# **DATA ITEM DESCRIPTION**

## Title: LEVEL OF REPAIR ANALYSIS (LORA) DATA TABLES

Number: DI-SESS-81902 AMSC Number: N9355 DTIC Applicable: N/A Office of Primary Responsibility: SH/SEA00 Applicable Forms: N/A Approval Date: 20130313 Limitation: N/A GIDEP Applicable: N/A

**Use/relationship:** The data tables will track in detail, the specific LORA tasks performed, how they were performed, and the results of performing the tasks. These data tables documents and supports the Contractor's analysis and recommendations on the economic, non-economic, and operational advantages to the government concerning: repair versus discard-at-failure; optimum repair levels; support equipment (which include test program sets, built-in-test equipment, Test, Measurements, and Diagnostic Equipment (TMDE) and/or Support and Test Equipment (STE) requirements; maintenance facility requirements; maintenance and supply support life cycle costs; spare parts provisioning; and, specific design alternatives for each of the items undergoing the LORA.

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.

COMPASS software referenced in this DID is free software available at <u>https://www.logsa.army.mil/lec/</u>. .

## **Requirements:**

1. Format. The LORA data tables shall be in the Contractor's format.

2. Content. The LORA data tables shall include all data elements required to support the following LORA discussions:

2.1.1 The LORA model(s) used, and a description of the maintenance alternatives considered shall be identified. A description of the maintenance alternatives including coverage of locations and operational scenarios of the different TMDE and/or STE, maintenance personnel, any built-in-test; and, supply and maintenance facilities shall be considered in conduction of the LORA.

- 2.1.2 The contractor's level of repair or discard recommendation for each item undergoing LORA shall be specified.
- 2.1.3 The report shall include a brief discussion of the compatibility of the LORA recommendations with the operations (both performance and support) and technical (reliability and maintainability design factors) requirements of the system.

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- 2.1.4 Identification of any recommended repair or discard level decisions, where cost is neither a necessary nor a sufficient condition, due to a conflict with defined or implied operational employment requirements, support requirements, or both shall be identified. Also, the Contractor shall include an explanation of the non-economic considerations which should be considered, or result in a different decision than economic considerations determined as least-cost.
- 2.1.5 Identification of any economic benefits under interim contractor support, contractor logistics support, reliability improvement warranty, or any other form of contractor repair shall be identified.
- 2.1.6 The Contractor shall include a discussion of the sensitivity analysis performed along with the results of the sensitivity analysis. The discussion shall include identification of the LORA model data elements varied as part of the sensitivity analysis and the specific numerical range used, rationale for that range, and identification of each numerical value varied which impacts on a contractor's LORA recommendation. All estimated values shall be included in the sensitivity analysis discussion.
- 2.1.7 A discussion of the sensitivity of LORA decisions which include as part of the sensitivity analysis and identification of the detrimental aspects of choosing alternatives, other than those selected as optimum when economic, non-economic, and operational advantages that were taken into account shall be included.
- 2.1.8 Recommendations for updating any maintenance and logistic support planning factors shall be identified. Any recommendations made for updating planning factors related to maintenance and logistic support based on the LORA shall be included. Also, the established operational and readiness requirement limitations and effects that were taken into account when making level of repair and discard recommendations shall be identified.
- 2.1.9 A tabulation of the complete system or equipment items analyzed shall be included. The Contractor shall include an explanation of how to reference the tabulation is included if Logistics Management Information (LMI) is not invoked. Also the Contractor shall include the LORA recommendations resulting from the present analysis along with any previous government approved recommendations or decisions made from past analyses.
- 2.1.10 The report shall contain a listing of LORA model data elements utilized and numerical values used for each data element in analyzing level of repair and discard alternatives as well as a reference to the origin of numeric data for each data element is included.
- 2.1.11 A description of the method or methods used for deriving any estimated data shall be included. The description shall show the rationale to support the reliability and maintainability values used in the LORA (along with the source for those values) and discussion of any derivation or allocation from the required values as well as any estimated values covered in the sensitivity analysis discussion.

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- 2.1.12 A listing of the outputs generated by execution of the LORA model(s) for the items being analyzed shall be included.
- 2.1.13 The report shall contain an addendum that documents the level of repair and discards decisions made by the government after review of the contractor's repair or discarded recommendations.
- 2.1.14 A discussion of the similar systems and their maintenance structure which were compared against the system under analysis and identification of constraints that were levied against the similar systems which influenced level of repair and discard decisions on those systems shall be included.
- 2.1.15 Identification of specific components and assemblies which have established maintenance structures that are to be used by the system under analysis shall be identified.
- 2.1.16 The report shall contain an indication and discussion of how current the LORA source data is for the similar system, recommendations for updating maintenance and other logistic elements and planning factors for the system under analysis, based on LORAs conducted on the similar systems being reviewed.
- 2.1.17 Any recommendations to the subcontractor(s) equipment designers to influence the design of the system being developed and recommended actions by the equipment designer to incorporate the LORA decisions into the system or equipment shall be included.
- 2.1.18 A description of problems, conclusions, assumptions, exceptions, and actions required shall be specified in the report.
- 3. Media Requirements. The LORA Data tables shall be in a digital file format comparable to the Government's LORA software, COMPASS.
- 4. End of DI-SESS-81902.