What Is SAM?

**Today**

- **Siloed** – Separate systems, each with a separate login
- **Redundant** – Overlapping data creates opportunity for error and complicates changes
- **Separate** – Multiple contractors at many hosting locations, managed separately with varying levels of service

**Future**

- **1 Login!** – Functionality accessible at one online location to streamline the process
- **1 Data Source!** – Centralized, normalized data to eliminate potential for conflicting values and improves agility to deal with future changes
- **1 Host!** – Consolidated hosting to reduce O&M costs

*Existing capabilities, streamlined for efficiency.*
How Will SAM Be Organized?

IAE system capabilities notionally have been organized around six key functional areas

<table>
<thead>
<tr>
<th>Functional Area</th>
<th>Capabilities</th>
<th>Legacy Systems</th>
</tr>
</thead>
<tbody>
<tr>
<td>Entity* Management</td>
<td>• Manage entity core data</td>
<td>• CCR/FedReg – Central Contractor Registration/Federal Agency Registration</td>
</tr>
<tr>
<td></td>
<td>• Manage certifications/representations</td>
<td>• ORCA – Online Representations and Certifications Application</td>
</tr>
<tr>
<td>Award Management</td>
<td>• Post solicitation and award data</td>
<td>• FBO – Federal Business Opportunities</td>
</tr>
<tr>
<td></td>
<td>• Maintain government-wide contract award data</td>
<td>• FPDS-NG – Federal Procurement Data System-Next Generation</td>
</tr>
<tr>
<td></td>
<td>• Manage government-wide subcontractor data</td>
<td>• eSRS/FSRS – Electronic Subcontracting Reporting System/FFATA Subaward Reporting System</td>
</tr>
<tr>
<td>Wage Data</td>
<td>• Access wage determinations</td>
<td>• WDOL – Wage Determinations Online</td>
</tr>
<tr>
<td>Performance Information</td>
<td>• Manage/maintain past performance information</td>
<td>• PPIRS/CPARS/FAPIIS – Past Performance Information Retrieval System</td>
</tr>
<tr>
<td></td>
<td>• Manage exclusion list</td>
<td>• EPLS – Excluded Parties List System</td>
</tr>
<tr>
<td>Assistance Program</td>
<td>• Create/maintain assistance program catalog</td>
<td>• CFDA – Catalog of Federal Domestic Assistance</td>
</tr>
<tr>
<td>Catalog</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Support</td>
<td>• Provide security/access control</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Provide reporting/communications support</td>
<td></td>
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<tr>
<td></td>
<td>• Provide internal controls</td>
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</tr>
</tbody>
</table>

* For the purposes of this capability area, *Entity* refers to prime contractors, organizations or individuals applying for assistance awards, those receiving loans, sole proprietors, corporations, partnerships, and any Federal government agencies desiring to do business with the government.
SAM is merging multiple systems into one database
Consolidation of databases eliminates data redundancy across the systems
In some cases, merging databases requires normalizing like items like field length or format

Your Interfaces Will Change!
Will Related Systems Be Ready?

- Every system that interfaces with CCR/FedReg, ORCA or EPLS today must make changes in order to continue with business as usual.

- Groups impacted include contract/grants writing systems (processing awards), financial systems (paying awardees), business warehouses (creating reports), etc.

- Impacts of not aligning with the SAM data model and updating your interfaces include not being able to update your systems that award contracts or grants and those that pay awardees.

- All the information needed to update interfaces is available at http://sam.gov.
How Was Migration Planned?

- Identified and evaluated as-is CCR/FedReg, ORCA, and EPLS interfaces
- Validated business purpose and technical details
- Eliminated redundancies and improved process efficiency where possible
- Analyzed and consolidated interfaces
- Specified interfaces to be phased-out and supported long-term
What Are the Migration Phases?

- Production Cutover
- 9 months from Cutover

- Interface Specs Made Available
- SAM Interface Testing
- Interface Certification

- As-Is Interfaces

- CCR/FedReg/ORCA/EPLS

- As-Is Interfaces (Migrated)

- New To-Be Interfaces

- Testing Environment
- Production Environment
Key Dates

► May 29 – SAM Phase 1 is scheduled to be available to users
► By May 29, update your system to consume legacy-formatted data from the new location
► By February 2013, update your system to consume SAM-formatted data
Data will continue to be provided in multiple ways:

- Extracts – Data is provided as a flat file (https/ftp)
- Web Services (i.e., in XML)

Changes to the data will necessitate changes to the receiving database, regardless of method of transmission.
How Will Data Be Provided? (cont’d)

► To-Be interfaces/extracts will be based on functional area and data sensitivity level

► Each Functional Area will have a set of records available in increasing levels of sensitivity:
  ▪ Public
  ▪ For Official Use Only
  ▪ Sensitive
  ▪ System Only

► The existing CCR, FedReg, and ORCA extracts will be merged into the four Entity Management extracts

► If you have permissions for that level of data, you have access to all the data at that level, through various means, including web or FTP access to a flat file and web services access to XML
### Which Interfaces Will Be Migrated?

<table>
<thead>
<tr>
<th>As-Is Interface Name</th>
<th>SAM To-Be Interface Name</th>
<th>Protocol</th>
<th>Data Format</th>
</tr>
</thead>
<tbody>
<tr>
<td>CCR Extract – Complete</td>
<td>Entity Management Extract – System-only</td>
<td>sFTP, HTTP-website, SOAP/HTTPS</td>
<td>XML, CSV</td>
</tr>
<tr>
<td>CCR Extract – FOIA</td>
<td>Entity Management Extract – Public</td>
<td>sFTP, HTTP-website, SOAP/HTTPS</td>
<td>XML, CSV</td>
</tr>
<tr>
<td>CCR Extract – Sensitive</td>
<td>Entity Management Extract – Sensitive</td>
<td>sFTP, HTTP-website, SOAP/HTTPS</td>
<td>XML, CSV</td>
</tr>
<tr>
<td>CCR Extract – FOUO</td>
<td>Entity Management Extract – FOUO</td>
<td>sFTP, HTTP-website, SOAP/HTTPS</td>
<td>XML, CSV</td>
</tr>
<tr>
<td>NA</td>
<td>Entity Management Extract – Reps and Certs</td>
<td>sFTP, HTTP-website</td>
<td>CSV</td>
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<tr>
<td>CCR Extract – MPIN</td>
<td>CCR will be merged into SAM</td>
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<tr>
<td>CCR XML – Non-Proprietary</td>
<td>Functional CCR XML included in Entity Management Extracts</td>
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<tr>
<td>CCR Extract – Proprietary</td>
<td>CCR will be merged into SAM</td>
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<tr>
<td>CCR XML – Proprietary</td>
<td>Functional CCR XML included in Entity Management Extracts</td>
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<tr>
<td>CCR XML – Sensitive</td>
<td>Functional CCR XML included in Entity Management Extracts</td>
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<tr>
<td>FedReg Extract</td>
<td>FedReg will be merged into SAM</td>
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</tr>
<tr>
<td>ORCA XML</td>
<td>ORCA will be merged into SAM</td>
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<td></td>
</tr>
</tbody>
</table>

- ☐ Interface will be kept
- ☐ Interface will be eliminated
**Major Changes – POCs (cont’d)**

- **POCs will be provided as strings**
  - POCs will be associated with data sensitivity level
  - “POC type” field will specify the type of POC
- **POC collection is moved to the end of the process and is based on what data is entered by the registrant, so only the POCs relevant to that entity’s business purpose are required**

<table>
<thead>
<tr>
<th>Data Sensitivity Level</th>
<th>Legacy System</th>
<th>Type</th>
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<tbody>
<tr>
<td>“Public”</td>
<td>CCR</td>
<td>Electronic Business</td>
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<tr>
<td></td>
<td>CCR</td>
<td>Government Business</td>
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<tr>
<td></td>
<td>CCR</td>
<td>Past Performance</td>
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<tr>
<td>“FOUO”</td>
<td>FedReg</td>
<td>Accounts Receivable</td>
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<td>CCR</td>
<td>EDI</td>
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<td></td>
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<td>FedReg</td>
<td>Eliminations</td>
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<td>Sales</td>
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<tr>
<td></td>
<td>FedReg</td>
<td>Accounts Payable</td>
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<tr>
<td>“Sensitive”</td>
<td>N/A</td>
<td>(none at this time)</td>
</tr>
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</table>
Major Changes – Counters

► Counters were eliminated from To-be Interfaces
► Data will be provided in CSV/nested XML tags format
► Example
  ▪ Product Service Codes – If there are multiple PSCs for a DUNS, they will be made available as a single string with carat (^) separation, bound by “” in CSV file and nested XML tags in web service
  ▪ PSC COUNTER – Eliminated from to-be interface
Major Changes – Standards

► Standardization of address formats
  ▪ Added address line 3 and 4
  ▪ Added Zip+4
  ▪ Added Congressional District

► Field Length Changes
CT Codes are being mapped to four Exclusion Types

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<th>EXCLUSION TYPES</th>
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<tbody>
<tr>
<td>A1</td>
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<tr>
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<td>Ineligible (Proceedings Completed)</td>
</tr>
<tr>
<td>N1</td>
<td>Prohibition/Restriction</td>
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</tr>
<tr>
<td>S1</td>
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</tr>
<tr>
<td>W</td>
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<tr>
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</tr>
<tr>
<td>S</td>
<td></td>
</tr>
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<tr>
<td>H</td>
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<tr>
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<td>Voluntary Exclusion</td>
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</table>

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<tr>
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</thead>
<tbody>
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<tr>
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</tr>
<tr>
<td>X</td>
<td>Voluntary Exclusion</td>
</tr>
<tr>
<td>H2</td>
<td></td>
</tr>
</tbody>
</table>
317 CCR elements are affected in moving to SAM

- 58 were eliminated
  - “Counters” were eliminated
  - The universe of CCR POCs was reduced to just those needed
  - Austin Tetra number eliminated – no longer used
  - SIC codes eliminated – no longer used
  - NAICS string eliminated that was redundant in CCR

- 4 changed length due to database normalization
  - DBA Name
  - Highest Employee Security Level
  - Parent Legal Business Name
  - Agency Parent City

- 133 format change due to database normalization
  - Converted individual POC elements to strings
  - Normalized format of several fields across the three legacy formats
Extracts Changes – Other

► 124 FedReg elements are affected in moving to SAM
  ▪ 21 were eliminated
    – Counters
    – POCs
    – D&B hierarchy elements
  ▪ 3 changed length due to database normalization
    – NAICS Code String
    – PSC Code String
    – SAM City
  ▪ 70 changed format due to database normalization
    – Converted individual POC elements to strings (see slide 8)
    – Normalized format of redundant fields

► EPLS – There is no EPLS extract (exclusions data is included in web services)

► ORCA – We are creating a new extract, so for the first time, the full set of representations and certifications data will be available via an extract
Web Services Changes

- Data structure changed to accommodate merging of the CCR/FedReg, ORCA and EPLS data models into a single integrated data model
- Web service operations must change to accommodate the new structure
- Some terminology is changed due to merging of functions

Level of effort for making the necessary changes on the consuming system side will vary due to differences in technology environment, skills, lifecycle method, and key scenarios relevant to the context
Where Can I Get More Information?

The SAM.gov website contains the following information:

- SAM Interfaces Overview Briefing – contains this information and additional background
- Extract Mapping Spreadsheet – Details the as-is and to-be data elements and provides a mapping
- Web Services
  - Interface Specification for Web Services
  - SAM Legacy WSDLs
- Extracts – Sample CSV file for each extract type
- Consolidated SAM Interfaces Q&A – Answers questions users have posed about implementing the interface changes

Once you have reviewed the above information, please feel to write to askSAM@gsa.gov with any questions you may have.
Spreadsheet – Key Points

► Data Format
  ▪ Describes the data type to include any single character or boolean values
  ▪ Describes the date format – MMDDYYYY
  ▪ ^Separated – Refer to the worksheet “SAM To-Be STRING Clarification”

► Data Length
  ▪ Provides the length of the element
String Explanation

► SAM Numerics Code String
  - Bonding Level Value + Local # Employee + Local Ann. Revenue + Total Assets + Megawatt Hours + Barrels Capacity

► Disaster Response String
  - Geographic Area Served: County + Geographic Area Served: Metropolitan Statistical Area + Geographic Area Served: State

► Bus Type String
  - Government Type + Other Business or Organization Qualifiers + Other Entity Qualifiers + AbilityOne Flag + Registration Purpose

► DNB Linkage String
  - Parent Address + HQ Parent Address + Domestic Parent Address + Global Parent Address

► SBA Business Types String
  - SBA Business Types + SBA Cert Exp Date
^Separated Fields

- Explanation of String concatenation
  - Values separated by single ^
  - List Values separated by double ^^
  - e.g.: “... ^^GL^123456789^55555121^123 Main Street^NULL^NULL^NULL^Arlington^USA^VA^9999^00001^01012011^^...”
Data Request Process

► There will be a new process for requesting an extract or XML feed
  ▪ Determination of business need for the data
  ▪ Government POC approval (may also require security officer approval)
  ▪ SAM PMO approval

► To submit data into SAM (which will be available in Phase 2b), interfacing systems will go through a certification process
Data Access

For Phase 1, SAM has following Data Access levels

- Public Data – No approval needed
- FOUO Entity Management Data – Approval required for non-government users
- FOUO Exclusions Data – Approval required
- Sensitive Entity Management Data – Approval required
- Sensitive Exclusions Data – Approval required
- System Only Entity Management Data – Approval required
- MPIN Data Viewer – Approval required

Users from .gov, .mil or si.edu domain, or users with a SAM U.S. Federal government role, will automatically have Entity Management – FOUO Data Access, replacing CCR Tools
Requesting Data Access

► Pre-Go-Live:
  - Those who already have access to any of the CCR extracts and CCR Tools will receive an email with information.
  - They will need to fill out two forms (data access request and data usage agreement) and email them back.
  - They will receive test accounts and will be able to test the extracts prior to go-live.
  - These test accounts will automatically be rolled over to production accounts after go-live.

► An email has already been sent out to this group. If you did not receive it and you think you are a current user of the extracts, please email asksam@gsa.gov to be added to the list.
Requesting Data Access

► After Go-Live:
  - User must first establish a SAM account.
  - User will navigate to the SAM “Data Access” page and fill out their request online.
  - User will complete their Data Agreement electronically; a PDF will be available.
  - Access requests will be automatically emailed from SAM to the approver(s) (Note approvers do not need to have a SAM account)
  - GSA PMO will process final approval and user will receive an email confirming their account

► Once request is granted, user will be able to access the data by either extract method and via online searches.
What’s Next?

► SAM Phase 1 will go live May 29, 2012

<table>
<thead>
<tr>
<th>FY10</th>
<th>FY11</th>
<th>FY12</th>
</tr>
</thead>
</table>

CCR/FedReg, ORCA, EPLS

Initiate Requirements Gathering 7/10

Development

Capabilities Available in SAM 5/12

Requirements input through CCBs, user groups, and industry meetings

Solicitation

Testing/Deployment/Integration

User Training

Acceptance Testing
Next Steps for You

► Plan for Changes
  ▪ Estimate and budget for changes in legacy system interfaces and SAM interfaces
  ▪ Include plans for interface changes in release schedules
    – Development
    – Test
    – Certification

► Use documentation available on sam.gov to plan and code

► Stay Informed
  ▪ Check the website for new information
  ▪ Write to askSAM@gsa.gov and ask to receive emails when new information becomes available

► Communicate with us about pain points (send email to askSAM@gsa.gov)
Some POCs were eliminated because SAM has a role that does this function:
- CCR POC, CCR POC Alternate: these become an Entity Administration role
- Certifier POC, Certifier Alternate POC: these become the Entity Registration Representative role

Some POC types were eliminated because they were not really POCs:
- Corporate POC: Replaced with E-Business POC and Government POC
- Remit Info POC is really the “Attn line” for the Remit address
- Mailing Address POC is really “mailing address line 2”
- Owner Info POC/Sole Proprietor POC is the answer to a FAR clause in ORCA
- Previous Business Name POC is actually the previous business name (not a person name)
- Domestic Ultimate POC, Global Ultimate POC, Gov Parent POC, HQ Parent POC: these were misnamed in the extract documentation, they are actually D&B linkage information

All Alternate POCs are now optional (eases the burden for small businesses)