



# **2015 Policy Update for the Defense Installations Spatial Data Infrastructure (DISDI)**

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DUSD(I&E) is now the

Assistant Secretary of Defense for Energy,  
Installations, and Environment (ASD(EI&E))



# Bottom Line (Up Front)

Acquisition, Technology and Logistics

- DoDI 8130.01, Installation Geospatial Information and Services (IGI&S) was signed April 9, 2015
- Need EI&E functionals at OSD and Component HQ levels to start implementing the requirement to compile IGI&S data into an authoritative data source for each installation (see slide 6)
- Need participation (input) from EI&E functionals on final draft of version 4.0 of SDSFIE (expect completion in Q1/FY16)
- Army is officially tasked to manage the technical development of SDSFIE (status quo)
- “DISDI Group” becomes “IGG”
- DISDI PM becomes the EI&E Geospatial Information Officer (GIO)
- Common Installation Picture (CIP) is an official data requirement



## Why DoDI 8130.01, *Installation Geospatial Information and Services (IGI&S)* is Needed

Acquisition, Technology and Logistics

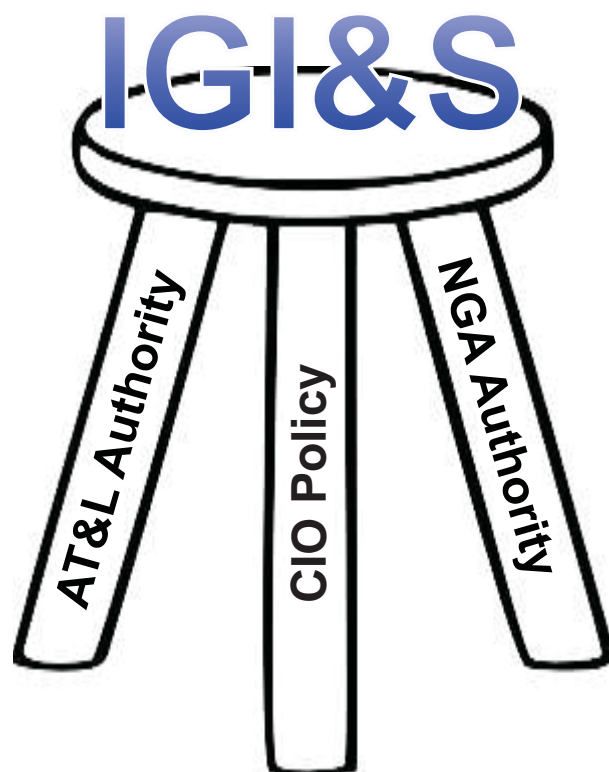
- DoDI 8130.01 closes the policy gap created by rapid advance of GIS technology into the installation management mission area, a use not addressed by NGA or other DoD policies
- DoDI 8130.01 clarifies how AT&L authority over installation management will be coordinated with NGA authority over GI&S
- Status of DoDI 8130.01:
  - Formal coordination complete as of November, 2014
  - Final legal review complete March, 2015
  - AT&L signed and issuance posted on 9 April, 2015

***NGA is not resourced for, nor skilled in, the application of GIS for management of installations and environment***



# The Policy Foundation for IGI&S

Acquisition, Technology and Logistics



- Defines Installation Geospatial Information and Services (IGI&S) as:

A ~~SYSTEM?~~  
A  
CAPABILITY!

- DoDI 8130 series prescribes information management and governance procedures
- IGI&S must conform with GEOINT standards to the extent practicable
- SDSFIE-V and SDSFIE-M are now DISR standards



# Policy Drivers for IGI&S

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## I&E Policies

1. DoDD 3200.15, Sustaining Access to the Live Training and Test Domain, 2013
2. DoDI 4165.14, Real Property Inventory Forecasting, 2014
3. DoDI 4715.03, Natural Resources Conservation Program, 2011
4. DoDI 4715.16, Cultural Resource Management, 2008
5. DoDI 4715.14, Operational Range Assessments, 2005
6. DoDD 4715.11, Environmental and Explosives Safety Management on Operational Ranges Within the United States, 2004
7. DoDD 4715.12, Environmental and Explosives Safety Management on Operational Ranges Outside the United States, 2004
8. DoD 6055.09-M, Vol. 1, DoD Ammunition and Explosives Safety Standards, 2008
9. Unified Facilities Criteria (UFC) 2-100-01, Installation Master Planning, 2012
10. DoDI 3030.3, Joint Land Use Study Program (JLUS), 2004
11. DoDI 4165.57, Air Installations Compatible Use Zones (AICUZ), 2011
12. DoD Manual 4715.20, Defense Environmental Restoration Program (DERP) Manual, 2012
13. DoDI 6055.17, DoD Installation Emergency Management Program (IEM), 2009
14. DoDI 6055.07, Mishap Notification, Investigation, Reporting, and Record Keeping, 2011

## Other Policies

1. Executive Order 12906, The National Spatial Data Infrastructure, 1994
2. OMB Circular A-16, Coordination of Geographic Information and Related Spatial Data Activities, 2002 & 2010
3. Executive Order 12333, United States Intelligence Activities, 1981
4. DoDD 5105.6, National Geospatial-Intelligence Agency (NGA), 2009
5. DoDD 8000.01, Management of the DoD Information Enterprise, 2009
6. DoDI 8320.02, Sharing Data, Information, and Information Technology Services in the DoD, 2013
7. Presidential Policy Directive 21 - Critical Infrastructure Security and Resilience, 2013
8. DoD Mission Assurance Strategy, 2012
9. DoDD 3020.40, DoD Policy and Responsibilities for Critical Infrastructure, Change 2, 2012
10. DoDI 3020.45, Defense Critical Infrastructure Program (DCIP) Management, 2008



# DoDI 8130.01 – Key Responsibilities

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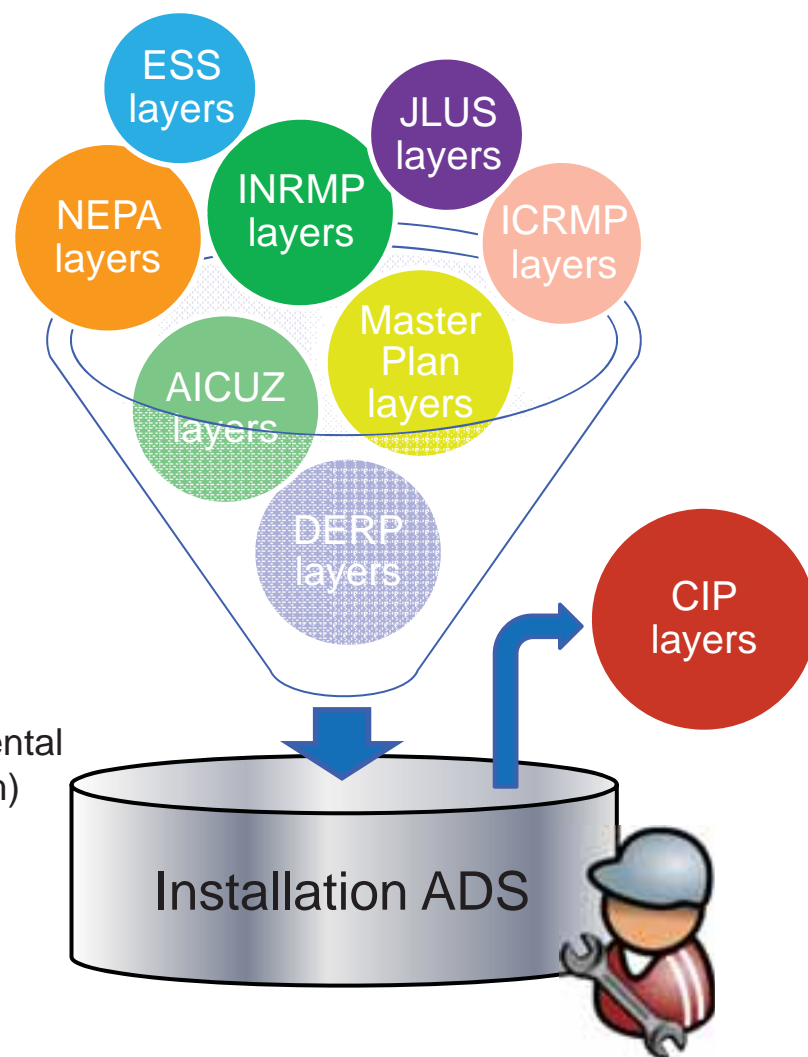
- Secretaries of the Military Departments (in addition to Component responsibilities):
  - Designate Service IGI&S elements to coordinate IGI&S capabilities
  - For each installation, establish a trusted, authoritative data source (ADS) for all geospatial data and products which fulfill installation and environment missions
    - Includes common installation picture (CIP) data
    - Includes data or products from INRMPs, master plans, MMRP maps, Explosive Safety Site plans, AICUZ studies, Joint Land Use Studies, etc.
    - Provide mechanisms for this data to be made visible, accessible, understandable, trusted, and interoperable throughout the data lifecycle at the headquarters level as well as across the federal data sharing environment, to include the Geospatial Platform
  - Provide for the creation and maintenance of geospatial data describing:
    - The CIP as defined by the IGG and approved by ASD(EI&E)
    - Location and extent of all DoD real property assets
    - Location and extent of DoD infrastructure
    - Location of natural and cultural resources, environmental, safety, and installation master planning information
  - Ensure IGI&S requirements are coordinated with their respective GI&S officers and DROs, per CJCSI 3901.01D



# IGI&S: Many Data Sources, One Governance

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- Installation Master Plan
- INRMP (Integrated Natural Resource Management Plan)
- ICRMP (Integrated Cultural Resource Management Plan)
- AICUZ (Air Installation Compatible Use Zone plan)
- NEPA Studies (National Environmental Policy)
- DERP Documents (Defense Environmental Restoration Program)
- JLUS (Joint Land Use Study)
- ESS Plans (Explosives Safety Siting)



IGI&S Program  
Manager for ADS





# DoDI 8130.01 – IGI&S Governance Group (IGG)

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- Procedures (Enclosure 3): The IGG shall:
  - Support I&E governance by reviewing BEA and Functional Business Strategy
  - Function as a standards consensus body for IGI&S. Develop and maintain IGI&S standards for approval by ASD(EI&E)
  - Establish guidelines to reduce duplicate investments, enable interoperability of IGI&S capabilities and ensure data quality is sufficient for decision-making
  - Establish guidelines for IGI&S portfolio management
  - Recommend to the ASD(EI&E) a set of common installation geospatial data sets and services (Common Installation Picture (CIP))
  - Develop mechanisms to make IGI&S data visible and accessible to the maximum extent allowed by law or DoD policy across the federal data sharing environment
  - Function as the IGI&S Community of Interest (COI) per DoD 8320.02G; develop practices which focus IGI&S capabilities on I&E and other requirements established in the referenced policies (see earlier slide)



# What is SDSFIE, 2015 and beyond?

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- The Spatial Data Standards for Facilities, Infrastructure, and Environment (SDSFIE) *are a family of IT standards (models, specifications) which define a DoD-wide set of semantics intended to maximize interoperability of geospatial information and services for installation, environment, and civil works missions.*
- The SDSFIE family consists of 7 parts:
  - Includes metadata and data quality standards (supports auditability and accuracy)
  - A logical extension of existing IGI&S standards
- SDSFIE Online: a web-centric interface that enables users to access documentation, participate in functionality and utilize tools that support the goals of the SDSFIE family of standards.

***SDSFIE is a “dictionary” for interoperability, NOT a set of data collection requirements***



# Process for Approval of SDSFIE Versions

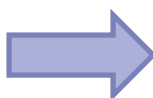
Acquisition, Technology and Logistics

**Major Revision**  
(e.g. SDSFIE-V 4.0)



- IGG recommends to PDASD (EI&E)
- FBGB is briefed; Exec. Secretary issues coordination memo at PDAS level
- PDASD (EI&E) decision memo issues the version, tasks Components for implementation plans (S: 9 months)

**Minor Revision**  
(e.g. SDSFIE-V 3.1)



- IGG recommends to Exec. Secretary
- Exec. Secretary issues coordination memo at PDAS level
- Exec. Secretary decision memo issues the version, tasks Components for implementation plans (S: 6 months)

**Corrigendum**  
(e.g. SDSFIE-M  
1.0.2)



- IGG develops, reviews and approves



# 2015 Proposed CIP Layers

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3.1 Layer Name	Geometry	New for 2015
AccessControl	P	
AirAccidentZone	A	
Bridge	A	
Building	A	
Environmental RemediationSite	A	
ExternalPropertyInterest	A	Yes
Fence	L	
FutureProjects	A	Yes
GolfCourse	A	
HistoricDistrict	A	Yes
ImpactArea	A	
Installation	A	
LandParcel	A	
LandUse	A	Yes
MilitaryRange	A	
MilitaryTrainingLocation	A	
MilQuantityDistanceCombinedArc	A	Yes
NatResAcquitionBoundary	A	Yes
NoiseZone	A	Yes
Outgrant	A	Yes
PavementBranch	A	
PavementSection	A	
RailSegment	L	
RailTrack	L	
RecreationArea	A	
RoadPath	L	Yes
RoadSeg	L	Yes
Site	A	
Tower	P	
VehicleParking	A	
Wetland	A	

New for 2015

Will accept  
RoadPath, RoadSeg  
or RoadCenterline



## 2015 CIP Request – Remaining Actions

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- DISDI will:
  - Provide proposed list of layers with justifications to IGG
  - Propose a metadata requirement (based on SDSFIE-M)
- Formal request will come from BEI, OASD(EI&E) in similar fashion to a Real Property Inventory request
  - 90 day suspense
- Submitted data shall adhere to the following:
  - SDSFIE-V 3.0 or 3.1 compliant
  - Geodatabase or Shapefile format
  - Include sub-classed feature types that correspond to requested layers
  - Include metadata at Component HQ level, per layer

*Each CIP layer is justified by 3-7 different DoD policies; most are required by 5 policies*



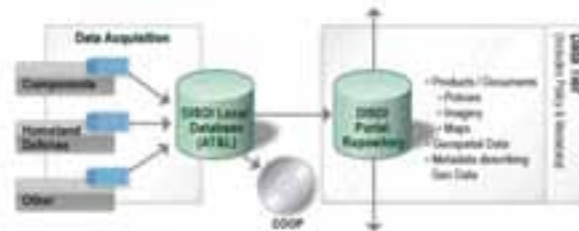
# DISDI Portal – Next Generation

Acquisition, Technology and Logistics

- Existing “DISDI Portal” is really just a map viewer
- A true “portal” is under development by DISDI



Restructure per new architecture



Access via new user interface



## Defense Installations Spatial Data Infrastructure (DISDI) Portal

### DoD Links

### IGI&S Programs

### Resources

### FAQs

### Contact Us



#### DISDI Zip Maps

This global web map provides detailed views of all DoD installations and operating areas along with useful National-scale layers (e.g., Congressional Districts, infrastructure, environmental data) and up-to-date imagery. Use it to create your own "operating picture" of Defense Installations.



#### DISDI Map Analyst

With customized data views, more extensive tools and querying capabilities, this global map viewer of DoD installations is designed for the more advanced user.



#### Map Library

Browse our collection of ready-to-use IGI&S maps. This library includes maps of DoD installations organized by State, Territory and COCOM.



#### Data / Metadata Search

Search for geospatial data and metadata from across the IGI&S community.



#### Policy & Documents

Find and download DoD policy, guidance, presentations and other documents applicable to the IGI&S community.



#### Data / Custom Map Request

Contact the DISDI Program to (a) request authoritative geospatial data, (b) gain access to secure web map services (WMS), or (c) request customized map products.

#### News

- [Headline number one...](#)
- [Headline number two...](#)
- [Headline number three...](#)
- [Headline number four...](#)
- [Headline number five...](#)

#### Updates

- [Update number one...](#)
- [Update number two...](#)
- [Update number three...](#)
- [Update number four...](#)
- [Update number five...](#)



# What's New on the DISDI Map Viewer?

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Joint Base Boundaries  
Pre-BRAC Sites

17 HSIP Transportation  
and Utility Layers Added

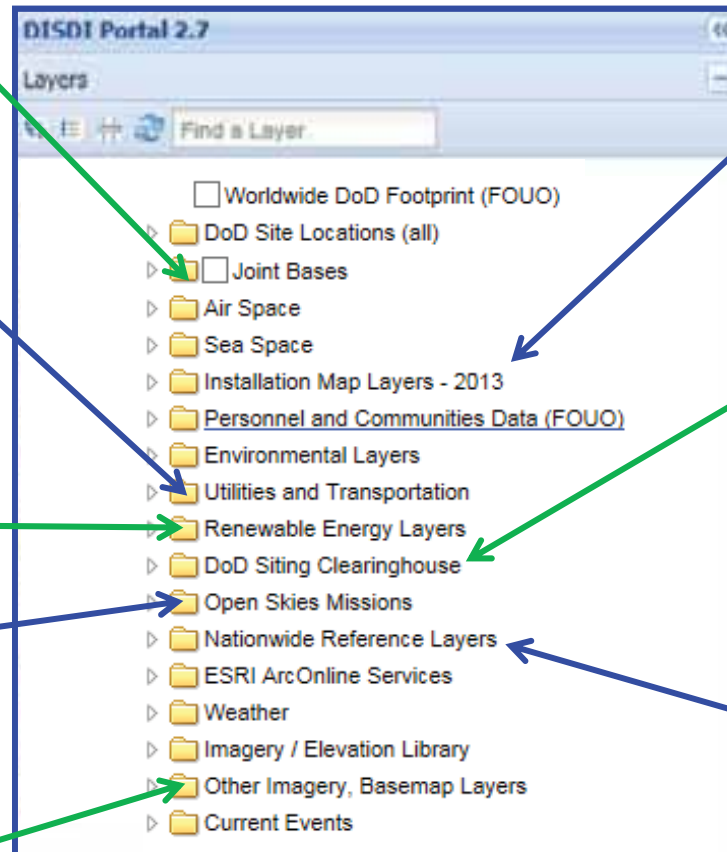
- Power plants
- Treatment plants
- Substations
- Communications
- Railroads

Wind Potential Capacity

New Open Skies Missions

6 GVS Basemap Layers  
Added

- Hillshade
- DNCs
- Scanned Maps
- Terrain
- Worldwide Imagery



Army Real Estate Data

- Land Parcels
- Sites
- Outgrants
- Disposals

DoD Siting Clearinghouse  
Projects

- Transmission Lines  
Projects
- BLM RMPs

21 HSIP Layers Added

- Emergency Response
  - Red Cross
  - FEMA
  - 911
- Joint Operations Centers
- GSA Properties
- Coast Guard
- JFHQ

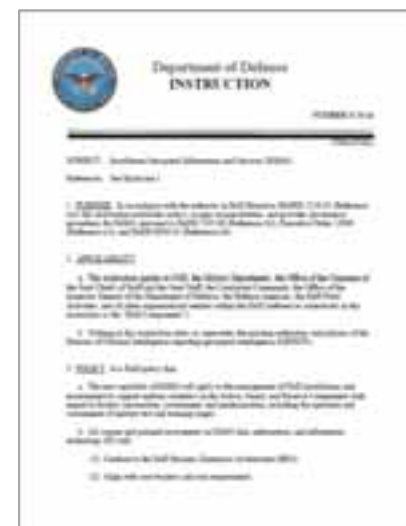




# Desired Outcomes for DoDI 8130.01

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- Formalize IGI&S as a sub-set of GI&S, conforming to NGA standards and policy
- Formally define IGI&S and “common installation picture”
- Establish the IGI&S Governance Group and GIO (OSD level)
- Coordinate the existing data collection requirements embedded in DoD policies (to improve sharing and standardization, reduce duplication)
- Require NGA to support IGI&S requirements and standards within existing GEOINT processes and capabilities
- Establish IGI&S Programs as the “central warehouse” for certified geospatial data – authoritative data source per installation
- Build a policy basis for resourcing, sustainment, architecture, and portfolio management of IGI&S within the Components
- Cement the requirement to support Homeland Defense, Mission Assurance





## Next Steps

Acquisition, Technology and Logistics

- The EI&E GIO is on a “roadshow tour”
- Each IGI&S PM should give similar desk-side briefs within their Component
- Start planning for what each Installation ADS will be
- Be ready to receive data...
- *Even if the data isn't SDSFIE compliant, its still very valuable*
- Draft guidance for handling & storage of IGI&S data
- Learn as we go, learn as we grow