

INFORMATION TECHNOLOGY SECURITY CONSIDERATIONS



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Explorer MDEX Kickoff

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WHAT WILL BE COVERED?



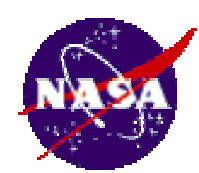
- Federal Non-waiverable Requirements
- IT Security Security Requirements
- IP Operational Network (IONET) Requirements
- Personnel Screening
- IT Security Awareness & Training
- Authority and References
- Center Point of Contacts



FEDERAL NON-WAIVERABLE REQUIREMENTS



- Participating in an IT Security Program
- Protecting personal information contained in a system of records
- Management Authorization for System to Process
- Assessment, analysis and management of risks
- Personnel screening for IT access
- IT security awareness and training
- Response to and reporting of IT security incidents



IT SYSTEM SECURITY REQUIREMENTS



- **IT System Security Plan**
- **Risk Management Plan** (document risk assessment, risk reduction and risk acceptance level)
- **IT Security Contingency Plan**
- **Assignment of IT Security Responsibility**
- **System Rules of Behavior**
- **Management Authorization to Process**
- **Warning Banner**



IP Operational Network (IONET)



IONET supports missions on a 24-hour basis transferring operational real-time data (attitude, orbit, ephemeris, telemetry, state vectors, etc.), as well as non-real-time data (data products, quick-look image data, and other data sets associated with Small Explorer projects).

IONET imposes additional requirements for personnel screening and physical security



PERSONNEL SCREENING



All individuals who require privileged or limited privileged access will require screening

DEFINITION

- **System privileges are the ability to make modifications to the computer's operating system, system logs, system configurations, account privileges, account passwords, data files, software, or applications; to add or delete software and applications; or to alter the system's security controls outside those abilities normally authorized for an individual's account.**

SECURITY CONCERN

- **Individuals with privileged access can bypass or modify the technical or operational system security controls.**



PERSONNEL SCREENING



- **International Partners -- International partners who seek access to U. S. Government IT resources, pursuant to an international agreement, will be screened by NASA Headquarters.**
- **Foreign Nationals – Foreign Nationals who are not international partners are not allowed to have privileged access.**



IT SECURITY AWARENESS & TRAINING



- **WHO MUST BE TRAINED**

- **All NASA employees, civil servant or contractor, guest researchers, summer program participant who uses a computer to accomplish work for NASA.**
- **All of the required training is web-based and available on the NASA Site for On-line Learning and Resources (SOLAR)**



Authority and References

FEDERAL

- **Computer Security Act (Public Law 100-235)**
- **Office of Management and Budget (OMB) Circular A-130, Appendix III**

NASA

- **NASA Policy Directive (NPD) 2810.1, “Security of Information Technology”**
- **NASA Procedures and Guidelines (NPG) 2810.1, “Security of Information Technology”**

CENTER

- **Goddard Procedures and Guidelines (GPG) 2810.1, “Security of Information Technology”**
- **IP Operational Network (IONet) Access Protection Policy and Requirements Document**



CENTER POINT OF CONTACTS



Explorer Program Office Computer Security Official

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IT SECURITY URL'S



- Goddard CIO Home Page
- <http://cio.gsfc.nasa.gov/itsos.htm>

- Enterprise IT Security Branch (Code 297)
- <http://forbin2.gsfc.nasa.gov/297/>

- NASA Site for On-line Learning and Resources (SOLAR)
- <https://solar.msfc.nasa.gov/solar/delivery/public/html/newindex.htm>

- Expert Center for Information Technology Security Awareness and Training
- http://www.grc.nasa.gov/www/CIO/ec_itsat/index.htm