



**Welcome to**  
**SpaceDOC III Industry Day**

**February 8, 2023**



**Space Flight Systems Development and Operations  
Contract III (SpaceDOC III)  
Request For Proposal (RFP) 80GRC022R0016  
Industry Day**

**February 8, 2023**

**Kickoff**

**David Frate**



# Important Information

## Emergency Dispatch:

Dial 911 from in-house phone or 216-433-8888 from cell phone.

**Medical Services:** 216-433-5841

- Emergency Egress exit doors are located to the left and to the right in the back of the room.
- Restrooms are located across the lobby down the middle hallway on the left.
- Guest WiFi: See Instructions for Connecting to “NASA-Connect” Wi-Fi.
- Complimentary refreshments are provided on the table along the wall next to the main entrance. There are also vending machines at the end of the middle hallway (Rm 124).
- Lunch is not provided. The cafeteria is located on the 2<sup>nd</sup> floor of Building 164 (next to this building).
- As a courtesy to all participants, we ask that you please refrain from taking photographs or recording Industry Day presentations, tours and One-on-One meetings
  - Industry Day presentations and names of companies in attendance will be posted to **SAM.gov** by the end of the week.
- Rooms 127, 128, and 129 down the first hallway are available for contractors use today
- *If returning tomorrow, please keep your badge and present it at the Main Gate for entrance tomorrow. On your last day of attendance, please return visitor badges to visitor control (Main Gate) when you depart the Center at the end of the day.*

# Industry Day Agenda (Feb 8<sup>th</sup>)



- 9:00 – Kickoff – Industry Day Logistics and Goals**
- 9:10 – Welcome from GRC Associate Director**
- 9:15 – SpaceDOC Overview**
- 9:30 – SpaceDOC III Draft RFP Overview**
- 10:30 – Break**
- 10:45 – Response to Questions**
- 11:00 – SpaceDOC III Draft RFP Overview (cont.)**
- 12:00 – 1:15 – Lunch Break**
- 1:15 – Response to Questions and Wrap Up**
- 2:00 – 4:30 Tours**
- 2:00 – 2:20 B332**
  - EMI Laboratory, Thermal Test Facility (TTF)**
- 2:25 – 3:10 B333 Power Systems Facility (PSF)**
  - High Bay Cleanroom**
  - Telescience Support Center (TSC)**
- 3:20 – 4:00 B110 Space Experiments Laboratory (SEL)**
- 4:10 – 4:30 B56 Structural Dynamics Lab (SDL)**



# Industry Day Agenda (Feb 9<sup>th</sup>)

## One-On-One Meetings

Time	Company	Bldg 162 Room No.
9:00 AM – 10:00 AM	ZIN Technologies Inc	127
10:15 AM – 11:15 AM	Sierra Lobo, Inc.	127
11:30 AM – 12:30 PM	Leidos	127



# Questions and Answers

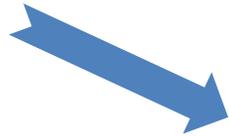
- **Asking questions:**
  - Go to [www.grc.cnf.io](http://www.grc.cnf.io) and submit a question
  - Opportunities throughout the day to ask the presenters in real-time
- **NASA may post the Industry Day Q&A to [SAM.gov](http://SAM.gov). All questions will be anonymous, and there will be no references to company-specific information.**
- **All other discussions, questions, and comments on the draft RFP (DRFP) received from Industry, Industry feedback to the Cover Letter topics posed by NASA, or from the One-on-Ones will be taken into consideration for the final RFP.**
- **All feedback on the DRFP is due to [paige.e.foreman@nasa.gov](mailto:paige.e.foreman@nasa.gov) via email no later than Monday February 13, 2023, 5:00pm Eastern Time**



# Submitting Questions Online

Navigate your web browser to: [www.grc.cnf.io](http://www.grc.cnf.io)

Click



**Wednesday, February 8**

**SpaceDOC III Industry Day**  
8:00am - 5:30pm

**Social Q&A** ⊕ Ask

Sorted By **Upvotes** Showing **All** ⚙️

1	When are proposals due?			
1	What is the contract type?			

Click  
to ask a  
question



Click here to upvote a question if you also want to raise this question





# Goals of Industry Day

- **Industry Day is intended to assist potential Offerors with their understanding of the SpaceDOC III acquisition. NASA will:**
  - Explain the overall process and the scope of the procurement
  - Provide insight into the structure of the DRFP and evaluation criteria
  - Provide tours of key facilities at GRC
- **Industry Day also provides potential Offerors an opportunity to provide NASA with feedback on the DRFP to be taken into consideration for the final RFP. Potential Offerors may:**
  - Ask clarification questions
  - Provide feedback on topics listed in the DRFP Cover Letter or any other DRFP topics that could be improved

***Overall goal is to improve the quality of the proposals***



## **\*\*\*\*\* Disclosure \*\*\*\*\***

**In the event of *any* discrepancy between information you hear today or tomorrow and information in the Final Request for Proposal (RFP), the Final RFP is the controlling document.**



# Points Of Contact

Subject	Name	Contact Info
Contracting Officer	Paige Foreman	<a href="mailto:paige.e.foreman@nasa.gov">paige.e.foreman@nasa.gov</a>
Small Business Specialist	Eunice Adams-Sipp	<a href="mailto:eunice.j.adams-sipp@nasa.gov">eunice.j.adams-sipp@nasa.gov</a>
GRC Ombudsmen	Dawn Schaible	<a href="mailto:dawn.schaible-1@nasa.gov">dawn.schaible-1@nasa.gov</a>



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **NASA GRC Associate Director's Welcome**

**Larry Sivic**

**Associate Director of the National Aeronautics and Space Administration's  
John H. Glenn Research Center**



# Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day

February 8, 2023

Space Flight Systems Directorate (Code M)  
SpaceDOC Overview

Robert R. Corban  
Chief, ISS and Human Health Office  
NASA Glenn Research Center



## Space Flight Systems Directorate (Code M)

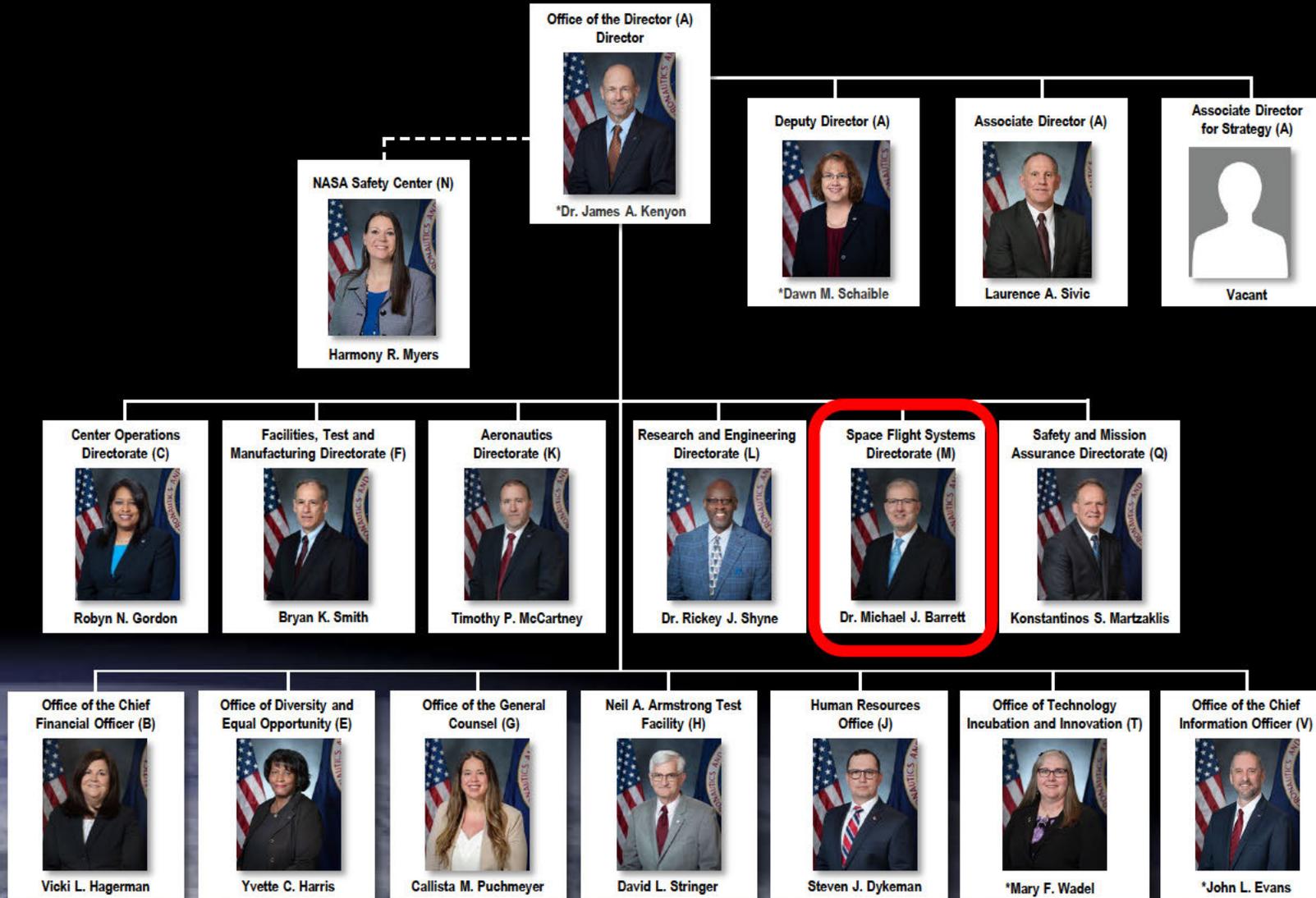
Responsible for managing all GRC space flight development and space technology project work

- A program/project management organization consisting of 92 civil servants
- A GRC space portfolio span of 540 civil servants and 360 contractors

Host organization for NASA's Radioisotope Power Systems (RPS) Program and Agency Spectrum Management

Customers include NASA's Science, Space Technology, Exploration Systems Development, and Space Operations mission directorates

# NASA Glenn Research Center Senior Management



\*Acting



# Space Operations

## International Space Station (ISS)

- Operate ISS Microgravity Experiments

- Payload operations on the ISS
- Fluids Integrated Rack (FIR) and the Combustion Integrated Rack (CIR) sustaining engineering and operations
- Telescience Support Center (TSC) operations
- Acceleration measurement systems

- Human Research Program

- Human health/exercise countermeasures
- Exploration medical capability
- Computational modeling
- Biomedical Devices

- ISS Electrical Power System

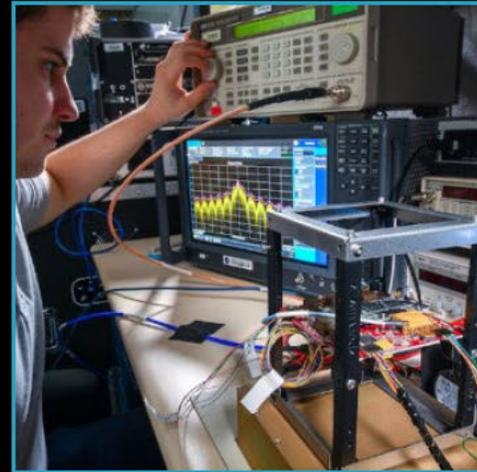
- Sustaining engineering and analysis
- Lithium-ion battery development/deployment
- Solar Array Electrical Simulator



# Space Operations

## Space Communications

- Advanced Communications Technology
  - Quantum communication and encryption
  - **Cognitive communications**
  - **Wideband RF Terminals**
  - Beamforming antennas for small satellites
  - Beaconless pointing

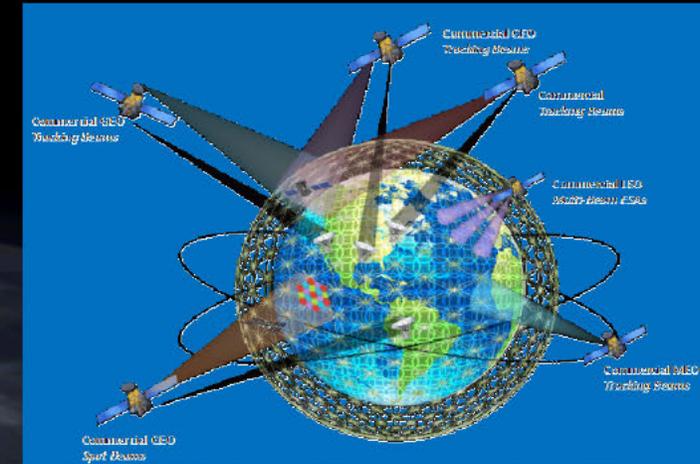


International Telecommunication Union

- Spectrum Management and Spectrum Analysis

- Communication Services Project

- **Demonstrate feasibility of commercially-provided satellite communications (SATCOM) capabilities**
- Acquire future commercial SATCOM services
- Phase out reliance on NASA-owned and operated systems



Notional Commercial SATCOM Architecture

# Space Science

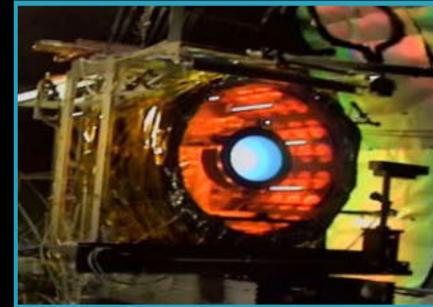
## Radioisotope Power Systems (RPS)

- RPS Program Management
- Dynamic Power Conversion Technology
- Next Generation Radioisotope Thermoelectric Generator



## Planetary Science

- NASA Evolutionary Xenon Thruster – Commercial (NEXT-C) for DART and future science missions
- Spring Tires – Shape Memory Alloy wheels for lunar and Mars rovers
- Systems, materials, and instruments for extreme high temperature/pressure planetary environments
- Extreme environment testing facilities
  - Glenn Extreme Environments Rig (GEER)
    - World-class capability to simulate harsh environments, such as Venus



# Space Science

## Biological & Physical Sciences

- Manage the three main Physical Science areas of: *Combustion, Fluid Physics, and Soft Matter Dynamics*
- Gaseous fuel combustion investigations
- Solid Fuel Ignition and Extinction (SoFIE) experiment development
- Flow Boiling and Condensation Experiment (FBCE) series of developments
- Develop Zero Boiloff test experiment
- Ground and Drop Tower research



CIR On-orbit operations with the ACME insert



FIR On-Orbit operations with the LMM



Advanced Colloids Experiment installation



FBCE in FIR GIU testing

## Earth Science

- Airborne hyperspectral monitoring of harmful algal blooms



Lake Erie

# Human Exploration

## Orion Multi-Purpose Crew Vehicle (MPCV)

- Lead European Service Module (ESM) integration
- Conducted Orion/ESM testing at GRC-ATF
- Support Vehicle Integration & Production Operations

## Space Launch System (SLS)

- Lead Universal Stage Adapter (USA)
- Lead fairing development studies for the cargo version of SLS

## Human Landing System (HLS)

- Support selected contractor (SpaceX)

## Commercial Crew/Cargo

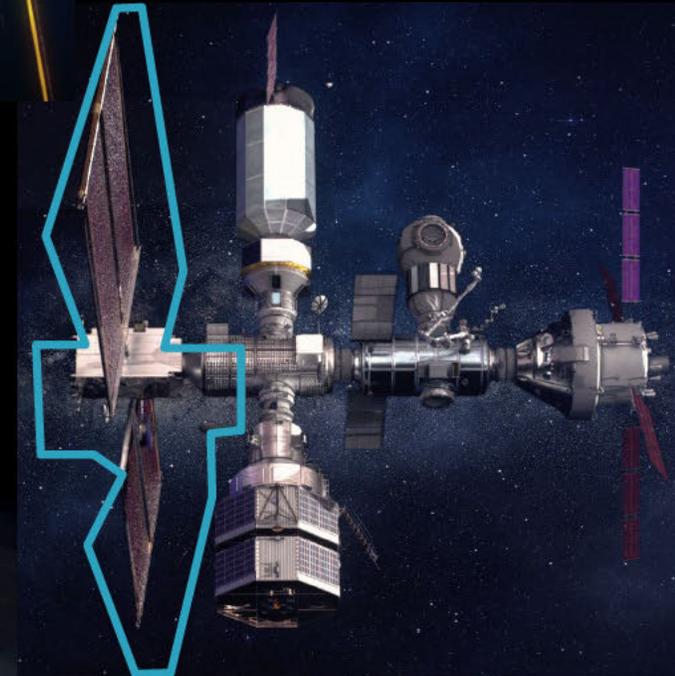
- Reimbursable Space Act Agreements for engineering support and testing



# Human Exploration (cont.)

## Gateway Power & Propulsion Element

- Glenn leads the joint public-private partnership for the demonstration of the **Power and Propulsion Element (PPE)**—to be launched with the Gateway Habitation and Logistics Outpost (HALO).
- Maxar is NASA's commercial partner for the development and demonstration of the PPE.
- PPE demonstration will validate 50-kW-class spacecraft capabilities in power, propulsion, and communication systems applicable to NASA's exploration needs and developing commercial markets.
- PPE uses solar electric propulsion (SEP) technology for orbit control and transfer. SEP flight thrusters provided by Aerojet.
- Glenn is leading the development of high performance SEP capability for exploration missions, such as Artemis.

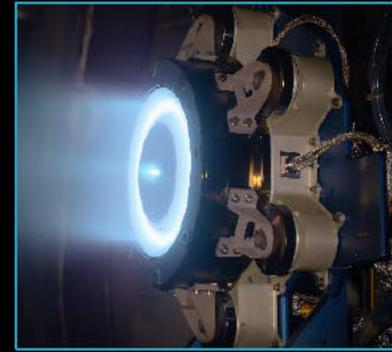


# Space Technology



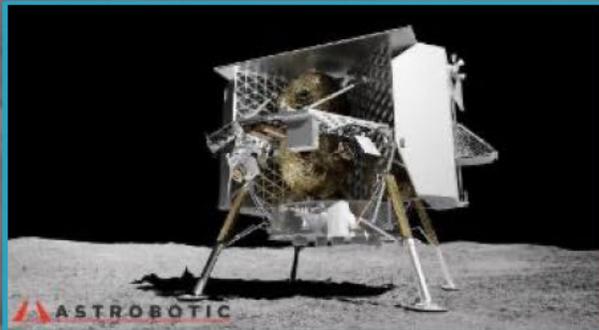
## Integrated Electric Power Production and Distribution

- 40 kW fission surface power demonstration
- Energy storage and conversion (fuel cells, solar, batteries)
- Advanced modular power management and distribution systems



## Cryogenic Fluids Storage and Transfer

- Acquisition and transfer of fluids under reduced gravity
- Long duration storage and thermal management for Lunar and Mars missions
- Propellant liquefaction for lander cryogenic propulsion systems



## Payloads for Commercial Lunar Landers



## Electric Propulsion

- Solar Electric Propulsion for PPE
- Space nuclear electric propulsion and thermal propulsion to enable Mars transport for human exploration and extend capabilities for science missions

## In-Situ Resource Utilization: “Living off the Land”

- Regolith properties and handling
- Scalable ISRU production/utilization capabilities including sustainable commodities on planetary surfaces

## Surface technologies: Landers, Rovers, and Habitats

- Lunar dust mitigation
- Development of innovative wheels for rovers
- Materials development supporting new lander propulsion systems

## Advanced Communications Systems and Architectures

# Past SpaceDOC Developments & Operations



ZBOT



Saffire



CFE



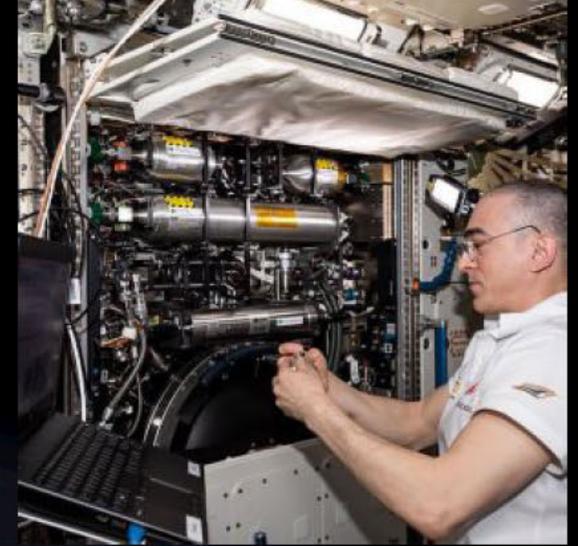
SCAN Testbed Ops



Exercise Countermeasures



FIR Ops



CIR Ops



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview**

**Erica Chambers**

# SpaceDOC III DRFP Executive Summary



**Title: Space Flight Systems Development and Operations Contract III (SpaceDOC III)**

**Background: NASA Glenn Research Center (GRC) implements several space-related programs within the Space Flight Systems Directorate (SFSD). GRC has space flight development responsibilities that include**

- Space Launch System (SLS) program
- Orion service module
- Gateway
- Numerous microgravity research investigations on International Space Station (ISS) and launch vehicles
- ISS power system
- Electric propulsion systems
- Human research projects
- Space flight technology developments and demonstrations of advanced power, propulsion, communications and other systems, and the potential for space science instrumentation packages.

**In addition, NASA works with other government agencies and organizations to develop technologies and space flight hardware and software.**

# SpaceDOC III DRFP Executive Summary



**Description of Effort:** Perform definition, design, development, analysis, fabrication, assembly, test, verification, delivery, and/or operation of space flight systems, associated support systems and equipment, and related ground development activities, that include research and technology developments and demonstrations.

**Contract Type:** Cost Plus Fixed Fee (CPFF) Core and CPFF and Firm-Fixed Price (FFP) IDIQ

**Place of Performance:** Contractor's site and NASA facilities. There is required work at NASA GRC and potential work (if requested by Offeror to utilize IAGP)

**Type of Competition:**

- Competitive Procurement per FAR Part 15 – *Contracting by Negotiation*
- Small Business Set-Aside



# Contract Structure

CLIN	CLIN Name	Description	Fund Type
0001	Phase-In	Up to 3-month PoP to allow successful Offeror to develop workforce, work with incumbent to transfer knowledge and property, and propose on active orders.	FFP
0002 0005 0008 0011	Project Management Office (PMO)	All resources directly charged to support the activities associated with managing the overall contract.	CPFF
0003 0006 0009 0012	Sustaining Engineering/Mission Integration & Operations	Orders that support mission integration & operations and sustaining engineering of payloads and facilities.	CPFF
0004 0007 0010 0013	Concept, Design and Hardware Development	Orders that support studies, modelling & simulations, and technology, hardware and software development of flight and ground systems.	CPFF
0014	IDIQ	For FFP Build to Print delivery orders and CPFF delivery orders that do not fit in the other CLINs	CPFF/FFP

Note: CLINs shown represent Base, Options 1 & 2 and Option to Extend 6 Months  
*Space Flight Systems Development and Operations Contract III (SpaceDOC III)*



# Intended Period of Performance

<b>Contract Period</b>	<b>Date Range</b>
<b><u>Phase-In</u></b>	September 1, 2023 – November 30, 2023
<b><u>Core &amp; IDIQ</u></b>	
Base Period	December 1, 2023 – November 30, 2026
Option 1	December 1, 2026 – November 30, 2028
Option 2	December 1, 2028 – November 30, 2030
6-Month Extension	December 1, 2030 – May 31, 2031



# Approach To Options

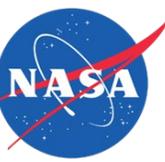
- **All options including price will be evaluated as part of proposal evaluation for award purposes consistent with the instructions and information set forth in this RFP.**
- **NASA will determine whether to exercise any options, if in the best interest of the Government, in accordance with FAR 52.217-9, Option to Extend the Term of the Contract.**
- **NASA may also exercise the 6-month optional extension of the period of performance of the contract in accordance with FAR 52.217-8 Option To Extend Services.**

# Contract Administration



- **Contract administration will be performed by GRC**
  - Contracting Officer (CO), and Contracting Officer Representative (COR) / Alternate COR responsibilities are assigned to GRC
- **Technical Delegations**
  - Surveillance responsibility will be delegated by the CO to the COR and Alternate COR
  - Additional surveillance responsibilities may be delegated as needed
- **Orders**
  - The CO will issue Delivery Orders in accordance with the procedures specified in NFS 1852.216-80, Task Ordering Procedure.

# NAICS Code and System for Award Management



- **NAICS - North American Industry Classification System**
- **SpaceDOC III procurement NAICS code: 541715, Engineering Research and Development sector (except for nanotechnology and biotechnology)**
- **Size Standard – 1,000 employees**
- **If not already registered, Offerors should register for this NAICS code in the System for Award Management (SAM) website at [SAM.gov](https://sam.gov)**
- **SAM is free, Government-run, and any potential contract awardee must be registered in SAM. Offerors must sign up for Unique Entity ID (replaces DUNS number).**

# Small Business Information



- **Based on Market Research, NASA has determined that a small business set aside is the most appropriate means of conducting the SpaceDOC III acquisition**
- **The successful Offeror must abide by the terms outlined under FAR 52.219-14 Limitations on Subcontracting**
- **Offerors must represent themselves as a small business concern under NAICS code 541715 in order to be considered for award under this acquisition**
- **Offerors can confirm their eligibility as a small business concern by reviewing the qualifications under FAR 52.219-8, Utilization of Small Business Concerns**

# DRFP Summary of Contents



#	Draft Name
1	DRFP Cover Letter
2	DRFP
3	Attachment J.1-A – Statement Of Work
4	Attachment J.1-B – Contract Data Requirements List
5	Attachment J.1-C – Government Furnished Property (GFP) List
6	Attachment J.1-D – Installation-Accountable Government Property (IAGP) List
7	Attachment J.1-E – Surveillance Plan
8	Attachment J.1-J – IT Security Applicable Documents List
9	Attachment J.1-L – NF 533M (Monthly Contractor Financial Management Report)
10	Attachment J.1-M – NF 533Q (Quarterly Contractor Financial Management Report)

#	Draft Name
11	Attachment J.2-A – Representative Orders, Attachments J.2-A-1, J.2-A-2, J.2-A-3, and J.2-A-4
12	Attachment J.2-B – Past Performance Questionnaire
13	Attachment J.2-D – Cost/Price Forms
14	Attachment J.2-E – SpaceDOC II Historical Statements of Work - Orders
15	Attachment J.2-F – Labor Categories and Descriptions
16	Attachment J.2-G – Instructions for Industry Day Registration
17	Attachment J.2-H – SpaceDOC III External Communication Plan



# Miscellaneous Acquisition Considerations

- **Proposal Limitations – If your organization (or first tier subcontractors) has one or more contracts with NASA, we suggest that your organization check those contracts for any clauses that may impact your organization’s ability to propose to the SpaceDOC III RFP.**
  - For example, NASA FAR Supplement clause 1852.209-71 Limitation of Future Contracting.
- **Offerors will be required to submit an OCI Plan and Assessment with their proposals.**
  - Detailed information on OCI submissions can be found in RFP section L.33 under Notice of Potential Organizational Conflicts of Interest.
  - OCI-related clauses include NFS 1852.209-71 Limitation of Future Contracting, 1852.237-73 Release of Sensitive Information, and 1852.237-72 Access to Sensitive Information
  - The OCI Plan will not be evaluated as part of the Mission Suitability Factor. It will be considered in determining the contractor’s responsibility to perform this contract
- **Offerors will be required to submit a Total Compensation Plan as described in FAR 52.222-46 Evaluation of Compensation for Professional Employees and NFS 1852.231-71 Determination of Compensation Reasonableness**



# Summary of Proposal Content

Volume	Title	Page Limit**
<b>I</b>	Mission Suitability	100
I-a	SpaceDOC III Management Plan (PM-01)	25 (Not included in 100)
I-b	Evidence of Teaming Agreements	No Limit (Not included in 100)
I-c	Safety and Health Plan	20 (Not included in 100)
I-d	Key Personnel Resumes and/or Position Descriptions	10 (Not included in 100)
I-e	Property Management Plan	10 (Not included in 100)
I-f	Organizational Conflict of Interest (OCI) Plan	No Limit (Not included in 100)
I-g	Technical Summary	300 words (Not included in 100)
I-h	Total Compensation Plan*	No Limit (Not included in 100)
<b>II</b>	Cost/Price	No Limit
<b>III</b>	Relevant Experience and Past Performance	20
<b>IV</b>	Signed Model Contract, SF33, and Section K Certifications	No Limit

\*Subcontractors are allowed to submit their Total Compensation Plan directly to the Government.

\*\*Prime Offeror and all Major Subcontractor (page limitation is for the total component (Prime and Major Subcontractor)).



# Model Contract

- **The Offeror shall submit a signed model contract including the SF 33 with completed required Offeror fill-in (OFI) sections.**
  - See Section L.38 Instructions For Volume IV – Completed Model Contract, and Signed SF 33s of RFP for instructions
- **Offerors are on notice that failure to provide a completed and appropriately signed Standard Form 33 may render an Offeror's entire proposal initially unacceptable**
- **Include a statement of acceptance of the anticipated contract provisions and proposed contract schedule, or list all specific exceptions to the terms, conditions, and requirements of Sections A through J of this solicitation, to the Representations, Certifications, and Other Statements of Offerors or Respondents (Section K) or to the information requested in Section L.**
  - Include the reason for the exception, new terms, conditions, and/or clauses, including any proposed benefit to the Government. This list must include all exception(s), deviation(s) and/or conditional assumptions taken.
  - Offerors are cautioned that exceptions or new terms, conditions, or clauses may result in a determination of proposal unacceptability (NFS 1815.305-70), may preclude award to an Offeror if award is made without discussions, or may otherwise affect an Offeror's competitive standing.



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview S&MA Approach**

**Sean Beckman**



# SMA Approach

## Safety and Health Plan

- Corporate level version of DID# PA-11, Safety and Health Plan, is due with proposal
  - Shall outline an Offeror's safety and health procedures, e.g., mishap reporting, occupational safety, training, periodic inspections/certifications, etc. for both Offeror and subcontractors
- The site-specific version is not due until after award

## Surveillance Plan

- Government can perform Insight, Oversight, and/or Hybrid surveillance
- Audits (Surveillance Plan, End Product, In-Process, SWA Functional Audit, SWA Physical Audit, SWA In-Process)
- Contract-level and Order-specific
  - Contract-level: Enterprise processes (QMS, risk management, training, ESD, etc.)
  - Order-specific: Determined by GRC Project Manager (Non-conformance reports, hardware inspections, etc.)
- Government reserves the right to delegate certain surveillance activities to the Defense Contract Management Agency (DCMA)

## ISO Certification Approach

- The contractor shall be certified to SAE AS9100, in the process of becoming certified or, as a minimum, have an established proven effective quality program that is in accordance with FAR 52.246-11 Higher-level Contract Quality Requirement.
  - For work deemed critical and complex the Offeror shall have a Quality Management System in compliance with SAE AS9100.



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview Contract Data Requirements List (CDRL)**

**Francine McWhorter**

# Contract Data Requirements List (CDRL)



CDRL is the basic contractual document, which governs data required by and for the contract.

- **Goals in developing the Data Item Description (DID)s**

- Develop a standard, uniform format for common contract deliverables that can be used across all base and delivery orders
- Ensure that all data be prepared, maintained, and delivered to NASA in accordance with the requirements of this document.
- Establish deliverable due date(s) for required DID's
- Establish data item approval codes:
  - **Code NDA** (NASA Document with NASA Approval)
  - **Code A** (Approval)
  - **Code I** (Information)
  - **Code S** (Surveillance)

*\* Definitions of these codes are listed on page 3 of the CDRL, Attachment J.1-B*

CONTRACT DATA REQUIREMENTS LIST		
DID #	Title	Submission
	*	NDA/A/I/S
CONTRACTUAL DATA		
CD-01	CONTRACTOR FINANCIAL MANAGEMENT REPORTING	A
CD-02	TECHNICAL REPORTING AND MANAGEMENT REVIEWS	I
CD-03	INFORMATION TECHNOLOGY SYSTEM SECURITY PLAN	A
CD-04	INFORMATION TECHNOLOGY SECURITY MANAGEMENT PLAN	A



# Contract Data Requirements List

- **DID Content**

- Title
- DID Number – Identifies the area of concentration and its number
- Reference – Refers to a standard or a guidance document, if applicable
- Purpose – States the intents of the DID
- Related Documents – Refers to other data deliverables that will most likely have supporting information that should be referenced with minimal duplication of information
- Preparation Instructions – Identify some of the DIDs that mandate a format and standard to be used and identifies deliverables due dates

- ❖ **Contract Level Documents are identified in UPPER CASE lettering**

*These documents are required to be delivered as part of the proposal and/or shortly after contract award*



# DIDs Due With Proposal

- **3 DIDs are required to be submitted with the proposal.**

DID	Version To Be Delivered with Proposal
PM-01 SPACEDOC III MANAGEMENT PLAN	Draft due with proposal
PM-11 ORGANIZATIONAL CONFLICTS OF INTEREST (OCI) PLAN	Final due with proposal
PA-11 SAFETY AND HEALTH PLAN	Final due with proposal at the corporate level

❖ All dates are referenced as calendar days



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview Statement of Work (SOW)**

**Bob Corban**

# Project Management Organization (PMO)



- **PMO topics consist of management and other functions required for the execution of the overall contract**
  - PMO contains planning activities while the execution of the plans is performed at the order level
- **PMO topics are covered in sections 4.1 and 4.2**
- **PMO activity will be bookkept under CLINs 0002, 0005, 0008, and 0011**

# Applicable & Reference Documents



- **Applicable and Reference Documents are covered in Section 3**
  - Applicable documents contain requirements that apply to all work performed under the SOW
  - Reference documents are considered useful as background information but do not constitute requirements
- **Applicable document list generated from NASA Office of Chief Engineer (OCE) list of endorsed standards**
  - The contractor may propose alternatives to these standards if use of alternatives can lead to a better or less costly product that satisfies requirements and regulations.
  - Tailoring may be requested via the GRC waiver process
  - The contractor shall, as needed, prepare and/or utilize other applicable documents, not explicitly called out herein, to produce, test, analyze and deploy flight and ground hardware and software that meets the requirements.

# Space Flight - NPR 7120.5



- **The SOW addresses all phases of the NASA Project lifecycle as it pertains to flight development efforts (CLINs 0003, 0004, 0006, 0007, 0009, 0010, 0012, 0013, 0014)**

Phase	Name	SOW Section
Pre-Phase A	Concept Studies	4.3
Phase A	Concept & Technology Development	4.4
Phase B	Preliminary Design & Technology Completion	4.5
Phase C	Final Design & Fabrication	4.6
Phase D	System Assembly, Integration & Test, Launch & Checkout	4.7
Phase E	Operations & Sustainment	4.8
Phase F	Closeout	4.9

- **Each Phase in the SOW describes Key Activities, Reviews and the Documentation & Deliverables**
  - SOW phase overview is not considered to be an exhaustive description. NPR's 7120.5 and 7123.1 cover the full scope of each phase
  - The Key Activities, Reviews and the Documentation & Deliverables of each phase may be tailored in the Base/Delivery Order

# Research and Technology - NPR 7120.8



- **The SOW also addresses the phases of Research and Technology projects (CLINs 0003, 0004, 0006, 0007, 0009, 0010, 0012, 0013, 0014)**
  - Technology Development and Demonstrations are intended to be used for conceptual studies, technology maturation, and low-cost/high risk flight and ground efforts
- **Phases:**
  - Formulation (SOW 4.10.1)
  - Implementation (SOW 4.10.2)
- **Each Phase in the SOW describes Key Activities, Reviews and the Documentation & Deliverables**
  - SOW phase overview is not considered to be an exhaustive description. NPR 7120.8 and 7123.1 covers the full scope of each phase
  - The Key Activities, Reviews and the Documentation & Deliverables of each phase may be tailored in the Base/Delivery Order

# Glenn Contract Work Control System



- **Glenn Contract Work Control System (GCWCS) is the NASA-provided system for managing and tracking NASA issued work**
- **Database web application to be used for:**
  - NASA to submit Base/Delivery Order requests and modification requests
  - Contractor to submit Work Plan in response to Base/Delivery Order and modification requests
  - Contractor to submit monthly technical reports for all active orders
  - NASA and Contractor to approve contract documentation
- **Overview and description provided in the SOW (Section 4.11 and Appendix A)**



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview Representative Base Orders**

**David Frate**



# Representative Base Orders

- **DRFP Attachment J.1-A contains 4 Representative Base Orders that will be used to solicit proposal information used only for the Mission Suitability Factor Evaluation. They are not used for the Cost/Price Factor.**
  - These Base Orders are purely hypothetical. They are not current SpaceDOC II tasks, nor are they expected to be awarded as part of SpaceDOC III
  - They are for illustrative purposes to evaluate the Offeror's approach to implementation of some of the types of Base Orders that could be in Sustainment Engineering Mission Integration & Operations (MI&O), Concept, Design and Hardware Development, or IDIQ.
    - J.1-A Concept/Design Development, J.1-B Hardware/Software Development, J.1-C Mission Integration and Operations, and J.1-D Build to Print (IDIQ)
  - They are to be used by the Offeror as part of Subfactor 1 - Understanding Technical Requirements, specifically UR1 – Representative Base Orders
  - Under UR1 there are a list of topics for each Representative Base Order that Offerors will address to provide NASA insight into their understanding and implementation of the tasks.
- **Attachment J.2-E provides all historical SpaceDOC II SOWs for reference only and to give all Offerors knowledge of the past orders. Includes indication of which ones are expected to be active at award of SpaceDOC III contract.**



**Space Flight Systems Development and Operations  
Contract III RFP 80GRC018R0005  
Industry Day**

**February 8, 2023**

**SpaceDOC III Draft RFP Overview  
Evaluation Factors  
Mission Suitability Evaluation Factor**

**David Frate**



# Evaluation Factors

- **Proposal evaluation will follow FAR 15.3 and NFS 1815.3 and utilize the following Evaluation Factors:**
  - 1) Mission Suitability
  - 2) Cost/Price
  - 3) Relevant Experience and Past Performance
- **Relative Weights of Evaluation Factors**

As individual factors, the Mission Suitability Factor is more important than the Cost/Price Factor, which is more important than the Relevant Experience and Past Performance Factor. When combined, Mission Suitability and Relevant Experience and Past Performance are significantly more important than the Cost/Price Factor alone.



# Evaluation Factors

- **The RFP sections noted below describe the required proposal content related to each Evaluation Factor and how each Evaluation Factor will be evaluated**

Evaluation Factor	RFP Section Defining Required Proposal Content	RFP Section Defining How Evaluation Factors will be Evaluated
Mission Suitability	L.35	M.5
Cost/Price	L.36	M.6
Relevant Experience and Past Performance	L.37	M.7

# Evaluation Factors – Mission Suitability



**Mission Suitability is divided into 3 Subfactors**

## **MISSION SUITABILITY SUBFACTORS**

**Subfactor 1 - Understanding Technical Requirements**

**UR1 Representative Base Orders**

**UR2 Coordination between Government, Contractor, and PIs**

**UR3 Understanding the Approach to Meeting the Technical and Engineering Requirements**

**Subfactor 2 - Product Assurance**

**PA1 Safety, Health, and Environmental Management**

**PA2 Product Assurance**

**Subfactor 3 - Management Plan and Approach**

**MP1 Phase-In Plan**

**MP2 Organizational Structure and Relationships**

**MP3 Project Management**

**MP4 Property Management**

**MP5 Staffing, Recruitment, Retention, and Compensation**

**MP6 Off-site Facilities and On-site Staffing Support**

**MP7 Risk Management**

# Factor 1 – Mission Suitability



<b>Subfactor 1 - Understanding Technical Requirements</b>	<b>Evaluation Criteria</b>
<b>UR1 Representative Base Orders</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the effectiveness, comprehensiveness, reasonableness, understanding, adequacy, and benefits of their responses to the topics listed in Section L.35 for each Base Order under UR1 Representative Base Orders.</li></ul>
<b>UR2 Coordination between Government, Contractor, and PIs</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the effectiveness and timeliness of how interactions between the hardware development teams, the GRC BO/DO Managers and/or Project Scientists will be facilitated during hardware concept definition, development, and testing to ensure the Principal Investigator's (PI's) science or other customer requirements are satisfied.</li><li>- The Offeror will be evaluated on the adequacy and effectiveness of the process for providing customer (e.g., PI and science team or other customers) access and use of the hardware and/or software early in the development cycle as well as in the latter stages of hardware development.</li></ul>

# Factor 1 – Mission Suitability



Subfactor 1 - Understanding Technical Requirements	Evaluation Criteria
<b>UR3</b> <b>Understanding the Approach to Meeting the Technical and Engineering Requirements</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on their adequacy, appropriateness, effectiveness, and completeness of their approach to incorporate system requirements and system engineering in all aspects of space flight systems development from concept definition through operations.</li><li>- The Offeror will be evaluated on their adequacy, appropriateness, effectiveness, and completeness of the approach for determining the appropriate level of documentation required for various development efforts.</li><li>- The Offeror will be evaluated on the adequacy, effectiveness, and completeness of the information provided on the role of reviews and documentation, and their approach to implementing these items on the contract, including the approach for tracking and resolving issues that are identified at reviews.</li><li>- The Offeror will be evaluated on the appropriateness, effectiveness, and completeness of the process for reviewing and approving engineering documents such as schematics, drawings, calculations/analyses.</li><li>- The Offeror will be evaluated on their adequacy, effectiveness, and completeness of their approach for risk mitigation during flight hardware and software development by utilizing ground-based systems including the timeframe when the hardware is to be utilized and the fidelity and purpose of each unit.</li><li>- The Offeror will be evaluated on the effectiveness, timeliness, and thoroughness of the process for identifying and correcting design flaws, system performance deficiencies, fabrication deficiencies, and other technical problems.</li><li>- The Offeror will be evaluated based on their understanding of the challenges and effectiveness of their approach to integration requirements associated with various commercial launch vehicles and space platforms.</li><li>- The Offeror will be evaluated on the thoroughness and benefit to the Government on their approach to identify and propose alternates to the design and construction standards listed in the SOW to the Government for approval.</li></ul>

# Factor 1 – Mission Suitability



Subfactor 2 - Product Assurance	Evaluation Criteria
<b>PA1 Safety, Health, and Environmental Management</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the appropriateness and completeness of the Safety and Health Plan for all contract and subcontracted activities.</li></ul>
<b>PA2 Product Assurance</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on their knowledge, understanding, effectiveness and completeness of their Product Assurance support to programs and projects including their experience and knowledge in preparing and implementing a Safety and Mission Assurance Plan (SMAP).</li><li>- The Offeror will be evaluated on their knowledge, understanding, effectiveness and completeness of their Quality Assurance program including their AS 9100 certification status, their Problem Reporting And Corrective Action (PRACA) system, and their approach to qualifying suppliers.</li><li>- The Offeror will be evaluated on their knowledge, understanding, effectiveness and completeness of their approach to implement the requirements for flight system safety and ground safety operations.</li><li>- The Offeror will be evaluated on their knowledge, understanding, effectiveness, reasonableness, and completeness of how they assure that all space flight materials used meet all relevant safety requirements and can be flight certified by NASA.</li><li>- The Offeror will be evaluated on their knowledge, understanding, effectiveness and completeness of their reliability, availability, and maintainability engineering program, their Electrical, Electronic, and Electromagnetic (EEE) Parts program, and how they use their Failure Modes and Effect Analysis (FMEA) to increase the effectiveness of the EEE Parts procurements.</li><li>- The Offeror will be evaluated on their knowledge, understanding, effectiveness and completeness of their process for performing software assurance for all flight-related software/firmware (including that used for ground support or mission operations).</li><li>- The Offeror will be evaluated on the timeliness, appropriateness, and thoroughness of their process for qualifying suppliers and selecting or using suppliers who may not yet be qualified.</li></ul>



# Factor 1 – Mission Suitability

Subfactor 3 - Management Plan and Approach	Evaluation Criteria
<b>MP1 Phase-In Plan</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on their reasonableness, thoroughness, and efficiency of the approach to assume full contract responsibility 3 months after contract award including a "transition schedule" that identifies the timeframe and sequence for all proposed contract transition activities and milestones.</li><li>- The Offeror will be evaluated on their reasonableness, suitability, and understanding of their management, staffing, and responsibilities of the phase-in team and differences in roles and responsibilities between the permanent staff and any temporary, phase-in staff: should any exist.</li><li>- The Offeror will be evaluated on the effectiveness, benefits, and adequacy of their plans for establishing the workforce, including any plans for hiring employees of the incumbent contractor.</li><li>- The Offeror will be evaluated on the reasonableness, adequacy, and effectiveness of their plan to acquire technical understanding of the present work, transition those current activities, and minimize any disruption to on-going work. Describe transition activities needed from the incumbent (ZIN Technologies) to the Offeror required to facilitate the handover of the existing orders.</li><li>- The Offeror will be evaluated on the appropriateness and adequacy of their training or orientation of personnel that will occur during phase-in.</li><li>- The Offeror will be evaluated on the reasonableness, effectiveness, and efficiency of their plan to take ownership of the GFP in Attachment J.1-C and the justification if the Offeror does not intent to use some or all of the GFP.</li></ul>



# Factor 1 – Mission Suitability

Subfactor 3 - Management Plan and Approach	Evaluation Criteria
<b>MP2</b> <b>Organizational Structure and Relationships</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the appropriateness, reasonableness, and completeness of their organizational chart and a narrative description of the organization (down to the major discipline level, including percentage of work that the Offeror expects to obtain through joint ventures, teaming, major and minor subcontracting, or consulting agreements) to perform the contracted effort.</li><li>- The Offeror will be evaluated on the reasonableness, adequacy, and suitability of their identification of the key positions (including Major Subcontractors, Teaming Partners, or Joint Venturers) that must be staffed with highly qualified people (key personnel) for the proposed organizational structure to meet the contract and overall order requirements</li><li>- The Offeror will be evaluated on the appropriateness and relevancy of the resumes and/or position descriptions for up to ten key personnel or key positions in the proposed organization structure.</li><li>- The Offeror will be evaluated on the effectiveness and reasonableness of their plans for interfacing and communicating with the Government's technical representatives at both the overall contract and project/order levels.</li><li>- The Offeror will be evaluated on the effectiveness and suitability of their approach to provide for appropriate communication to foster win-win approaches to resolving cost, schedule, and/or technical issues with the Government.</li><li>- The Offeror will be evaluated on the availability of their letters of intent or evidence of teaming agreements with the Major Subcontractors and the appropriateness, credibility, and relevancy of the Major and Minor Subcontractor's significant areas of responsibility and their ability to perform the work.</li></ul>



# Factor 1 – Mission Suitability

Subfactor 3 - Management Plan and Approach	Evaluation Criteria
<b>MP3 Project Management</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the reasonableness, effectiveness, and completeness of their SpaceDOC III Management Plan.</li><li>- The Offeror will be evaluated on the reasonableness, realism, and suitability of their content that will be under the Project Management Organization (PMO) CLIN, how it will be organized, the skills required, and the approach for determining the size of the workforce in PMO.</li><li>- The Offeror will be evaluated on the reasonableness, effectiveness, and thoroughness of the approach to developing cost plans and what processes would be used to forecast cost, track cost, identify cost growth, and what methods would be used to control and report cost and mitigate cost growth.</li><li>- The Offeror will be evaluated on the efficiency, effectiveness, and adequacy of the purchasing and accounting systems and processes that enable accurate cost reporting, tracking, and controls, with emphasis on compliance with NASA's cost-reporting requirements (as stated in DID# CD-01) and adherence to the proposed cost estimates.</li><li>- The Offeror will be evaluated on the reasonableness, effectiveness, and adequacy of how schedule tasks, milestones and critical paths would be developed and how performance would be tracked and managed to stay on schedule.</li><li>- The Offeror will be evaluated on the reasonableness, effectiveness, and adequacy of the tools and processes used to develop schedules and assure that overall Base Order/Delivery Order performance adheres to the baselined schedule.</li><li>- The Offeror will be evaluated on the effectiveness, appropriateness and thoroughness of the activities, requirements, guidelines, and documentation for configuration management, including government access to contractor's CM system. This shall include identification of the product at various points in time, the control of changes to configuration of the product, maintenance of the integrity and traceability of the product and preservation of the records of the product.</li></ul>



# Factor 1 – Mission Suitability

<b>Subfactor 3 - Management Plan and Approach</b>	<b>Evaluation Criteria</b>
<b>MP4 Property Management</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on their adequacy, effectiveness and completeness of the information provided in the Offeror’s Property Management Plan as it relates to FAR 52-245-1, Government Property (Sep 2021), and the contract property clauses in the model contract as related to Government property.</li></ul>
<b>MP5 Staffing, Recruitment, Retention, and Compensation</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the appropriateness, adequacy, and effectiveness of their plan for staffing levels, skill mix, sources of personnel, recruitment of employees (short and long term), training, mentoring, and career development including identifying any skills and competencies that may be in short supply or are critical and provide an approach to recruit and retain employees in these categories.</li><li>- The Offeror will be evaluated on the reasonableness, effectiveness, and adequacy of their methods for ensuring staffing flexibility and the strategy for dealing with workforce fluctuations, including (a) the accessible resources to support a surge in staffing requirements, (b) the necessary decrease in staffing due to project cancellation, technical de-scope, and/or a relaxation in schedule throughout the life of the contract, and (c) the decision process used to make adjustments to workforce due to changes in Base Order/Delivery Order priorities. This evaluation will also include the procedure for obtaining these resources, category of resources, the lead-time involved, and the corporate commitment to providing these resources as well as the procedures for staff decreases and retention of key skills and capabilities.</li><li>- The Offeror will be evaluated on the viability and reasonableness of their approach for staff motivation and retention including the past effectiveness of similar programs, or, in the absence of similar programs, the rationale for the likely effectiveness of the proposed approach.</li><li>- The Offeror will be evaluated on the appropriateness, credibility and effectiveness of their personnel cost savings strategy, recognizing the need to adjust the workforce skill mix to meet changing requirements, without sacrificing quality of performance.</li><li>- The Offeror will be evaluated on the realism and completeness of their total compensation plan that addresses the requirements of FAR 52.222-46, Evaluation of Compensation for Professional Employees and NFS 1852.231-71, Determination of Compensation Reasonableness.</li></ul>



# Factor 1 – Mission Suitability

Subfactor 3 - Management Plan and Approach	Evaluation Criteria
<b>MP6 Off-site Facilities and On-site Staffing Support</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the adequacy, availability, and benefits of their office and any satellite office facilities at the primary work site including overall capacity (square feet), areas dedicated for conference rooms and staff, geographic location, physical security, age and condition, communication and data links, video conferencing capability, capacity to accommodate staffing increases, and whether the facility is owned or leased and currently operational.</li><li>- The Offeror will be evaluated on the adequacy, availability, and benefits of their manufacturing and fabrication facilities in terms of capacity (square feet), physical security, equipment, machines, availability, geographic location and options considered, age and condition, capabilities, and whether the facility is owned or leased and currently operational.</li><li>- The Offeror will be evaluated on the adequacy, availability, and benefits of their assembly, test and laboratory facilities in terms of capacity (square feet), availability, geographic location, physical security, age and condition, capabilities, whether the facility is owned or leased and currently operational. The Offeror will be evaluated on the reasonableness and appropriateness of their approach to utilizing any government furnished assembly, test and laboratory facilities that would be needed to satisfy contract requirements.</li><li>- The Offeror will be evaluated on the adequacy, credibility, risk and benefits of their NASA GRC on-site and Contractor off-site facility and staffing approach and overall support for GRC integration, testing, and operation activities including their approach to accommodate on-site support at NASA GRC in the utilization of testing equipment, ground integration units, TSC sustaining and operations support, and shift on-console operations from the TSC, as well as the required on-site staffing at the TSC for 3 personnel for TSC sustainment and data analysis.</li></ul>



# Factor 1 – Mission Suitability

<b>Subfactor 3 - Management Plan and Approach</b>	<b>Evaluation Criteria</b>
<b>MP6 Off-site Facilities and On- site Staffing Support</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the effectiveness, completeness, benefits, credibility, and risks of their proposed approach to cost-effectively manage their workforce at both NASA GRC and Contractor off-site location(s). This shall include how the Offeror will be responsive to supporting interactions and meetings during the core working hours for the NASA GRC team (9:30AM – 2:30PM ET) and minimize cost of travel and shipping to and from NASA GRC.</li></ul>
<b>MP7 Risk Management</b>	<ul style="list-style-type: none"><li>- The Offeror will be evaluated on the effectiveness, reasonableness, and completeness of their continuous risk management process to identify, analyze, plan, track, and control the risks associated with hardware, software, and documentation as well as government access to the contractor’s risk management system.</li></ul>

# Evaluation Factors – Mission Suitability



- The following definitions will be used to classify the evaluation findings of each Mission Suitability Subfactor

	<b>DEFINITION (FAR 15.001 &amp; NASA Source Selection Guide)</b>
<b>Significant Strength</b>	<b>An aspect of the proposal that greatly enhances the potential for successful contract performance</b>
<b>Strength</b>	<b>An aspect of the proposal that will have some positive impact on the successful performance of the contract</b>
<b>Weakness</b>	<b>A flaw in the proposal that increases the risk of unsuccessful contract performance.</b>
<b>Significant Weakness</b>	<b>A flaw that appreciably increases the risk of unsuccessful contract performance</b>
<b>Deficiency</b>	<b>A material failure of a proposal to meet a Government requirement or a combination of significant weaknesses in a proposal that increases the risk of unsuccessful contract performance to an unacceptable level.</b>

# Evaluation Factors – Mission Suitability



- **Mission Suitability subfactors will be numerically scored in accordance with the following adjectival rating, definitions and percentile ranges**

<b>ADJECTIVAL RATING</b>	<b>DEFINITION</b>	<b>PERCENTILE RANGE</b>
<b>Excellent</b>	<b>A comprehensive and thorough proposal of exceptional merit with one or more significant strengths. No deficiency or significant weakness exists.</b>	<b>91-100</b>
<b>Very Good</b>	<b>A proposal having no deficiency and which demonstrates over-all competence. One or more significant strengths have been found, and strengths outbalance any weaknesses that exist.</b>	<b>71-90</b>
<b>Good</b>	<b>A proposal having no deficiency and which shows a reasonably sound response. There may be strengths or weaknesses, or both. As a whole, weaknesses not off-set by strengths do not significantly detract from the Offeror's response.</b>	<b>51-70</b>
<b>Fair</b>	<b>A proposal having no deficiency and which has one or more weaknesses. Weaknesses outbalance any strengths.</b>	<b>31-50</b>
<b>Poor</b>	<b>A proposal that has one or more deficiencies or significant weaknesses that demonstrate a lack of overall competence or would require a major proposal revision to correct.</b>	<b>0-30</b>

# Evaluation Factors – Mission Suitability



- The percentile value for each of the 3 mission suitability subfactors will be multiplied by the points below to determine the overall Mission Suitability score. The points below indicate the relative importance of each subfactor.

	Points
<b>Subfactor 1 – Understanding Technical Requirements</b>	<b>400</b>
<b>Subfactor 2 – Product Assurance</b>	<b>200</b>
<b>Subfactor 3 – Management Plan and Approach</b>	<b><u>400</u></b>
<b>Total</b>	<b>1000</b>



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview Cost/Price Evaluation Factor**

**Erica Chambers  
Erin Roberts**



# Factor 2 - Cost/Price

- **Cost-Plus-Fixed-Fee (CPFF) Core and CPFF/Firm Fixed Price (FFP) Indefinite-Delivery/Indefinite-Quantity (IDIQ) delivery orders.**
- **Total Evaluated Cost/Price will consist of**
  - Phase-In
  - Base Year 1 through 3
  - Option 1 Year 1 & 2
  - Option 2 Year 1 & 2
  - Option to Extend (6 months)
- **Prime Offerors and Major Subcontractors to submit Cost/Price Volume, inclusive of Narrative (Basis of Estimate) and Excel Cost/Price Forms.**
  - **Major Subcontractors** are defined as subcontractor or Inter-/Intra-Work Transfer Authorizations (IWTA) having a contract value that equals or exceeds 10% of the core contract value.
  - **Minor Subcontractors** are defined as subcontractor having a contract value less than 10% of the core contract value. All Minor Subcontractors are to be broken out separately by the Prime Offeror in the Prime Offeror's Excel Cost Forms. Submissions from Minor Subcontractors are not required.



# Factor 2 - Cost/Price

- **Offeror to utilize Government provided Excel Cost/Price Forms**
  - Excel Cost/Price Forms provide a comprehensive working model of the Offeror's Cost/Price Volume and allow for uniform presentation and evaluation of direct labor hours, direct and indirect rates, subcontractor details, Government provided figures, and fee/profit.
  - Templates are pre-populated with formulas and green highlighted areas indicating user input is required.
  - Offeror is responsible for the accuracy of formulas and editing them as necessary to account for teaming arrangement and compliance with the Offerors estimating/accounting system(s).
- **Price Analysis and Cost Realism Analysis will be conducted**



# Factor 2 - Cost/Price

- **Phase-In**
  - Offeror to develop Phase-In labor categories, hours, and all other cost
- **Direct Labor Hours**
  - Program Management Organization
    - Offeror to develop direct charge Program Management related labor categories and hours. Proposed Program Management must reconcile with section L.35, Mission Suitability, Subfactor 3 Management Plan and Approach, MP2-MP7 of this Solicitation.
  - Non-management labor categories and hours will be provided
    - Government provided labor categories and hours are not to be changed in part or in whole, in any manner.
  - \*Labor categories and hours proposed will be for evaluation purposes only, actual labor categories and hours will be negotiated after award during Work Plan development in Phase-In.
- **Direct Labor Rates**
  - Basis of proposed direct labor rates, to include source and any supporting detail, to be provided.
- **Indirect Rates**
  - Three years of historical data as well as forecasting detail required, with narrative to support variance among the pool costs, shift in composition of pool costs, or lack of history.
  - IDIQ MAX shall NOT be included in forecasted allocation base



# Factor 2 - Cost/Price

- **Direct labor rates as well as indirect rates proposed will be for evaluation purposes only, actual labor and indirect rates will be negotiated after award during Work Plan development in Phase-In.**
- **Government provided figures for ODCs, and IDIQ Max**
  - Figures to be unchanged and proposed at the prime level only.
- **Provide evidence of adequate Accounting System**
- **Financial Capability to perform the contract required**



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

## **SpaceDOC III Draft RFP Overview Relevant Experience and Past Performance Evaluation Factor**

**David Frate**

# Factor 3 - Relevant Experience and Past Performance



- **The Government will evaluate three (3) areas of relevant experience and past performance of the Offeror and any Major Subcontractors/Teaming Partners**
  - 1) Past Performance Narrative (PPN)
  - 2) Past Performance Questionnaires (PPQ)
  - 3) Past Performance Databases (PPD)

# Factor 3 - Relevant Experience and Past Performance



- **Past Performance Narrative (PPN)**

- The Offeror shall submit information for the Prime Offeror and any Major Subcontractor/Teaming Partner.
- The Offeror shall provide past experience and performance information for past or current contracts that are relevant in terms of size, content, and complexity to this SOW by entities that will have meaningful involvement in the performance of the awarded contract.
- The Offeror shall include only the three (3) most relevant contracts held within the past five (5) years of the solicitation issue date and had a minimum of six (6) months of contract performance during the same five (5) year period.
  - For the Offeror, Major Subcontractors and Teaming Partners
- PPN content shall include contract information, contract performance, and termination information as described in the DRFP Section L.37.
  - Contract Information includes rationale supporting its assertion of relevancy
  - Contract Performance includes technical performance, business performance, management performance and cost control in fulfilling the requirements of prior contracts and support the assessments with metrics such as award or incentive fees earned
  - Termination includes any contracts held by the Offeror, Major Subcontractor or Teaming Partner that were terminated within the last 5 years and the circumstances of the termination
- Provide a list of those to whom the PPQs were sent

# Factor 3 - Relevant Experience and Past Performance



- **Past Performance Questionnaires (PPQ)**

- For the listed contracts in the PPN, the Offeror, Major Subcontractors, and/or Teaming Partners shall forward a Past Performance Questionnaire (Attachment J.2-B) to the identified points of contact (POCs) for both the technical and business aspects of the contract. POCs shall be instructed to complete and forward the PPQ directly to the Government no later than the due date for receipt of Volume III of the proposal.

- **Past Performance Databases (PPD)**

- The Government will collect and review additional relevant experience and past performance information from Government databases as well as other sources of information available to the Government. These databases will be used for the Offeror, Major Subcontractor(s), and/or Teaming Partners.

# Factor 3 - Relevant Experience and Past Performance



- **The Government reserves the right to require additional past performance information from**
  - 1) Other subcontractors that may be deemed critical by the Government
  - 2) Entities that will substantially contribute to the proposed contract or have the potential to significantly impact performance of the proposed contract.
- **For the purposes of the PPQs, PPD, and any additional past performance information reviewed by the Government, the Government reserves the right to communicate with the Offeror regarding the past performance information of any Major Subcontractor or Teaming Partner. It is the responsibility of the Offeror to ensure that its Major Subcontractors and/or Teaming Partners have provided any approvals/consent for such communication.**

# Factor 3 - Relevant Experience and Past Performance



- **The Government will evaluate past performance in a cumulative manner. The PPN, PPQs, and PPD information from the Prime Offeror, Teaming Partners, Major Subcontractors, and Minor Subcontractors will first be reviewed for Relevancy.**
- **Past Performance information that is deemed relevant will then be evaluated in comparison to the requirements of Attachment J.1-A – Statement of Work and this solicitation.**
- **An Offeror’s Past Performance Level of Confidence Rating will be based on the quality of each instance of relevant past performance as well as the applicability of this experience to the requirements of Attachment J.1-A – Statement of Work and this solicitation.**
- **Subcontractor experience (both for Major Subcontractors and Minor Subcontractors) will only be deemed relevant if the past performance information is deemed relevant to the work they are assigned in the Offerors’ (and/or Major Subcontractor’s) proposal.**

# Factor 3 - Relevant Experience and Past Performance



- **The PPN, PPQ, and PPD information will not be numerically scored but will be consolidated into a single Level of Confidence Rating:**

Rating	Description (NFS 1815.305(a)(2)(A))
<b>Very High Level of Confidence</b>	The Offeror's relevant experience and past performance is of exceptional merit and is very highly pertinent to this acquisition indicating exemplary performance in a timely, efficient, and economical manner; very minor (if any) problems with no adverse effect on overall performance. Based on the Offeror's performance record, there is a very high level of confidence that the Offeror will successfully perform the required effort.
<b>High Level of Confidence</b>	The Offeror's relevant experience and past performance is highly pertinent to this acquisition; demonstrating very effective performance that would be fully responsive to contract requirements with contract requirements accomplished in a timely, efficient, and economical manner for the most part with only minor problems with little identifiable effect on overall performance. Based on the Offeror's performance record, there is a high level of confidence that the Offeror will successfully perform the required effort.
<b>Moderate Level of Confidence</b>	The Offeror's relevant experience and past performance is pertinent to this acquisition, and it demonstrates effective performance; fully responsive to contract requirements; reportable problems, but with little identifiable effect on overall performance. Based on the Offeror's performance record, there is a moderate level of confidence that the Offeror will successfully perform the required effort.
<b>Low Level of Confidence</b>	The Offeror's relevant experience and past performance is at least somewhat pertinent to this acquisition, and it meets or slightly exceeds minimum acceptable standards; adequate results; reportable problems with identifiable, but not substantial, effects on overall performance. Based on the Offeror's performance record, there is a low level of confidence that the Offeror will successfully perform the required effort. Changes to the Offeror's existing processes may be necessary in order to achieve contract requirements.
<b>Very Low Level of Confidence</b>	The Offeror's relevant experience and past performance does not meet minimum acceptable standards in one or more areas; remedial action required in one or more areas; problems in one or more areas which adversely affect overall performance. Based on the Offeror's performance record, there is a very low level of confidence that the Offeror will successfully perform the required effort.
<b>Neutral</b>	In the case of an Offeror without a record of relevant experience and past performance or for whom information on past performance is not available, the Offeror may not be evaluated favorably or unfavorably on past performance (see FAR 15.305(a)(2)(iv)).



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

**SpaceDOC III Draft RFP Overview  
IAGP and GFP**

**Robert Corban**

# Installation-Accountable Government Property (IAGP)



- **The Government will make the Government property listed in Attachment J.1-D, Installation-Accountable Government Property (IAGP) List, available for use in performance of the contract resulting from this solicitation, on a no-charge-for-use basis in accordance with FAR 52.245-2, Government Property Installation Operation Services, as included in this solicitation. The Offeror shall notify the Government of its intention to use or not use the property.**
- **Note: NASA is offering these facilities on an availability basis and all need to be scheduled for usage with the various facility/lab managers.**

# Installation-Accountable Government Property (IAGP) Environmental Testing

- Electromagnetic Interference (EMI) Laboratory– Located in Building 332
  - Two separate shielded test chambers
- Structural Dynamics Laboratory (SDL) – Located in Building 54
  - Environmental testing and Characterization testing
- Thermal Chamber – Located in Building 332
  - -99°F to 349°F (self-service facility)



GRC Facilities webpage

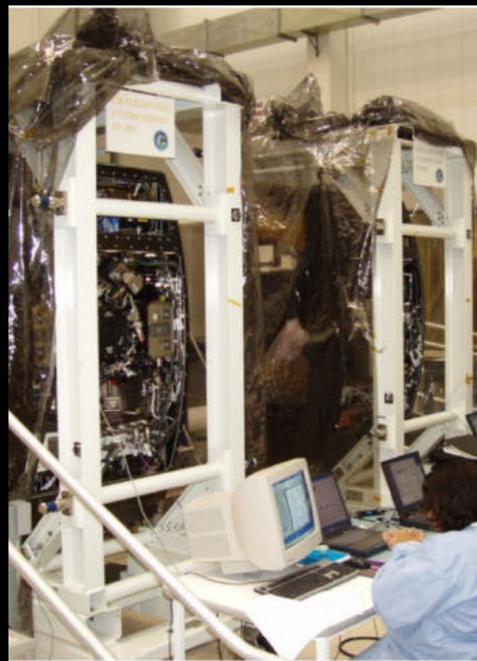


# Installation-Accountable Government Property (IAGP) Building 333 – Space Power Facility

- Cleanroom (Assembly/Integration):
  - Size: 4200 sq ft (East) & 3700 sq ft (West)
  - Class: ISO 8 or 100,000 class
  - Combustion Integrated Rack and Fluids Integrated Rack GIUs
  - ISS Payload Checkout Unit
- Bonded Storage
- Telescience Support Center (TSC)



GRC Facilities webpage



# Installation-Accountable Government Property (IAGP)

## Building 110 – Space Experiments Laboratory

- Zero Gravity Research Facility
  - Largest facility of its kind in the world (5.2 seconds microgravity)
- Cleanroom (Assembly/Integration):
  - Size: 3800 sq ft
  - Class: ISO 8 or 100,000 class
  - Exercise Countermeasure Lab
- Bonded Storage



GRC Facilities webpage





# Government Furnished Property (GFP)

- **The Government will make the Government property listed in Attachment J.1-C, Government Furnished Property (GFP) List, available for use in performance of the contract resulting from this solicitation, on a no-charge-for-use basis in accordance with FAR 52.245-1, Government Property, included in this solicitation. The successful Offeror shall take ownership of all property listed in Attachment J.1-C. The Offeror shall notify the Government, as part of its proposal, if they intend not to use the property and provide justification.**
- **GFP List is provided to give Offerors an indication of**
  - Expectations of amount of property transfer as part of phase-in
  - Expectations for quantity and value of controlled storage of inventory that will be required over the life of the contract
- **The Offeror shall deliver a Property Management Plan with the proposal to address FAR 52.245-1, Government Property and the contract property clauses in the model contract as related to Government property.**



# **Space Flight Systems Development and Operations Contract III RFP 80GRC018R0005 Industry Day**

**February 8, 2023**

**SpaceDOC III Draft RFP Overview  
Wrap Up**

**David Frate**

# Feedback Requested From Industry



- **Impacts regarding the incorporation of H.6 NFS clause 1852.209-71 Limitation of Future Contracting**
- **The length of the Phase-In period**
- **The DRFP CLIN structure**
- **The proposal page limitations listed at L.22**
- **Any unique terms and conditions including, but not limited to, those listed in Section H – Special Contract Requirements**
- **The cost-effective NASA GRC workforce criteria found in paragraphs MP6 of Sections L and M.**
- **Acquisition schedule**
- **Proposal instructions (DRFP Section L)**
- **Evaluation approaches (DRFP Section M)**
- **Any perceived safety, occupational health, security (including information technology security), environmental, export control, and/or other programmatic risk issues associated with performance of the work**



# Notional Procurement Schedule

<u>Event</u>	<u>Date</u>
<b>Draft RFP Release</b>	<b>1/26/23</b>
<b>Industry Day</b>	<b>2/8-9/23</b>
<b>Comments on Draft RFP Due</b>	<b>2/13/23</b>
<b>Final RFP Release</b>	<b>3/9/23 (TBD)</b>
<b>Proposal Due Date</b>	<b>4/26/23 (TBD)</b>
<b>Contract Award</b>	<b>8/2023* (TBD)</b>

\*The Government intends to evaluate proposals and award a contract without discussion of such offers (except clarifications as described in FAR 15.306(a)). Therefore, the Offeror's initial proposal should contain the Offeror's best terms from a cost/price and technical standpoint. The Government reserves the right to conduct discussions if the Contracting Officer later determines them to be necessary. If the Contracting Officer determines that the number of proposals that would otherwise be in the competitive range exceeds the number at which an efficient competition can be conducted, the Contracting Officer may limit the number of proposals in the competitive range to the greatest number that will permit an efficient competition among the most highly rated proposals. If written or oral discussions are conducted, the Government will seek Final Proposal Revisions from those Offerors whose proposals are determined to be within the competitive range.



# Industry Day Wrap-Up

- It is the Government's intent to minimize changes between the DRFP and the Final RFP.
- NASA appreciates your feedback and will take it into consideration for the Final RFP
- *In the event of any discrepancy between information you hear today or tomorrow and information in the Final Request for Proposal (RFP), the Final RFP is the controlling document.*



# Tour Instructions

- **For those that signed up for tours, proceed to the front doors of this building (MIC) to board bus**
- **Bob Corban will accompany the tour group**
- **At completion, the bus will return you to the MIC**
- **That will complete Day 1 of Industry Day**
- **If returning tomorrow for 1-on-1 meetings, please keep your badge and present it at the Main Gate for entrance tomorrow.**
- **If this is your last day of attendance, please return visitor badges to visitor control (Main Gate) when you depart the Center at the end of the day.**

A composite image of space. On the left, a large view of Earth from space, showing the Americas. In the center, a bright sun with a lens flare. To the right, the Moon and Mars are visible against a starry background with a purple nebula.

**Thank you for attending  
SpaceDOC III Industry Day**

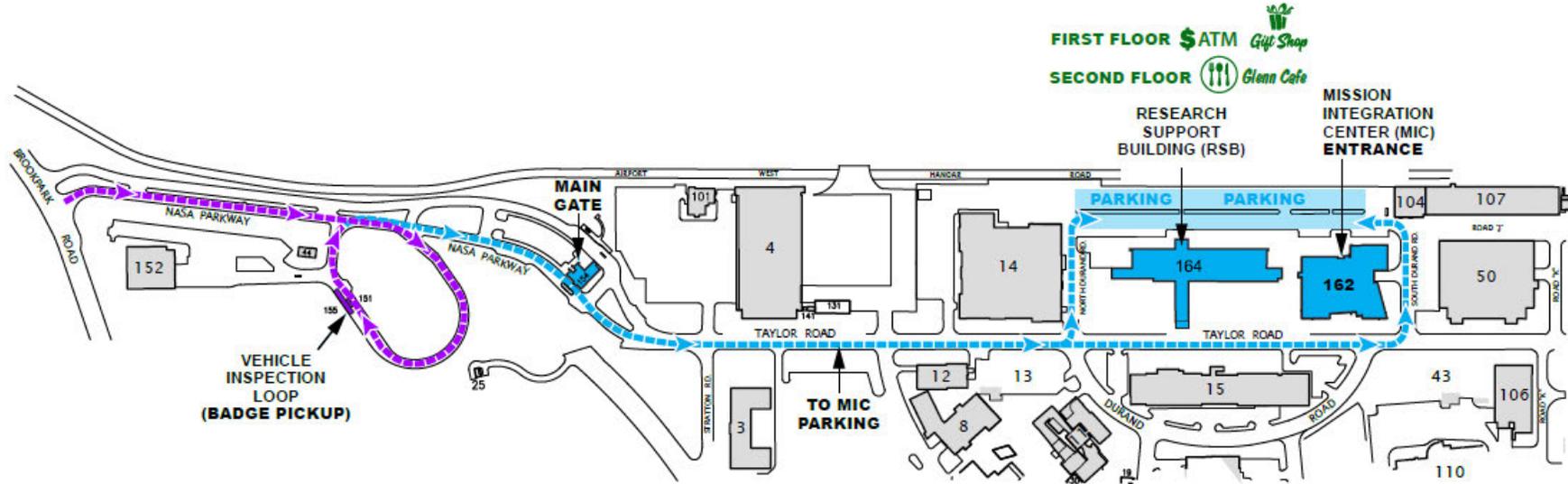
**February 8, 2023**



# BACKUP MATERIAL

# NASA Glenn Research Center – Lewis Field

## Inspection Loop, Main Gate, Research Support Building (RSB) and Mission Integration Center (MIC) Parking



### Parking Instructions:

All guests will enter the Center through the Main Gate. Guests are asked to enter from Brookpark Road onto NASA Parkway. Use the right inbound lane and proceed to the security check point on the right. At the security check point, guests will be asked to show valid photo identification to ensure they are registered. Once identification has been confirmed, guests will be given a badge and a hanging tag for their vehicle; then asked to proceed to the Main Gate for entrance onto the Center. Guests will follow signs to proceed to the parking lot at Mission Integration Center (MIC). Entrance to the auditorium is in the rear of the building, adjacent to the parking lot.

