302 and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503. Please DO NOT RETURN your form to either of these addresses. Send completed form to the Government issuing Contract Officer for the contract/PR No. listed in block E.

A. CONTRACT LINE ITEM NO. B. EXHIBIT C. CATEGORY:
TDP TM Other XXX

D. SYSTEM/ITEM MRAP Cougar Vehicles E. CONTRACT/PR No. F. CONTRACTOR

1 DATA ITEM No A006 2 TITLE OF DATA ITEM ITEM UNIQUE IDENTIFICATION (IUID) MARKING ACTIVITY AND VERIFICATION REPORT 3 SUBTITLE

4 AUTHORITY (Data Acquisition Document No) DI-MGMT-81804A 5 CONTRACT REFERENCE SOW Paragraph(s) 3.7, 4.2 6 REQUIRING OFFICE Marine Corps Logistics Command, Albany (LOGCOM), Maintenance Management Center (MMC), Code P635

7 DD 250 REQ LT 9 DIST STATEMENT REQUIRED C 10 FREQUENCY ASREQ 11 AS OF DATE N/A 12 DATE OF FIRST SUBMISSION SEE BLK 16 13 DATE OF SUBSEQUENT SUBMISSION N/A 14 DISTRIBUTION a ADDRESSEE b COPIES

16. REMARKS	14 DISTRIBUTION		
	a ADDRESSEE	b COPIES	
		FINAL	
		Dist	Repr
BLK 4 - A Data Report profiling the embedded subassemblies, components, and parts shall be delivered at the time of inspection. The Data Report will be submitted as an electronic database in Contractor format. The following field information shall be identified (at a minimum) for each subassembly item delivered per Parent End Item CLIN	Email Addresses	0	1
(1) Concatenated unique item identifier or DoD recognized unique identification equivalent of the PARENT ITEM delivered under a contract line, subline, or exhibit line item that contains the embedded subassembly, component, or part.			
(2) Concatenated unique item identifier or DoD recognized unique identification equivalent of the (CHILD) embedded subassembly, component, or part.			
(3) Unique item identifier type.**			
(4) Issuing agency code (if concatenated unique item identifier is used).**			
(5) Enterprise identifier (if concatenated unique item identifier is used).**			
(6) EID Type (CAGE/NCAGE, DUNS, etc).			
(7) Original part number.**			
(8) Lot or batch number.**			
(9) Current part number (if not the same as the original part number).**			
(10) Current part number effective date.**			
(11) Serial number.**			
(12) Unit of measure			
(13) Description			
(14) Ship to location			
(15) National Stock Number (NSN)			
(16) Activity/Event			
(17) Activity/Event Date			
(18) Verification (Pass/Fail)			
(19) For parts that "Fail" IUID verification, identify if item will be re-marked or scrapped i.e. for Direct Marked Parts (DMPs)			
** Once per item.			
BLK 9 - The following information shall be included on the deliverable: DISTRIBUTION STATEMENT Distribution authorized to U.S. Government agencies and their contractors, Administrative or Operational Use, date CDRL was signed. Other U.S. requests for this document shall be referred to Commander, MARCORSSYSCOM (Attn: MRAP), 2200 Lester Street, Quantico, VA 22134-6050			
BLK 12 - Delivery of Data Report will be concurrent with End Item inspection. Submission of Parent UII to IUID Registry must occur before Sub Assembly Data can be submitted. Sub Assembly Data must be loaded to IUID Registry upon Final Acceptance for Payment. DFARS 252 211-7003 Section (f). The Contractor shall ensure machine-readable IUID marks required under this contract are permanently placed on the items subjected to contractually-required performance testing, and further shall include all mark serviceability problems in the subject's test report(s)			
BLK 14 - Submission shall be via electronic mail (e-mail). The submission shall be prepared and delivered in Microsoft Excel format. E-mail address follows the addressee, below: smblogcommcbsb@usmc.mil Cougar_deliverables@usmc.mil smblogcommrap@usmc.mil			
15 TOTAL	0	1	0

17 PRICE GROUP

18 ESTIMATED TOTAL PRICE

G. PREPARED BY: Kyler Truba H. DATE: 16 March 2015 I. APPROVED BY: Tony Goodman J. DATE: 2 October 2015

DI-MGMT-81804A

- 4.6 Service Assigned Serial Number (if assigned).
- 4.7 Original Equipment Manufacturer (OEM) serial number.
- 4.8 Equipment Nomenclature (name and type).
- 4.9 National Stock Number (NSN).
- 4.10 Validation Date.
- 4.11 Validation Result (Pass/Fail).
- 4.12 Verification Date.
- 4.13 Verification Result (Pass/Fail).
- 4.14 Other Event/Activity Date* (optional).
- 4.15 Other Event/Activity* (optional).
- 4.16 For items marked that "Fail" IUID validation or verification, identify corrective action (whether the item has been re-marked or scrapped).

*Other Event/Activity will be defined in the Contract Data Requirements Lists (CDRLS) if required.

5. The Key attributes for the report are the validation and verification columns which each indicate (Pass/Fail). (NOTE: Most verification apparatus provide electronic records with pass/fail summaries for both verification and validation.)

A "Pass" validation value shall be assigned to records whose data matrix symbol(s) properly encode Item Unique Identification data as prescribed in MIL-STD-130 DoD Standard Practice Identification Marking of U.S. Military Property requirements for machine readable information (MRI) marking.

A "Pass" verification value shall be assigned to records whose data matrix symbol(s) meet or exceed MIL-STD-130 DoD Standard Practice Identification Marking of U.S. Military Property requirements for data matrix symbol quality.

6. The Contractor shall ensure machine-readable IUID marks required under this contract are permanently placed on the items subjected to contractually-required performance testing prior to that testing; and further shall include all mark serviceability problems in the item's test report(s).

7. End of DI-MGMT-81804A.

DATA ITEM DESCRIPTION

Form Approved
OMB No. 0704-0188

2. TITLE GOVERNMENT FURNISHED INFORMATION DEFICIENCY REPORT		1. IDENTIFICATION NUMBER DI-MGMT-80596	
3. DESCRIPTION / PURPOSE 3.1 The Government Furnished Information (GFI) Deficiency Report received from a contractor advises the Government of the potential impact of deficient information. Deficiencies include illegible, inconsistent, defective, nonusable, late and non delivered information that will prevent the contractor from proceeding with work.			
4. APPROVAL DATE (YYMMDD) 880519	5. OFFICE OF PRIMARY RESPONSIBILITY (OPR) N/CEL-TD	6a. DTIC APPLICABLE	6b. GIDEP APPLICABLE
7. APPLICATION / INTERRELATIONSHIP 7.1 This data item description (DID) contains the format and content preparation instructions for the product generated by the specific and discrete tasks requirement as delineated in the contract. 7.2 The GFI deficiency report is applicable to contracts where GFI is being delivered to a contractor. 7.3 This DID supersedes DI-A-26298A.			
8. APPROVAL LIMITATION	9a. APPLICABLE FORMS	9b. AMSC NUMBER N4419	
10. PREPARATION INSTRUCTIONS 10.1 <u>Format</u> . The report shall be in contractor's format. 10.2 <u>Content</u> . The report shall contain the following: 10.2.1 <u>Title</u> . Government Furnished Information (GFI) Deficiency Report. 10.2.2 <u>Serial No.</u> A sequential number assigned by the contractor to uniquely identify each particular report. 10.2.3 <u>Program/project title</u> . The title of the program or project related to the particular procurement and identified by cognizant office designator. 10.2.4 <u>PIIN</u> . Procurement instrument identification number (PIIN), contractor number, or other appropriate designation. 10.2.5 (For NAVSEA only) <u>Ship identification number</u> . Ship Identification and hull number for which GFI is to be used. 10.2.6 <u>Contractor</u> . Name of contractor submitting the report. 10.2.7 (For NAVSEA only) <u>Equipment nomenclature</u> . Government nomenclature or description of equipment for which the GFI is to be used.			
11. DISTRIBUTION STATEMENT DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.			

10. PREPARATION INSTRUCTIONS (Continued)

10.2.8 System/item designation. The NAVSEA or other unique identifying number of the system or equipment, or both.

10.2.9 (For NAVSEA only) Schedule C number. The correlating Schedule C number from the GFI list, if applicable.

10.2.10 Data description. The official title, or a brief description of the data.

10.2.11 Document Number. The specific number of the document, or other appropriate designation.

10.2.12 Deficiencies. Error, defect, or delinquency information incident to shipment.

10.2.13 Impact and action taken. A description of the impact on meeting cost, schedule, and technical requirements, and action taken or proposed to alleviate impact of the deficiency.

10.2.14 Prepared by and date. The report shall be signed and dated by the person responsible for preparing the report.

10.2.15 Approved by and date. The approval signature of the contractor's representative authorized to sign documents and the date assigned.

DATA ITEM DESCRIPTION

TITLE: Government Furnished Materiel (GFM) Consumption Report

Number: DI-MGMT-80438B

Approval Date: 19980515

AMSC Number: A7311

Limitation:

DTIC Applicable:

GIDEP Applicable:

Office of Primary Responsibility: A/AMCOM

Applicable Forms:

Use/Relationship: This data item description (DID) requires the contractor to report to the Management Control Activity (MCA) items and quantities of GFM used during the reporting period.

- a. This DID facilitates both financial inventory accounting and property accounting for GFM items.
- b. This DID contains the format and content preparation instructions for the data product generated by the specific and discrete task requirement as delineated in the contract.
- c. This DID is applicable to all contracts that receive GFM for consumption.
- d. This DID supersedes DI-MGMT-80438A.

Requirements:

1. **Format.** The Government Furnished Materiel (GFM) Consumption Report format shall be an 80-column format.

2. **Content.** The GFM Consumption Report shall contain the following:

2.1 **Document Identifier Code (CC 1-3).** Code which identifies the purpose of this transaction and the system to which it pertains. Constant "BZE."

2.2 **MCA Routing Identifier Code (RIC) (CC 4-6).** Code which identifies the address to which transaction shall be sent. Enter the RIC of the appropriate MCA which will be specified in the contract.

2.3 **Blank (CC 7).**

2.4 **National Stock Number (NSN) of GFM (CC 8-22).** Enter the 13-digit NSN which identifies the item consumed or incorporated.

2.5 **Unit of Issue (CC 23-24).** The 2-position alphabetic abbreviation expressing a determinate quantity of an item that will be issued, by which accountable records are maintained. Enter the unit of issue of the GFM specified in the contract.

DI-MGMT-80438B

2.6 Quantity Consumed (CC 25-29). Quantity of GFM (NSN CC 8-22) consumed or incorporated. Right justify and zero fill. Example: 5 shall be written as 00005.

2.7. NSN of End Item (CC 30-42). Enter the 13 digit NSN of item upon which GFM was utilized.

2.8 Blank (CC 43).

2.9 Supply Source (CC 44). Enter appropriate code to identify source of GFM.

a. P - Requisitioned through MCA.

b. J - Obtained by cannibalization of Government materiel.

2.10 Department of Defense Activity Address Code (DODAAC) (CC 45-50). Six position code which was assigned to the contractor after contract award and which authorizes the contractor to receive or ship materiel or facilitates billing. This DODAAC may be obtained from the Procuring Contracting Officer.

2.11 Blank (CC 51-66).

2.12 Report Sequence Number (CC 67-69). Number each report sequentially through duration of the contract, beginning with 001.

2.13 Contract Call Order Number (CC 70-73). If applicable, enter the four-position call order number, if no call order number exists, this field shall be blank.

2.14 Contract Line Item Number (CLIN) (CC 74-77). Mandatory entry, must contain the four-position CLIN against which the GFM was consumed.

2.15 Subordinate Contract Line Item Number (SUB-CLIN) (CC 78-79). Enter the two position SUB-CLIN if applicable. If no SUB-CLIN exists, this field shall be left blank.

2.16 Blank (CC 80).

3. End of DI-MGMT-80438B.

DATA ITEM DESCRIPTION			Form Approved OMB No. 0704-0188	
1. TITLE		2. IDENTIFICATION NUMBER		
END ITEM FINAL INSPECTION RECORD (FIR)		DI-QCIC-81068		
3. DESCRIPTION/PURPOSE				
3.1 Establishes and classifies quality characteristics for final examination and functional testing of major end items and components. Serves as a permanent record of final inspection results.				
4. APPROVAL DATE (YYMMDD)	5. OFFICE OF PRIMARY RESPONSIBILITY (OPR)	6a. DTIC APPLICABLE	6b. GIDEP APPLICABLE	
901127	A/AMSTA-GDD			
7. APPLICATION/INTERRELATIONSHIP				
7.1 This Data Item Description (DID) contains the format and content preparation instructions for data resulting from the work task described by 4.4 of MIL-STD-40001(AT).				
7.2 This DID supersedes DI-R-4809.				
8. APPROVAL LIMITATION		9a. APPLICABLE FORMS	9b. ANSC NUMBER	
			A5038	
10. PREPARATION INSTRUCTIONS				
10.1 <u>Reference documents.</u> The applicable issue of the documents cited herein, including their approval dates and dates of any applicable amendments, notices, and revisions, shall be as specified in the contract.				
10.2 <u>Format and content.</u> The Final Inspection Record (FIR) shall be prepared in accordance with the requirements of 4.4 and 5.1 through 5.8 of MIL-STD-40001(AT).				
11. DISTRIBUTION STATEMENT				
DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.				

**NOTICE OF
VALIDATION**

DI-QCIC-81068
NOTICE 1
29-Oct-2013

DATA ITEM DESCRIPTION

End Item Final Inspection Record (FIR)

DI-QCIC-81068, dated 27-Nov-1990, has been reviewed and determined to be valid for use in acquisition.

Preparing Activity:
Army - AR

NOTE: The activities above were interested in this document as of the date of this document. Since organizations and responsibilities can change, you should verify the currency of the information above using the ASSIST Online database at <https://assist.dla.mil>.

AMSC N/A

AREA QCIC

Attachment 1

DATA ITEM DESCRIPTION

Title: REQUEST FOR DEVIATION (RFD)

Number:	DI-CMAN-80640C	Approval Date:	20000930
AMSC Number:	D7389	Limitation:	N/A
DTIC Applicable:	No	GIDEP Applicable:	No
Office of Primary Responsibility:	D/DUSD(AT&L)SE		
Applicable Forms:	N/A		

Use, Relationships: A Request for Deviation describes a proposed departure from (a non-conformance with) the contractually-specified configuration documentation for a specific number of units or for a specified period of time.

A Request for Deviation enables the Government to determine the impact on performance, operational readiness, logistics support or other affected areas.

This Data Item Description (DID) contains the format, content and preparation instructions for the data product resulting from the work task specified in the contract.

Data Item Description submittal in Extensible Markup Language (XML) is acceptable. An XML Document Type Definition (DTD), associated XML document template, and other information is available from <http://www.geia.org/836/>

This DID supersedes DI-CMAN-80640B and DI-CMAN-80641B.

Requirements:

1. **Reference documents.** The applicable issue of any documents cited herein, including their approval dates and dates of any applicable amendments, notices, and revisions, shall be as specified in the contract.
2. **Format and content.** The Request for Deviation (RFD) shall be prepared in contractor format. The RFD content shall include the consideration to be provided if the government accepts the deviation and, where applicable, the following information:
 - a. a complete description of the contract requirement affected and the nature of the deviation (non-conformance)
 - b. number of units (and serial/lot numbers) to be delivered in this configuration
 - c. any impacts to logistics support elements (such as software, manuals, spares, tools, and similar) being utilized by government personnel or to the operational use of the product
 - d. information about remedial actions being taken to prevent reoccurrence of the non-conformance

The following references may be useful in defining content: MIL-HDBK-61, Configuration Management Guidance (paragraph 4.3 and Table 4-9) and ANSI/EIA-649-1998, National Consensus Standard for Configuration Management (paragraph 5.3.4).

END OF DI-CMAN-80640C.

DATA ITEM DESCRIPTION			<i>Form Approved OMB No. 0704-0188</i>	
<small>Public reporting burden for collection of this information is estimated to average 110 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden to, Washington Headquarters Services, Directorate for Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503.</small>				
1. TITLE			2. IDENTIFICATION NUMBER	
Installation Completion Notification (ICN)			DI - CMAN - 81245	
3. DESCRIPTION/PURPOSE				
<p>3.1 An Installation Completion Notification (ICN) is used to report field accomplishment of retrofit changes required by an approved Engineering Change Proposal (ECP) by the contractor to the home plant and to the Government when the configuration status accounting is being done by the contractor or by a Government activity.</p>				
4. APPROVAL DATE (YYMMDD)	5. OFFICE OF PRIMARY RESPONSIBILITY	6a. DTIC APPLICABLE	6b. GIDEP APPLICABLE	
920417	OSD - DO			
7. APPLICATION/INTERRELATIONSHIP				
<p>7.1 This Data Item Description (DID) contains the format, content and preparation instructions for an ICN resulting from work tasks described in paragraph 5.5.8 of MIL-STD-973.</p> <p>7.2 The reporting of installation changes in the field by the contractor during the acquisition phase and prior to the end of operational test and evaluation is required to verify the status of delivered configuration items. Delivery and processing instructions are dependent upon the activity (prime or associate contractor or Government in-house) preparing the status accounting reports.</p> <p>7.3 This DID supersedes DI-E-3107/C-117-2.</p>				
8. APPROVAL LIMITATION		9a. APPLICABLE FORMS	9b. AMSC NUMBER	
		N/A	D 6697	
10. PREPARATION INSTRUCTIONS				
<p>10.1 <u>Reference documents</u>. The applicable issue of any documents cited herein, including their approval dates and dates of any applicable amendments, notices, and revisions, shall be as specified in the contract.</p> <p>10.2 <u>Format</u>. The report shall be in contractor's format and shall incorporate the elements of information described in Appendix H of MIL-STD-973.</p> <p>10.3 <u>Content</u>. The report for the status accounting record will cover the accomplishment of CI and spares Class I changes that are approved subsequent to the establishment of a product baseline and are scheduled for accomplishment subsequent to Government production acceptance.</p>				
11. DISTRIBUTION STATEMENT				
DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.				

DATA ITEM DESCRIPTION

Title: INSTALLATION COMPLETION NOTIFICATION (ICN)

Number:	DI-CMAN-81245A	Approval Date:	20000930
AMSC Number:	D7394	Limitation:	N/A
DTIC Applicable:	No	GIDEP Applicable:	No
Office of Primary Responsibility:	D/DUSD(AT&L)SE		
Applicable Forms:	N/A		

Use, Relationships: An Installation Completion Notification (ICN) is used to report field accomplishment of retrofit changes by contractor personnel as required by an approved Engineering Change Proposal (ECP). The notification is provided to the Government when the Government is maintaining the configuration status accounting information about the configuration of units in the operational inventory.

This Data Item Description (DID) contains the format, content and preparation instructions for an ICN resulting from work tasks specified in the contract.

The reporting of the installation of retrofit kits in the field by the contractor during the acquisition phase and prior to the end of operational test and evaluation is required to verify the status of delivered configuration items subsequent to Government product acceptance.

Data Item Description submittal in Extensible Markup Language (XML) is acceptable. An XML Document Type Definition (DTD), associated XML document template, and other information is available from <http://www.geia.org/836/>

This DID supersedes DI-CMAN-81245.

Requirements:

1. **Reference documents.** The applicable issue of any documents cited herein, including their approval dates and dates of any applicable amendments, notices, and revisions, shall be as specified in the contract.
2. **Format and content.** The Installation Completion Notification (ICN) shall be prepared in contractor format. The content shall include, where applicable, the following information:
 - a. identification of retrofit instruction implemented and of related ECP
 - b. identification of configuration item or top assembly modified
 - c. part identifier and serial number of part modified/replaced
 - d. part identifier and serial number of part incorporated

The following references may be useful in defining content: MIL-HDBK-61, Configuration Management Guidance (paragraph 4.2.1.5 and Table 4-8) and ANSI/EIA-649-1998, National Consensus Standard for Configuration Management (paragraph 5.3.3) may be used to select/describe the detailed information elements.

END OF DI-CMAN-81245A.