

Clause J.1 - Attachment B
Contract Data Requirements List

SPACE COMMUNICATIONS NETWORK SERVICES

October 2008

Contract Data Requirements List

The Contractor shall provide the services to NASA's Goddard Space Flight Center as described in SOW Section C of this contract, and shall distribute per clause C.2, the deliverable documentation, reviews and reports as follows:

Item	Description	SOW	Schedule
1.2-a	Work Breakdown Structure and Dictionary	1.2	With proposal and upon update
1.3-a	Integrated Management Plan	1.3	Initial with proposal; final version NLT Phase-in start + 3 months; and upon update
1.3-b	Risk Management Plan and Risk List	1.3	Initial Risk Management Plan with proposal; final Risk Management Plan Phase-in start + 2 months, bi-annual update thereafter. Risk List with proposal; monthly updates during phase-in and thereafter.
1.3-c	Mission Operations Readiness Review	1.3	No later than 30 days prior to launch or mission supports; and NLT 2 weeks prior to ELV supports
1.3-d	Emergency Preparedness and Disaster Recovery Plans	1.3	Phase-in start + 2 months, annual updates
1.3-e	Reliability, Maintainability and Sustaining Plan	1.3	Draft Plan at Phase-in start + 2 months; final Plan Phase-in start + 3 months with updates as required; annual Candidates for Replacement List every January 15 th
1.3-f	System Engineering Management Plan	1.3	Draft Plan at Phase-in start + 1 month; final Plan Phase-in start + 2 months, bi-annual updates
1.4-a	Task Implementation Plan and Cost Proposal	1.4, 3.0	Per IDIQ Task Order
1.4-b	Phase-Out Plan	1.4	12 months prior to contract end; with updates at 9 months, 6 months and 3 months prior to contract end.
1.5-a	Reports/Reviews	1.5	Per DRD 1.5-a
1.5-b	Equipment Availability Report	1.5, 2.1, 2.2.1	Per DRD 1.5-b
1.6-a	Task Earned Value Management System Plan	1.6	60 days after award of a Task Order Requiring EVMS; Revision to the EVMS Plan may be required at the Government's request if a change in the EVM system architecture occurs or in the event of a major Task

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			modification.
1.6-b	Task Performance Report	1.6	First Report NLT 90 days after the start of the Task Order. Monthly Reports due with corresponding NF533 Submission
1.6-c	Task Integrated Baseline Review	1.6	The formal IBR shall be scheduled NLT 150 calendar days after award of a task requiring EVMS, or NLT 60 calendar days after a significant funding or work scope realignment. The data package shall be delivered not less than six weeks prior to the IBR.
1.8-a	Government Property Management Plan	1.8	Draft Plan at Phase-in start + 1 month; final Plan Phase-in start + 2 months; with updates as required by Government revisions to applicable documents or changes in contractor processes.
1.9-a	Configuration Management Plan	1.9, 2.2.2.1	Draft Plan at Phase-in start + 1 month; final Plan Phase-in start + 2 months and upon update
1.10-a	Security Management Plan	1.10	Initial with proposal, final due at Phase-in start + 2 months and annual updates
1.10-b	Security Reports & Records	1.10, 2.3.2	Beginning at Phase-in start + 3 months. The Contractor shall provide Security Reports and Records in accordance with DRD 1.10-b. Incident and Information Reports submitted based upon events. Records maintained by the contractor for two years.
2.3.1.1-a	White Sands Complex Environmental Management Plan	2.3.1.1	Draft Plan at Phase-in start + 4 months; final Plan Phase-in start + 5 months, updated annually
2.3.2-a	TDRS Protection Plan	2.3.2	Plan update at Phase-in start + 3 months, updated annually

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.2-a

TITLE: Work Breakdown Structure and Dictionary

DESCRIPTION/USE: To organize the tasks to be accomplished in this contract. The Work Breakdown Structure (WBS) and Dictionary shall provide the framework for structuring the program implementation plans, establishing and tracking costs, preparing schedules, developing work force and material estimates, preparing work authorization documents, and reporting contract performance.

The structure shall be at least at one level of detail lower than the Government provided WBS specified in the RFP, with additional levels as required by the contractor.

INITIAL SUBMISSION: With proposal.

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Upon update.

INTERRELATIONSHIP: SOW 1.2, SOW 1.6

DATA PREPARATION INFORMATION:

SCOPE: The WBS shall encompass all the services required to achieve all the requirements of this contract. The WBS shall subdivide the work to be accomplished into elements that serve as the basis for detailed planning and control, and in addition, permit collection of cost and schedule data for each element.

APPLICABLE DOCUMENTS:

- a. NPR 9501.2, NASA Contractor Financial Management Reporting
- b. 48 CFR, Chapter 17, NASA Federal Acquisition Regulation (FAR) Supplement (NFS)
- c. Financial Management Manual (FMM) Volume 9000 Chapter 9060 and Volume 9100

CONTENTS: The WBS shall graphically depict the WBS tree. The Dictionary contains a concise description of contract activities to be performed and products to be delivered, subdivided by WBS element. A WBS element may represent an identifiable product, a set of data, a service, a task, or a budget function. The structure shall be at least at one level of detail lower than that specified in the RFP Section L with additional levels as required by the contractor. Lower levels of detail, which the contractor uses for its own management purposes to validate information reported to NASA, shall be compatible with NASA requirements and be accessible by NASA. The relationship between the WBS and the contractor's internal organizations and processes shall also be provided.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.3-a

TITLE: Integrated Management Plan

DESCRIPTION/USE: Describes the contractor's integrated management processes, organization, and standards.

INITIAL SUBMISSION: Initial with proposal; final version NLT Phase-in start + 2 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Initial, with updates upon modification.

INTERRELATIONSHIP: SOW 1.3 and Task Orders

DATA PREPARATION INFORMATION:

SCOPE: The Integrated Management Plan shall describe the contractor organization, and systems for accomplishing the functions described in the SOW.

APPLICABLE DOCUMENTS:

- a. NASA-STD-2804, Minimum Interoperability Software Suite
- b. NASA-STD-2805, Minimum Hardware Configurations
- c. 450-SNUG, Space Network Users Guide
- d. 453-GNUG, Ground Network Users Guide
- e. SCNS SOW
- f. Satellite Laser Ranging (SLR)/Very Long Baseline Interferometry (VLBI) Information - <http://ivscc.gsfc.nasa.gov/stations/index.html> & <http://ilrs.gsfc.nasa.gov/>
- g. NASA Operational Messaging And Directory Service (NOMAD) Requirements - <https://www.odin.lmit.com/gsfcnomad/migoverview.html>
- h. NASA Outsource Desktop Initiative (ODIN) Desktop Requirements - http://insidenasa.nasa.gov/ocio/policy/policy_standards/index.html

CONTENTS: The Integrated Management Plan shall address the contractor's process for work definition and authorization, schedules and scheduling, budgeting, EVMS implementation, data accumulation, safety and mission assurance, corrective action, subcontract management, indirect cost management, baseline control, organization structure identifying critical positions, and information management. The plan shall identify interoperability standards applicable to the contractors Government interaction. It shall describe the comprehensive integration of all management processes of the prime, subcontractors, and major vendors, and interaction with the Government. The systems shall include those specifically required to accomplish the Statement of Work, as well as those systems and procedures that are to be set in place by the contractor.

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The Integrated Management Plan shall discuss interrelationships of technical management, business management, and subcontract management. Also provide an organizational chart for this program identifying all managerial positions by title, position qualifications, and physical location. The plan shall provide a detailed description of the responsibilities and authorities for operation and management of this program, from lower levels through intermediate management to top-level management. The plan shall include such elements as the span of control, degree of autonomy, and lines of communication. All interfaces with NASA personnel, and major subcontractors shall be clearly delineated.

The plan shall provide a process to ensure all services are in a state of operational readiness at all times, including preparations for mission launches and sustaining levels of performance throughout mission lifetimes

This plan shall show interrelationships with more detailed plans and procedures for assuring the operational readiness of all services described in this SOW. These detailed plans shall include contingency provisions that shall ensure operational readiness during the temporary unavailability, either planned or unplanned, of facilities or equipment. Equipment shall include all resources between the input and output interfaces of the SCNS service provision facilities comprising not only operational and test equipment but cables, documentation, computer programs, tools, and supplies.

The plan shall provide for regular monitoring of all activities under this contract and provide visibility to NASA. Methods of assuring that performance standards are maintained shall be developed and employed and include: (a) personnel training and certification; (b) software status monitoring; (c) quality assurance auditing; (d) configuration management; and (e) property control and accountability.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.3-b

TITLE: Risk Management Plan and Risk List

DESCRIPTION/USE: Describe the Contractor's process for identifying and managing risk

INITIAL SUBMISSION: Initial Risk Management Plan and Initial Risk List with proposal

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Initial Risk Management Plan with proposal; final Risk Management Plan Phase-in start + 2 months, bi-annual update thereafter. Risk List with proposal; monthly updates during phase-in and thereafter.

INTERRELATIONSHIP: SOW 1.3

DATA PREPARATION INFORMATION:

SCOPE: The Risk Management Plan (RMP) shall describe the overall plan for Continual Risk Management (CRM). Risk List shall include all risks.

APPLICABLE DOCUMENTS:

- a. NPR 8000.4, Risk Management Procedures and Guidelines
- b. GPR 7120.4, Risk Management
- c. GSFC 5x5 Risk Matrix For Class A-C Type Missions (NASA provided definitions of likelihood and severity for risks and their categories)

CONTENTS:

The Risk Management Plan shall:

- a. Specify the contractor risk objectives and policy toward risk. Explain the purpose, scope, assumptions, constraints, key ground rules, and policy pertaining to the SCNS CRM process.
- b. Provide an overview of the CRM process and information flow; describe how the CRM process integrates and relates to other operations, maintenance, sustaining, development, project management and system engineering activities. Include risk mitigation strategies to be employed throughout the contract term.
- c. Show the organization, roles, and responsibilities of the SCNS Contractor and subcontractors with regard to CRM and NASA's involvement in the contractors' process. Document how team members will be trained in the application of CRM methodology.
- d. Provide the CRM process details and related procedures, methods, tools, and metrics. Include here, or in an appendix, the specific methodologies to be used for risk identification, analysis, planning, tracking, and controlling. Include the process to be used for continual assessment of the risk profile. Describe how risk information will be communicated both internally to the contractor staff and throughout the NASA management chain.

- e. Specify the format and data elements (the contractor shall use “GSFC 5x5 Risk Matrix For Class A-C Type Missions” likelihood and severity definitions for risks and their categories) that will comprise the SCNS Risk List, how configuration control will be applied, and how the list will be used and updated. Specify how NASA and contractor team members will be able to access the current list at any time. Include in the initial risk list set of identified risks and the action plan (for research, acceptance, tracking, or mitigation) for each risk.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.3-c

TITLE: Mission Operations Readiness Review

DESCRIPTION/USE: To describe the Contractor's operations readiness for a spacecraft launch, early orbit and operational support, including nominal and contingency/emergency, and end of mission.

INITIAL SUBMISSION: Prior to launch or new mission support under SCNS.

NASA APPROVAL: Required

SUBMISSION FREQUENCY: No later than 30 days prior to launch or mission supports; and NLT 2 weeks prior to Expendable Launch Vehicle supports

INTERRELATIONSHIP: SOW 1.3

DATA PREPARATION INFORMATION:

SCOPE: The Mission Operations Readiness Review shall describe the operational readiness of all facilities, personnel, procedures, hardware, firmware, software and documentation required to support a specific launch.

APPLICABLE DOCUMENTS:

- a. GPR-8700.6, Engineering Peer Reviews
- b. Individual mission Project Service Level Agreement
- c. Individual mission Networks Requirement Document
- d. Individual mission RFICD, Radio Frequency Interface Control Document
- e. Individual mission NOSP, Networks Operations Support Plan
- f. Individual mission Compatibility Test Plan

CONTENTS: The Mission Operations Readiness Review shall contain all information required to document the operational readiness of all facilities, hardware, firmware, software, personnel, and documentation to support missions.

The Mission Operations Readiness Reviews shall contain status of: Requirement Verification, Operator Training and Certification, Test Results, Discrepancy Reports, system development review items, IT and Physical Security, hardware and software systems, mission documentation, and Facility readiness. It will include a summary of all testing that was performed in preparation for that mission support, any deficiencies and recommended mitigation of those deficiencies. If additional assets are proposed to meet unique mission requirements such as commercial tracking stations, the contractor shall provide to NASA sufficient recent test and calibration information that provides assurance that these systems will perform as advertised and will be consistent with

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existing NASA security requirements. NASA will conduct the Mission Operations Readiness Review according to the procedures in the most recent version of GPR 8700.6.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.3-d

TITLE: Emergency Preparedness and Disaster Recovery Plans

DESCRIPTION/USE: To describe the contractor's approach for emergency preparedness and disaster recovery plans to reduce operational effects of a disaster on NASA mission-critical and/or time-sensitive essential operations through a set of predefined and flexible procedures.

INITIAL SUBMISSION: Phase-in start + 2 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Initial, with annual updates.

INTERRELATIONSHIP: SOW 1.3

DATA PREPARATION INFORMATION:

SCOPE: The Disaster Recovery Plans for the Space Network, Ground Network, SLR, VLBI, ESTL sites

APPLICABLE DOCUMENTS:

- a. NPD 8710.1, Emergency Preparedness Program
- b. NPR 8710.1, NASA Emergency Preparedness Program
- c. NPR 8715.2, NASA Emergency Preparedness Plan, Procedures and Guidelines
- d. NPR 8715.3, NASA Safety Manual
- e. QS-EPP-95-001 NASA Emergency Preparedness Plan
- f. GPR 8710.2, Emergency Preparedness Program Plan for Greenbelt
- g. JPD 1040.2D, JSC Emergency Preparedness Program (JEPP)
- h. KNPD 8710.1, KSC Emergency Preparedness Program Policy
- i. JHB 2000, Consolidated Comprehensive Emergency Management Plan (KSC)
- j. JDP-KSC-P-3006, Hurricane Preparation and Recovery
- k. 803-PLAN-0002, Hurricane Nor'Easter Preparedness Plan For Wallops Flight Facility
- l. Near Earth Networks Services Emergency Preparedness and Disaster Recovery Plan (EPDRP), NENS-PMO-PLAN-0030
- m. White Sands Complex Emergency Preparedness and Disaster Recovery Plan (EPDRP), NENS-SN-PLAN-0001.

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- n. Wallops Flight Facility Emergency Preparedness and Disaster Recovery Plan (EPDRP), NENS-GN-PLAN-0002.
- o. Merritt Island Launch Annex Emergency Preparedness and Disaster Recovery Plan (EPDRP), NENS-GN-PLAN-0016.
- p. Kokee Park Geophysical Observatory Emergency Preparedness and Disaster Recovery Plan (EPDRP), NENS-CCE-PLAN-0040.
- q. MOBLAS-4 Laser Tracking Station Emergency Preparedness and Disaster Recovery Plan (EPDRP), NENS-CCE-PLAN-0041.

CONTENTS: The Disaster Recovery Plan shall include or reference, as applicable, the following: a risk analysis of all critical facilities/systems; identification of specific equipment/facilities that require backup or alternate sites; identification of backup strategies; emergency response plans; backup facility/alternate sites operating plans.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.3-e

TITLE: Reliability, Maintainability and Sustaining Plan

DESCRIPTION/USE: To establish and document requirements and maintenance concepts for the SN, GN, SLR, VLBI and ESTL consistent with the networks mission requirements and performance metrics.

INITIAL SUBMISSION: Draft Plan at Phase-in start + 2 months; final Plan Phase-in start + 3 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Draft Plan at Phase-in start + 2 months; final Plan Phase-in start + 3 months with updates as required; annual Candidates for Replacement List every January 15th.

INTERRELATIONSHIP: SOW 1.3, SOW 1.12, SOW Appendix A, DRD 1.3-b

DATA PREPARATION INFORMATION:

SCOPE: Establish and document Reliability and Maintainability (R&M) operational performance requirements and maintenance concepts for the Networks consistent with NASA's mission requirements and performance metrics.

APPLICABLE DOCUMENTS:

- a. NPD 8720.1, NASA Reliability and Maintainability (R&M) Program Policy
- b. NASA-STD-8729.1, Planning, Developing And Managing An Effective Reliability And Maintainability (R&M) Program

CONTENTS: Plan shall establish a cost effective approach to ensure reliability, maintainability, and availability of SCNS systems. Plan shall address maintenance schedule, and implementing procedures, system calibrations, metrics, etc., which demonstrate ability to support missions. Plan shall address the replacement of obsolete and non-maintainable systems mitigating risk to SCNS services.

Annual listing of candidates for replacement shall include the technical details for upgrade including risk and life cycle cost benefit to NASA and be ranked in priority order for each network.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.3-f

TITLE: Systems Engineering Management Plan (SEMP)

DESCRIPTION/USE: Describe the Contractor's process for identifying and managing systems engineering activities

INITIAL SUBMISSION: Draft SEMP at Phase-in start + 1 month; final Plan Phase-in start + 2 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Final Plan Phase-in start + 2 months, bi-annual updates

INTERRELATIONSHIP: SOW 1.3, 2.2.1, 3.1; DRD 1.3-a

DATA PREPARATION INFORMATION:

SCOPE: The SEMP shall describe the overall process for performing systems engineering activities required in planning the technical efforts required for in-house and contracted projects as it applies to the sustainment and development of SCNS systems. The SEMP is designed to be a single, integrated technical planning document for the conduct and management of the required systems engineering effort. The resulting technical plan is to represent the agreed-to, and approved tailoring, of the plan to be used by the technical team responsible for generating technical work products to integrate and manage the full spectrum of technical activities required to engineer the system covered by the SEMP.

APPLICABLE DOCUMENTS:

- a. NPR 7123.1 - NASA Systems Engineering Processes and Requirements
- b. SCNS Integrated Management Plan (To be proposed)

CONTENTS:

Separate processes and procedures shall be tailored according to the scope and complexity of the development effort. The SEMP shall be coordinated with DRD 1.3-a for integration of the technical planning and modifications related to the allocated resources, including cost, schedule, personnel, facilities, and deliverables required.

The Systems Engineering Management Plan shall:

1. Specify the systems engineering processes and procedures as it applies to the development of new systems and modifications to existing systems, including operational concepts, operational requirements, system requirements, functional analysis, system analysis, trade-off strategies, and system test and evaluation strategies. Separate processes and procedures shall be tailored according to the scope of the development effort.

2. Identify systems engineering activities associated with concept development including needs analysis, concept exploration, and concept definition. Items to be addressed shall include the processes associated with the identification of operational deficiencies, technological opportunities, system trade studies, feasibility experiments, system operational requirements, system requirements definition, system performance requirements, and functional architecture definition.
3. Identify systems engineering activities associated with engineering development including advanced design, engineering design, and integration and test. Items to be addressed include risk abatement through the development of proof of concept and prototype articles, the development of reliability engineering, requirements verification and validation, integration, and operational evaluation.
4. Identify systems engineering activities associated with the post development operation and support phase. The focus shall be on the role that systems engineering will play in achieving a seamless transition to an operational environment without impacting current operational activities. Items to be addressed shall include the transition activities required for transition from a development to operational environment including system preparation, configuration management, documentation, training and continued sustainment through enhancements.
5. Specify how the areas of specialty integration are to be integrated into the system design and development, including reliability, maintainability, and availability engineering, producibility engineering, safety engineering, and human factors engineering.
6. Show the organization, roles, and responsibilities of the SCNS Contractor and subcontractors with regard to systems engineering function and NASA's involvement in the contractors' process. Document how team members will be trained in the application of systems engineering methodologies.
7. Describe the process the approval and maintenance of decisions attained pertaining to systems engineering activities.
8. Identify all active participants in the process and their prospective roles and responsibilities to one another.
9. Provide the systems engineering process details and related procedures, methods, tools, and metrics. Include here, or in an appendix, the specific methodologies to be used for systems engineering activities identification, analysis, planning, tracking, and controlling.
10. Describe how systems engineering information will be communicated both internally to the contractor staff, externally to subcontractor staff and throughout the NASA management chain.
11. Provide an overview of the systems engineering process and information flow; describe how the process integrates and relates to other operations, maintenance, sustaining, development, and project management activities.
12. Describe how technical performance measurement; risk management, and program management activities will be incorporated with systems engineering strategies as they pertain to the development of SCNS wide systems.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.4-a

TITLE: Task Implementation Plan and Cost Proposal

DESCRIPTION/USE: Response to SCNS IDIQ Task Order.

SUBMISSIONS: Per IDIQ Task Order/Modification and Clause H.10 Task Ordering Procedure

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Per IDIQ Task Order and Clause H.10.

INTERRELATIONSHIP: SOW 1.4, SOW section 3.x; Clause H.10, Clause H.18, Attachment C, DRD 1.2-a.

DATA PREPARATION INFORMATION:

SCOPE: Contractor's technical and cost proposal in response to an IDIQ Task Order/Modification.

APPLICABLE DOCUMENTS:

- a. User Guide for National Aeronautics and Space Administration Task Order Management System
- b. Individual IDIQ Task Order/Modification

CONTENTS: The Task Implementation Plan shall include all information required to determine the reasonableness of the Contractor's proposal in response to the Task Order.

The Task Implementation Plan shall include as a minimum the following:

- The technical approach for the specific requirements of the task;
- The schedule for completing the effort, including key milestones, the flow of activities from start to completion (including timeline), and approach for meeting milestones and documentation requirements;
- Period of performance;
- Elements of your organization involved;
- Task management, including configuration and cost control by work breakdown structure (WBS);
- External and internal organizational interfaces, both Government and Contractor;
- Staffing plan and skill mix consistent with the technical approach and schedule; identifying key/critical labor categories;
- Subcontracting arrangements and commercial service providers;
- Resources, such as facilities and equipment, necessary to successfully accomplish the task;

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- Identification of potential technical challenges, critical issues, including specific risk identification and mitigation;
- Any assumptions made in preparing a response to the Task Order must be clearly stated and described in detail.

The Cost Proposal shall include time phased cost information by element and any other information required to determine the reasonableness of the Contractor's proposal in response to the Task Order, to include the Basis of Estimate.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.4-b

TITLE: Phase-Out Plan

DESCRIPTION/USE: To establish and document plans to transition SCNS equipment and information to follow-on contractor(s).

INITIAL SUBMISSION: 12 months prior to contract end

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Updates at 9 months, 6 months and 3 months prior to contract end.

INTERRELATIONSHIP: SOW 1.4

DATA PREPARATION INFORMATION:

SCOPE: Addresses all SCNS functions and facilities, organized by WBS.

APPLICABLE DOCUMENTS:

- a. SOW
- b. WBS
- c. Individual IDIQ Task Orders
- d. Other DRD items

CONTENTS: Plan shall establish cost effective mechanisms to ensure the smooth and orderly transition of SCNS systems. Plan shall address: how ongoing work will be maintained and handed-over, the Phase-Out management organization, schedules with key milestones, checklists, status reporting, orientation and training of successor personnel. Include the approach for security, logistics and property management function transition. The plan shall address the schedule for inventory and delivery of the government furnished property, databases, hardware and software configuration items, documentation and procedures, etc.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.5-a

TITLE: Reports/Reviews

DESCRIPTION/USE: To provide information necessary for NASA’s insight function in addition to the Task Progress and Final Task Report described in clause C.2.

INITIAL SUBMISSION:

- A) Reports, at Phase-In for Service Accounting Report #1, remainder of reports at the end of the first reporting period after Phase-In;
- B) Reviews/meetings per table.

NASA APPROVAL: Not Required

SUBMISSION FREQUENCY: As described in table below.

INTERRELATIONSHIP: SOW 1.5, DRD 1.3-a, DRD 1.3-b, DRD 1.9-a

DATA PREPARATION INFORMATION:

SCOPE: Establishes the activity reporting for the Contractor’s progress and accomplishments as well as service performance.

APPLICABLE DOCUMENTS:

- a. NPR 8621.1, NASA Procedural Requirements for Mishap and Close Call Reporting, Investigating, and Recordkeeping
- b. NASA Form 1627
- c. GPR-8621.2, Processing Mishap And Close Call Reports
- d. 400-PG-8621.0.1 Anomaly Notification System For Code 400 Programs And Projects

CONTENTS: All reports shall be of sufficient depth and clarity to permit understanding and evaluation of progress made. Supporting data in the form of charts, graphs, etc. may be included as appropriate.

Reports & Reviews – As set forth in the contract schedule or required by individual IDIQ Task Orders.

FREQUENCY OF SUBMISSION:

#	TITLE	FREQUENCY	COMMENTS
A	Reports		
1	Service Accounting	Monthly	See Note #1
2	Configuration Change Summary	Monthly	See Note #2

3	TDRS Spacecraft	Every 6 months	See Note #3
4	Significant Event	Upon occurrence	See Note #4
5	Daily Operations Summary	Daily	See Note #5
6	Safety Report	Monthly	See Note #6
B	Reviews		
7	Weekly Status	Weekly	See Note #7
8	Management Status	Monthly	See Note #8
9	Program Management	Monthly	See Note #9
10	Contract Status	Monthly, or as required	See Note #10
11	Space Network Quarterly Review	Quarterly	See Note #11

NOTES:

#	TITLE & DESCRIPTION
1	<p>Service Accounting Report – Data service units (e.g., Single Access and Multiple Access minutes, orbital GN passes, etc.) scheduled and delivered to each customer mission.</p> <p>Note: Used to gather billing information for reimbursable customers and to provide metrics for performance evaluation.</p>
2	Configuration Change Summary – A monthly summary of all proposed configuration and Operations and Maintenance procedure changes.
3	TDRS Spacecraft Report – Describe the health and subsystems status for each on-orbit TDRS to characterize TDRS spacecraft performance and to monitor potential life-limiting performance trends. Spacecraft activities, events, and anomalies shall be described. Any spacecraft problems or issues shall be highlighted.
4	Significant Event Report – Brief e-mail description of significant events as they occur, both positive and negative (such as service outage, mishaps, close calls, successful lunches, etc.). Reporting shall cover all operational elements, including the contractor operated tracking stations, and commercial/foreign tracking stations.
5	<p>Daily Operations Summary – Describe the customers and time supported, support anomalies, special event status, equipment status, and upcoming events (e.g., tests, Engineering Changes, training) for SCNS in a daily e-mail.</p> <p>The SN Summary shall contain:</p> <ul style="list-style-type: none"> - Customer Support Table which shows the number of customer events scheduled on each SGLT (and WSC Alternate Relay Terminal/TDRS combination), the total number of events scheduled, the total amount of

	<p>forward and return service time scheduled and total data loss per customer and totaled for the SN.</p> <ul style="list-style-type: none"> - Customer Problems section describing any anomalies that affected customer services. Other significant operations problems that did not affect customer services shall be described separately. - Supported Activities section, which contains a description of each scheduled activity's objectives and results. - Spacecraft Activities section, which contains a description of any TDRS activities and results. - Service and Equipment Status section that provides a current list of SN operational equipment that is failed. - Forecast Schedule section that contains a listing of upcoming TDRS spacecraft operations, engineering, maintenance, test, and customer launch activities for a period of one week into the future. <p>The GN Summary shall contain:</p> <ul style="list-style-type: none"> - A tabular listing of GN Scheduled Passes which shows the number of customer events scheduled on each GN schedule resource, the total number of events scheduled, and subtotaled for the GN resource, the customer, and totaled for the GN. - An itemized listing of GN Customer Events describing any anomalies that affected customer services. - An itemized listing of GN Tests which contains a description of each scheduled activity's objectives and results. - An itemized listing of GN Equipment Status that provides a list of GN equipment that is current inoperable. - An itemized listing of STDN Launch Forecast
6	<p>Monthly Safety Report – A summary report of the current month's Close Calls, Mishaps, Vehicle accidents, OSHA recordable and a lost time incidents, etc.</p>
7	<p>Summary of Weekly Status – Presented as a Briefing to Program and Project Managers.</p>
8	<p>Management Status Reviews (MSR) – Separate detailed monthly reviews for the Space Network and Ground Network Projects, Networks Integration Management Office (NIMO) and task technical reviews per task order, focused on technical issues, risks, metric performance and cost unique to SCNS.</p> <p>The SN MSR shall describe accomplishments, status and plans for SN operations, maintenance, engineering, and support functions. Issues, risks, and problem areas shall be highlighted. For SN tasks, accomplishments, plans, problem areas, technical status, metric performance, cost performance, and schedule performance shall be presented.</p> <p>The GN MSR shall describe accomplishments against metrics and goals, status and plans for GN operations, maintenance, engineering, and support functions. Issues, risk identification and tracking, and problem areas shall be highlighted.</p>

	<p>For specific tasks, accomplishments, plans, problem areas, technical status, cost performance, metric performance, and schedule performance shall be presented.</p> <p>The NIMO MSR shall describe accomplishments, status and plans for changing customer requirements, and support functions. This includes an integrated status of GN and/or SN readiness to support new customers. Issues, risks, metric performance, and problem areas shall be highlighted. For NIMO tasks, accomplishments, plans, problem areas, technical status, cost performance, and schedule performance shall be presented.</p>
9	<p>Program Management Review – A monthly executive review to document accomplishments; changes in plans; problems being worked and proposed solutions. The discussion of plans, progress, risk list items, and problems shall include variance analysis and reporting of cause, impact, and corrective action. Technical issues shall be covered in terms of metric performance, schedule progress, and/or cost impact. The review shall include current status, health and safety, cost estimate at complete for IDIQ Task Orders and Core, and upcoming major events.</p>
10	<p>CO, COTR, and Financial Manager meetings with Contractor counterparts. Meeting content shall be determined by the CO and may vary by the type, number and complexity of contract action and issues. The CO may elect to hold face-to-face meeting, work via email, or cancel meetings as he/she deems prudent.</p>
11	<p>Single day review held at White Sands Complex on a quarterly basis to review all aspects of site operations, development, management, etc. Typically, other splinter meetings and management sessions are held during the other days of the week.</p>

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.5-b

TITLE: Equipment Availability Report

DESCRIPTION/USE: To provide information necessary for NASA's insight into equipment availability as determined from sustaining maintenance activities.

INITIAL SUBMISSION: Phase-in start + 3 months

NASA APPROVAL: Not required

SUBMISSION FREQUENCY: Monthly

INTERRELATIONSHIP: SOW 1.5, SOW 2.1, SOW 2.2.1

DATA PREPARATION INFORMATION:

SCOPE: Establish and document Equipment Availability metrics and supporting data.

APPLICABLE DOCUMENTS:

- a. NPD 8720.1, NASA Reliability and Maintainability (R&M) Program Policy
- b. NASA-STD-8729.1, Planning, Developing And Managing An Effective Reliability And Maintainability (R&M) Program

CONTENTS: All reports shall be of sufficient depth and clarity to permit understanding and evaluation of sustaining maintenance activities performed. Supporting data in the form of charts, graphs, etc. may be included as appropriate.

Each occurrence of a system failure shall include the following information. This data shall be included in the monthly report:

1. Date and time of occurrence when string was taken offline
2. Element affected
3. Service affected
4. String affected
5. Subsystem affected
6. Downtime as previously defined
7. CDS DR #
8. Root cause and corrective action
9. Data/Service loss
10. Action required to fix
11. Date and time string placed back online

The monthly report shall identify and emphasize empirical data indicating trends in potential obsolescence and maintainability issues as candidates for obsolescence replacement studies/activities. Supporting data with recommendations shall be provided.

Three metrics shall be maintained: Equipment Availability per Service, Equipment Availability per Element, and Total Equipment Availability.

The period of measurement shall be assessed over a 24 x 7 during the monthly reporting period.

Equipment Availability per Service:

Equipment Availability per Service (EAS) is defined as the percentage of time that an individual service within an element, as measured from a prime and hot backup perspective, is available for operational use based on equipment availability in each path.

Availability of services is measured on an individual basis. For a list of services, refer to the Table of SN services below. The SN consists of a total of 125 services as described below.

Metrics shall be individually maintained and recorded for each service in each element as follows:
 $EAS = AoS[Prime] * AoS[Hot Standby]$

Where Availability of Service (AoS) = $(T_{avail} - T_{down}) / T_{avail}$, where T_{avail} is defined as the time the system is expected to be available (24x7), and T_{down} is defined as the total amount of time the system element is down during a corrective maintenance period to diagnose the problem, repair and/or replace faulty components and verify the repair action to the condition where the system element is available for full operational use.

Configurations deviating from the typical Prime and Hot Standby configuration shall be noted and documented in the reporting methodology used to derive the EAS value.

Equipment Availability Per Element:

Equipment Availability per Element (EAE) shall be maintained. EAE is defined as the percentage of time that an element, based on the cumulative sum of all services, is available for operational use.

Where $EAE = (T_{avail}[\text{Sum of all Services}] - T_{down}[\text{Sum of all Services}]) / T_{avail}[\text{Sum of all Services}]$, where $T_{avail}[\text{Sum of all Services}]$ is defined as the cumulative sum of possible available time during the period of measurement (24x7) for all services in a specific element, and $T_{down}[\text{Sum of all Services}]$ is defined as the cumulative sum of downtime for all services during the period of measurement in that element where the service is down during a corrective maintenance period to diagnose the problem, repair and/or replace faulty components and verify the repair action to the condition where the system element is available for full operational use.

Total Equipment Availability:

Total Equipment Availability (TEA) shall be maintained. TEA is defined as the percentage of time that an element, based on the cumulative sum of all services, is available for operational use.

The EAE metrics individually observed for each element are then used to determine the total intrinsic availability as follows:

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Total Equipment Availability = EAE[SGLT-1] * EAE[SGLT-2] * EAE[SGLT-3] * EAE[SGLT-4] * EAE[SGLT-5] * EAE[SGLT-6] * EAE[SGLT-7] * EAE[DIS] * EAE[DAS] * EAE[STTC] * EAE[WART] * EAE[ETGT] * EAENCCDS]

Table of SN services

Element	# of Services	
SGLT-1	16	SSA1F, SSA2F, KSA1F, KSA2F, MAF, SSA1R, SSA2R, KSA1R, KSA2R, MAR (5), DAS (EMC), TTC
SGLT-2	16	Same as SGLT-1
SGLT-3	9	No MAF, MAR, or DAS
SGLT-4	16	Same as SGLT-1
SGLT-5	16	Same as SGLT-1
SGLT-6	13	Only 2 MAR
SGLT-7	15	SSA1F, SSA2F, KSA1F, KSA2F, MAF, SSA1R, SSA2R, KSA1R, KSA2R, MAR (5), TTC
DIS	2	WSGT and STGT
DAS	14	8 at WSC and 6 at GRGT
STTC	2	WSGT and STGT
WART	2	TTC and USS
ETGT	1	
NCCDS	3	SPSR, CCS, and SWSI
SN Total	125	

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.6-a

TITLE: Task Earned Value Management System (EVMS) Plan

DESCRIPTION/USE:

INITIAL SUBMISSIONS: 30 days after award of a Task Order Requiring EVMS

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Revision to the EVMS Plan may be required at the Government's request if a change in the EVM system architecture occurs or in the event of a major Task modification.

INTERRELATIONSHIP: SOW 1.3, SOW 1.6, DRD 1.3.b, Clause I.21, Applicable Task Order SOW

DATA PREPARATION INFORMATION:

SCOPE: Describe the contractor's implementation of its EVMS for an applicable Task Order

APPLICABLE DOCUMENTS:

- NPR 7120.5, Program/Project Management Processes and Requirement
- NFS 1852.234-2, Earned Value Management System
- American National Standards Institute/Electronic Industries Association(ANSI/EIA)-748
- DRD 1.3-b
- Task Order SOW

CONTENTS: In the EVMS Plan and supporting documentation, the contractor shall describe the program or project's implementation of its earned value management system. The Plan shall demonstrate the use and understanding of the contract's overall financial and project management system with regard to EVMS at all levels of Task Management. The contractor's plan shall identify policies, methods, procedures, and training utilized to meet the requirements of NPR 7120.5 and NPR 9501.2 (NF533).

The Plan shall address processes for managing technical scope, schedule, cost and risk; for conducting variance analysis; and for developing ongoing and comprehensive estimates at completion.

This Plan shall address the flow down of requirements to all major subcontracts consistent with the criteria and requirements defined in NPR 7120.5.

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The Plan shall ensure that the system provides for the results of all analyses based on EVM to be linked to or associated with the contractor's Risk Management System. Any cost and/or schedule risk being managed by the contractor's Project Manager shall correlate the results of the EVM analysis process to track, manage, and mitigate risk.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.6-b

TITLE: Contractor Performance Report

DESCRIPTION/USE: The Contractor Performance Report provides the monthly status of Task Order performance data and estimates at complete, identifies approved changes to the Performance Measurement Baseline, and reports variances and projected variances at complete including explanatory analysis.

SUBMISSIONS: First Report NLT 60 days after the start of the Task Order.

NASA APPROVAL: Not Required

SUBMISSION FREQUENCY: Monthly Reports due with corresponding NF533 Submission

INTERRELATIONSHIP: SOW 1.6, DRD 1.3-f, Clause I.21, Applicable Task Order SOW

DATA PREPARATION INFORMATION:

SCOPE: The Contractor Performance Report (CPR) is the primary deliverable for EVM on any applicable Task Order

APPLICABLE DOCUMENTS:

- a. NPR 7120.5D, NASA Program and Project Management Processes and Requirement
- b. NFS 1852.234-2, Earned Value Management System
- c. DI-MGMT-81466A, Contract Performance Report dtd 3/30/2005
<https://acc.dau.mil/CommunityBrowser.aspx?id=19544>
- d. Department of Defense Earned Value Management Implementation Guide (EVMIG)
(website: <https://acc.dau.mil/CommunityBrowser.aspx?id=19577>)
- e. Instructions for the CPR Formats 1-5:
<https://acc.dau.mil/CommunityBrowser.aspx?id=19544>
- f. Excel spreadsheet of CPR Formats 1-5:
<https://acc.dau.mil/CommunityBrowser.aspx?id=19543>
- g. Task Order SOW
- h. Task Earned Value Management System Plan

CONTENTS:

The CPR consists of five formats (With the approval of the CO, Task Monitors may tailor to eliminate Formats 2 and/or 4 depending on the size of the activity):

- Format 1: Performance Data by Work Breakdown Structure (WBS)
- Format 2: Performance Data by Organizational Category
- Format 3: Performance Measurement Baseline – Changes
- Format 4: Staffing/Workforce by Organizational Category
- Format 5: Variance Analysis

The CPR shall include data pertaining to all authorized contract work, including both priced and unpriced effort that has been authorized at a not-to-exceed amount in accordance with the Contracting Officer's direction. The CPR shall separate direct and indirect costs and identify elements of cost for all direct reporting. The CPR shall include Formats 1 - 5, down to a WBS Level 4. A lower level of reporting may be required for elements that are classified as special interest technical, schedule, or cost risk areas and to support occasional special analyses (GAO or IG audits, project-level Cost Analysis Data Requirements).

Earned value performance measurement data for Government and/or contractor-identified medium- and high-risk WBS items shall be reported on Format 1 of the monthly CPR until such time as both Government project management and the Contractor agree that they no longer represent medium or high risks. This reporting shall be at a level where the risk resides in the WBS. For medium- and high-risk elements lower than WBS Level 4, specific narrative variance analyses are not required unless specified as special interest.

To ensure an integrated approach to risk management, the data provided by this CPR DRD shall be in consonance with the Work Breakdown Structure (WBS), Integrated Master Schedule (IMS), Risk Management Processes, Plans and Reports (where required), Probabilistic Risk Assessment Processes and Reports (where required), the Cost Analysis Data Requirement (CADRe) and the Monthly/Quarterly Contractor Financial Management Reports (533M/Q). The financial Management Reports shall include reconciliation between the 533Q and the Contractor Performance Report. This reconciliation may be included within the required CPR Formats.

Preparation Information:

FORMAT: CPR formats shall be completed according to the instructions outlined in DI-MGMT-81466A and the following forms: Format 1 (DD Form 2734/1); Format 2 (DD Form 2734/2); Format 3 (DD Form 2734/3); Format 4 (DD Form 2734/4); and Format 5 (DD Form 2734/5). Samples of these forms are available at: <https://acc.dau.mil/CommunityBrowser.aspx?id=19543>. Format 5: Variance analysis thresholds which, if exceeded, require problem analysis, narrative explanations and corrective action plan descriptions for all level three and other special interest WBS elements (in the previous paragraph). ABC variance analysis thresholds will initially be 10% (+ or -) of both current and cumulative cost and schedule variance to date. The variance analysis thresholds may change once the ABC Project personnel evaluate the contractor's schedule and cost performance, and risk. Special emphasis should be placed in the variance analysis on cost and schedule growth

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linked to technical risks (e.g., technology development efforts; design engineering; integration; complexity; project management; systems engineering; duration constraints; etc.) identified by both the government and contractor.

Contractor format may be substituted for CPR formats whenever they contain all the required data elements at the specified reporting levels in a form suitable for NASA management use. The CPR shall be submitted electronically and followed up with a signed paper copy. The American National Standards Institute (ANSI) X12/XML standards (transaction sets 839 for cost and 806 for schedule), the United National Electronic Data Interchange for Administration, Commerce and Transport (EDIFACT, <http://www.unece.org/trade/untdid/>) equivalent, , or any other electronic delivery method deemed acceptable to the ABC Project Office shall be used for Electronic Data Interchange.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.6-c

TITLE: Integrated Baseline Review

DESCRIPTION/USE: An Integrated Baseline Review (IBR) is a joint assessment conducted by the Government Task Monitor, support staff, and the contractor to verify the realism and accuracy of the Performance Measurement Baseline (PMB). This involves verifying the technical content of the baseline and assessing the realism and accuracy of the related resources (performance budget and IMS [Integrated Master Schedule]). The IBR is unlike the VR [Validation Review] that focuses on EVMS compliance with ANSI/EIA-748. Instead the IBR focuses on assessing the realism of the baseline. (DoD EVM Implementation Guide (October 2006), Section 2.4.1, p. 55)

INITIAL SUBMISSION: The formal IBR shall be scheduled NLT 150 calendar days after award of a task requiring EVMS. The data package shall be delivered not less than six weeks prior to the IBR.

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Additional IBRs are required NLT 60 calendar days after a significant funding or work scope realignment. The data package shall be delivered not less than six weeks prior to the IBR.

INTERRELATIONSHIP: SOW 1.6, DRD 1.6-a, Clause I.21

DATA PREPARATION INFORMATION:

SCOPE: Limited to the individual applicable Task Order

APPLICABLE DOCUMENTS:

- a. NPR 7120.5D, NASA Program and Project Management Processes and Requirement
- b. NFS 1852.234-2, Earned Value Management System
- c. Department of Defense Earned Value Management Implementation Guide (EVMIG) (<https://acc.dau.mil/CommunityBrowser.aspx?id=19557> October 2006)
- d. Task Order SOW

CONTENTS: An IBR Data Package shall be submitted in accordance with the IBR objectives stated above.

The Contractor Data Package shall contain the following:

- Program/Business Management and Control Account Notebooks that incorporates the data products requested by the Project Office (hard copy and electronic copy)
- A baselined electronic version of the Integrated Master Schedule
- Contractor Earned Value Process Documentation (hardcopy and electronic)
- Two months of EV Performance data

The Contractor shall ensure proper flowdown of this requirement to subcontractors per NPR7120.5.

An example of the contents of a typical IBR Notebook is provided below:

Typical Content of Integrated Baseline Review Notebooks
(due 60 days prior to IBR)

Note: Most of these documents are simply ongoing operational documents gathered together into one notebook. Some documents will already reside in the EVMS Plan.

Program Management Data Notebook:

- Suggested notebook and presentation content:
 - EVM Top Level Authority
 - Brief overview of EVM process.
 - Organization Charts – flow down as needed including EVM from subcontracts
 - Internal communication and action planning structure
 - Top Level Planning and Baseline assumptions
 - Program Percentages (LOE versus Discrete)
 - TASK WBS
 - TASK EOC RAM
 - Top Level Program Work Authorization and CAP
 - Program technical scope – flow down from SOW to Managers and Cost Account Managers
 - EAC assumptions if different from negotiated Budget at Complete values
 - CPR Submittals
 - Program Schedule
 - Top level with vertical and horizontal traceability
 - Critical path
 - Risk Management approach
 - Current Task Top Risks
 - Risk list and Self Assessment Procedures
 - Management Reserve levels and approach
 - Undistributed budgets, if any, and their work assignments
 - Funding Profile
 - Subcontractor Management Plan, if applicable
 - Management review or reporting cycle

- Technical/Schedule/Cost/Risk Plan and Status
- EVM flow-down
- IBR results
- Any other key programmatic

Control Account Management (CAM) Data Notebook:

- Data content specific to the Control Account or Integrated Product Team

Technical Scope/Cost:

- Organization chart for the Cost Account (CA)
- RAM (show location in RAM with budget amounts)
- Location in Contract Statement of Work
- Work Authorization Documentation: trace to authorized budget
 - Show how work gets authorized from high to low levels
- Time Phased Control Account Plan
 - WPs and PPs
 - Resource loading of task: work packages and planning packages
- Baseline Metrics
 - Phased dollars by element of cost breakdown
 - Phased workforce profiles (FTEs)
- Labor Reports

Control Account Management (CAM) Data Notebook: (cont'd)

Schedules:

- Flow-down of intermediate schedule into detailed schedules
- Including any program critical path
- Key handoffs
- Schedule Metrics

Risk List:

- Current or anticipated risks in this CA or IPT

Earned Value Methodology:

- EV techniques and rationale
- Cost performance report (≥ 2 months)
- Variance analysis reporting if applicable
- Internal communication and action planning

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.8-a

TITLE: Government Property Management Plan

DESCRIPTION/USE: Describe the method of administering Government property.

INITIAL SUBMISSION: Draft Plan at Phase-in start + 1 month; final Plan Phase-in start + 2 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Initial, with updates as required by Government revisions to applicable documents or changes in contractor processes.

INTERRELATIONSHIP: SOW 1.8, SOW 2.3.3, SOW 3.3

DATA PREPARATION INFORMATION:

SCOPE: The Government Property & Logistics Management plan defines the contractor's use, maintenance, repair, transportation, protection, and preservation of Government property.

APPLICABLE DOCUMENTS:

- a. FAR Part 45
- b. NFS Part 1845
- c. NPR 4200.1, NASA Equipment Management Procedural Requirements
- d. NPR 4300.1, NASA Personal Property Disposal Procedural Requirements
- e. NPR 6000.1, Requirements for Packaging, Handling, and Transportation for Aeronautical and Space Systems, Equipment, and Associated Components
- f. NPD 6200.1, NASA Transportation and General Traffic Management
- g. NPR 7500.1, Program and Project Logistics Policy
- h. GPR 6400.1, Logistics Support

CONTENTS: It shall describe the contractor's approach to account for NASA property, supplies, equipment, and transportation assets and services acquired or utilized by their respective program or project. This plan shall consist of those procedures, which constitute the contractor's Property Management & Logistics Manual and shall include at a minimum the following categories:

- a. Property Management
- b. Acquisition
- c. Receiving
- d. Identification

- e. Records**
- f. Utilization**
- f. Maintenance**
- g. Subcontractor Control**
- h. Disposition**
- i. Contractor Closeout**
- j. Movement**
- k. Storage**
- l. Physical Inventories**
- m. Reconcile Contractor Records with Financial Records**
- n. Facility-Unique Considerations**
- o. Transportation and Packaging**

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.9-a

TITLE: Configuration Management Plan

DESCRIPTION/USE: To describe the contractor's method for accomplishing the configuration management requirements of the contract.

INITIAL SUBMISSION: Draft Plan at Phase-in start + 1 month; final Plan Phase-in start + 2 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: upon update

INTERRELATIONSHIP: SOW 1.9, SOW 1.12, DRD 1.5-a, Clause E.6

DATA PREPARATION INFORMATION:

SCOPE: The plan shall describe the contractor's management approach and planned implementation methods for accomplishing the contract wide configuration management requirements.

APPLICABLE DOCUMENTS:

- a. AS9100, Quality Management Systems – Aerospace – Requirements
- b. CMMI®-SE/SW Capability Level 2

CONTENTS: The plan shall prescribe the configuration management processes for hardware, software, firmware, and documentation to be implemented and methods to be used for configuration identification, interface control, change control, documentation, status accounting, and configuration verification. The plan shall describe the contractor's CM organization, policies, procedures, implementation approach, and control systems that are to be used to ensure proper performance of all required contract CM activities.

The plan shall describe the NASA participation in the contractor Configuration Management process. The plan shall describe the process for providing a brief description of all proposed changes to be prepared and transmitted to the designated NASA engineering representative prior to each configuration control board or forum meeting held by the contractor.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.10-a

TITLE: Security Management Plan

DESCRIPTION/USE: The plan shall describe the contractor's management approach and processes for accomplishing the security requirements of the contract.

INITIAL SUBMISSION: Initial with proposal, final due at Phase-in start + 2 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Initial with proposal, final due at Phase-in start + 2 months; with annual updates

INTERRELATIONSHIP: SOW 1.10, SOW 2.3.2, DRD 1.10-a , Clause I.15

DATA PREPARATION INFORMATION:

SCOPE: The plan shall describe the industrial, physical, personnel, information (INFOSEC) and communications (COMSEC) safeguards for use in performance of this contract.

APPLICABLE DOCUMENTS:

- a. DD 254

CONTENTS: The content must address the DD 254.

The Security Management Plan shall identify security controls in place at contractor, subcontractor and commercial provider sites, and for NASA GFP. This Plan shall address

- industrial
- physical
- personnel
- information (INFOSEC)
- communications (COMSEC)
- Inspections
- Reporting
- Waivers

The Contractor shall submit a draft Security Management Plan that addresses each facility sustained by the Contractor. The NASA Security Manager will review the draft and submit comments to the Contractor. The Contractor shall incorporate review comments, as applicable, into the Security Management Plan.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 1.10-b

TITLE: Security Reports and Records

DESCRIPTION/USE: To report security items.

INITIAL SUBMISSION: Beginning at Phase-in start + 3 months.

NASA APPROVAL: Not required

SUBMISSION FREQUENCY: Incident and Information Reports submitted based upon events. Records maintained by the contractor for two years.

INTERRELATIONSHIP: SOW 1.10, SOW 2.3.2

DATA PREPARATION INFORMATION: Only Incident Reports and Information Reports are submitted to NASA, others are maintained as records.

SCOPE: Complete reports and records daily, weekly and monthly as required.

APPLICABLE DOCUMENTS:

DD 254

CONTENTS:

- A. Daily Security Log
- B. Information Reports
- C. Incident Reports
- D. Safe & Cabinet Security Record
- E. Activated Alarm Record
- F. Alarm Arm/Disarm Log
- G. Official Visitors Register
- H. Auxiliary Log
- I. Visit Authorizations
- J. Other documents, reports and forms as required.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 2.3.1.1-a

TITLE: White Sands Complex Environmental Management Plan

DESCRIPTION/USE: The plan shall describe the contractor's management approach, processes, organization, and standards for environmental management at the WSC, in compliance with the requirements set forth in the most current version of GPD 8500.1.

INITIAL SUBMISSION: Draft Plan at Phase-in start + 4 months; final Plan Phase-in start + 5 months, updated annually

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Initial, updated annually.

INTERRELATIONSHIP: SOW 1.13, SOW 2.3.1.1, Clause H.24

DATA PREPARATION INFORMATION:

SCOPE: The Environmental Management Plan shall describe how the contractor will manage environmental requirements in compliance with the most recent version of GPD 8500.1.

APPLICABLE DOCUMENTS:

GPD 8500.1, Environmental Program Management
GPR 8500.1, Environmental Planning and Impact Assessment;
GPR 8500.3, Waste Management;
GPR 8500.4, Air Quality Management Program
GPR 8500.5, Water Management

CONTENTS

At a minimum, the Plan shall describe:

- a. The contractor's approach to meet the requirements of environmental procedural requirements including, but not limited to GPR 8500.1, Environmental Planning and Impact Assessment; GPR 8500.3, Waste Management; GPR 8500.4, Air Quality Management Program; and GPR 8500.5, Water Management;
- b. The organization, roles, and responsibilities of program, project, customer, and supplier personnel with regard to the environmental management;
- c. Documented procedures, engineering controls or other appropriate methods to maintain compliance with NASA and GSFC requirements and goals;
- d. Methodology for handling corrective and preventive action to resolve environmental nonconformance or non-compliance when identified;
- e. System for maintaining, calibrating, and repairing all equipment in order to prevent an environmental nonconformance or noncompliance; and

- f. Records maintenance and reports submittal required by directives and procedures, as applicable.

DATA REQUIREMENTS DESCRIPTION (DRD)

DRD NO.: 2.3.2-a

TITLE: TDRS Protection Plan

DESCRIPTION/USE: The plan shall identify security control procedures that can be exercised on a routine basis to ensure protection strategies are satisfied and TDRS space system vulnerabilities are mitigated, in compliance with the requirements set forth in the most current version of GPD 7120.1.

INITIAL SUBMISSION: Plan update at Phase-in start + 3 months

NASA APPROVAL: Required

SUBMISSION FREQUENCY: Updated annually.

INTERRELATIONSHIP: SOW 1.10, SOW 2.3.2, Clause H.20

DATA PREPARATION INFORMATION:

SCOPE: The TDRS Protection Plan shall describe how the contractor will implement and manage TDRS protection strategies in compliance with the most recent version of GPD 7120.1.

APPLICABLE DOCUMENTS:

GPD 7120.1, Goddard Space Flight Center (GSFC) Space Asset Protection Policy

CONTENTS

At a minimum, the Plan shall describe:

- a. The contractor's approach to the preparation of threat summaries;
- b. Information details regarding TDRS protection plans;
- c. Protection strategies appropriate for the threats and risk levels identified, and;
- d. The processes for compliance with the TDRS's space asset protection requirements.