

DOE Integrated Project Management In the Information Age

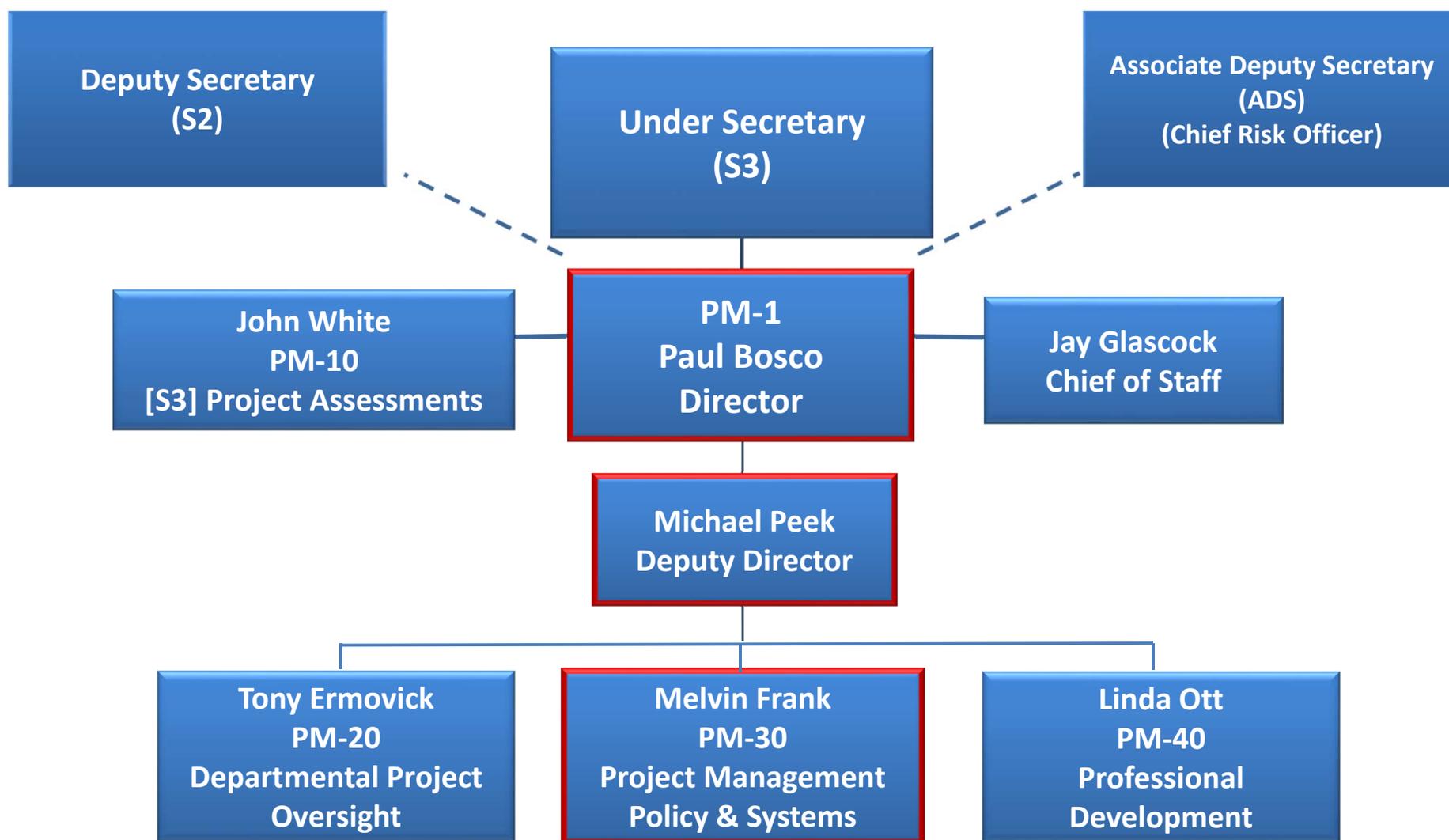


Melvin Frank
Chief, Project Management Policy and Systems (PM-30)
Office of Project Management Oversight and Assessments (PM)
Presentation for IPMW
October 31, 2016

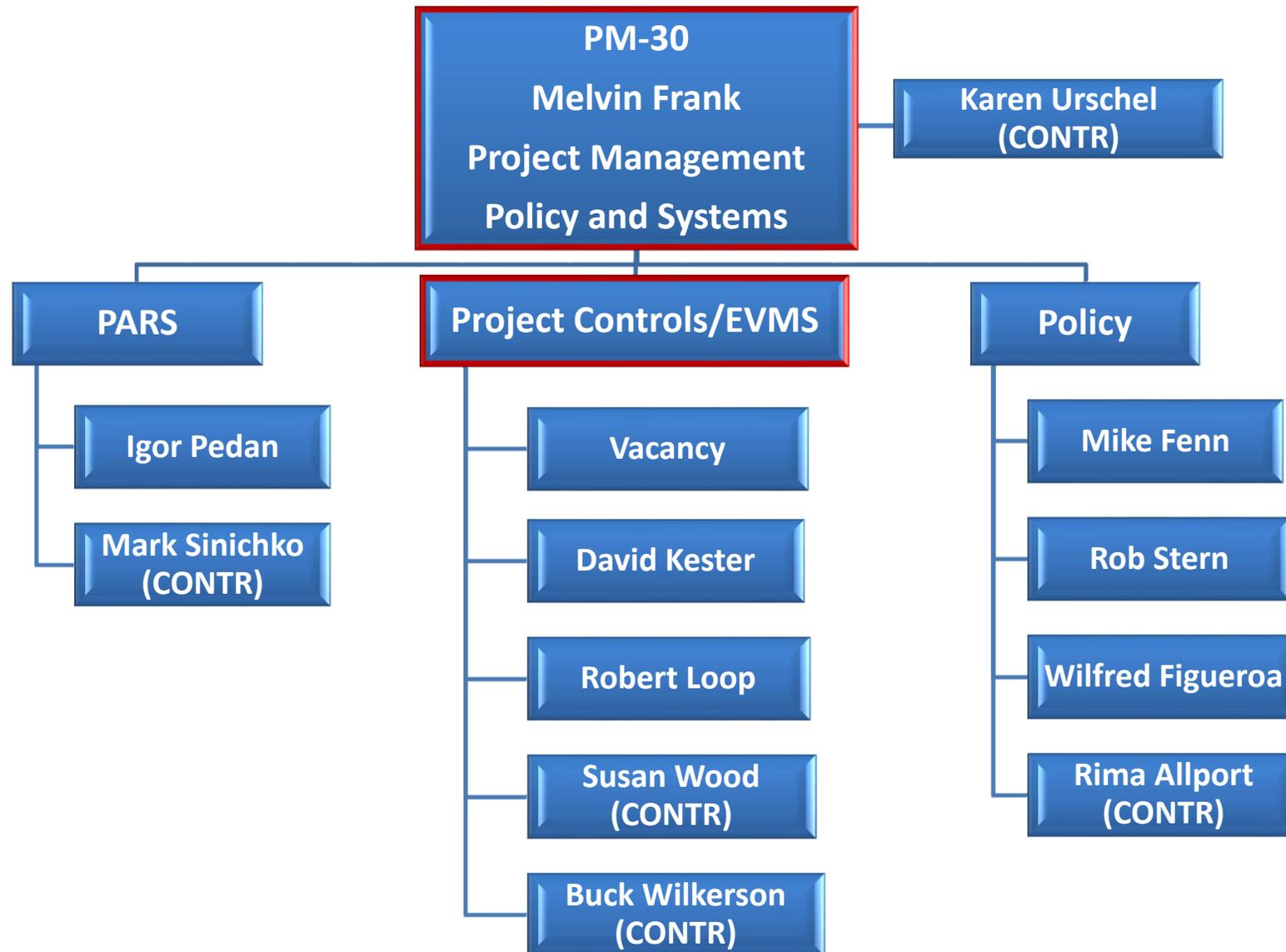
Office of Project Management Oversight and Assessments (PM)



Slide 2



PM-30 Organization Chart



EVMS Reviews – Then and Now

Evolution of Data Driven Approach



Slide 4

- **Past approach – Through 2010**
 - Assess contractor EVM system compliance during certification reviews and surveillances
 - Limited cost/schedule data analysis
- **Recent years – Since 2011**
 - Moved in direction of risk-based, data driven approach
 - Roll-out of PARS II and Assessment-Focused Standard Operating Procedures
- **Recent surveillances have improved over past in identifying system issues**
 - Data traces demonstrate shortcomings in system integration between areas (budgeting, scheduling, work authorization, etc.)
 - More work on systematic data analysis driven process
- **Current goal is fully automated data analysis to flag areas of concern**

EVMS Issues to Overcome

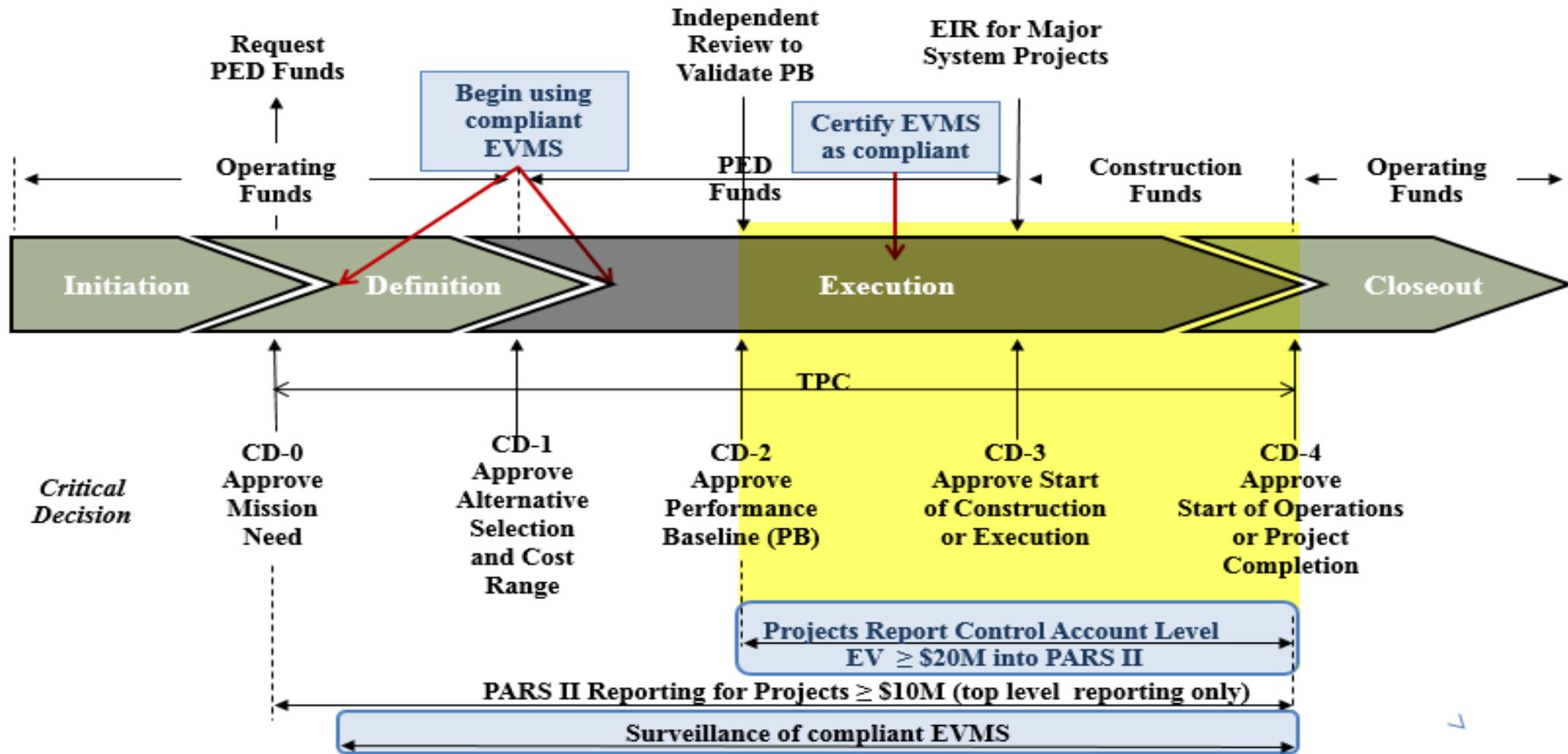


- **Attitude that EVMS is merely a reporting tool – NOT a project management tool**
 - Not used for front-end planning
 - Scope/cost/schedule not integrated
 - Risks not identified/managed
 - Comprehensive Baseline Reviews not conducted
- **Invalid project schedule**
 - Not predictive; inaccurate progress assessments
- **Baseline manipulation to mask performance**
 - 1.0 CPI/SPI mentality
 - MR/Contingency and Budget/Funds confusion
- **Significant Total Project Cost increases not forecast by EVMS**
 - EAC not realistic nor inclusive of entire scope



Integrated EVM / PM Acquisition Lifecycle

EVM is Integral to DOE's PM Philosophy from CD-0 to CD-4



Typical DOE Acquisition Management System for Line Item Capital Asset Projects

Priority Tasking Identified: FY15 Plan



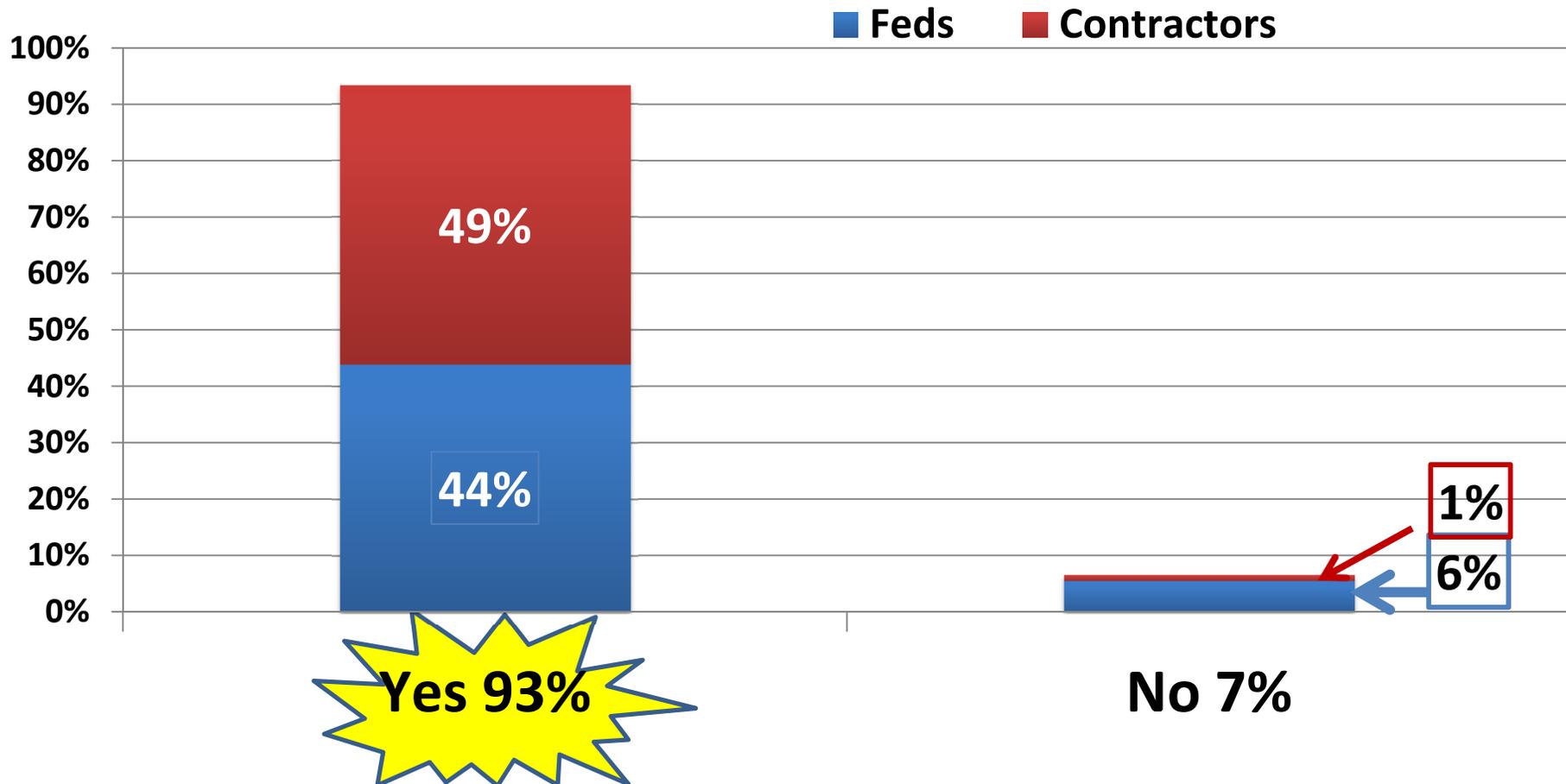
- **Develop FY 15 EVMS Strategic Plan**
 - Based on complete assessment of EVMS within DOE
 - Conducted by independent entity recognized and respected by government and industry as EVMS expert
 - Assess robustness and sufficiency of all policies, procedures, guidance, practices, training
 - Conduct a competency assessment and gap analysis (knowledge, skills and abilities)
 - Assess sufficiency of resources and organizational construct (staffing levels and distribution)
 - Conduct Root Cause Corrective Actions for all EVMS issues and concerns

TO BE THE BEST

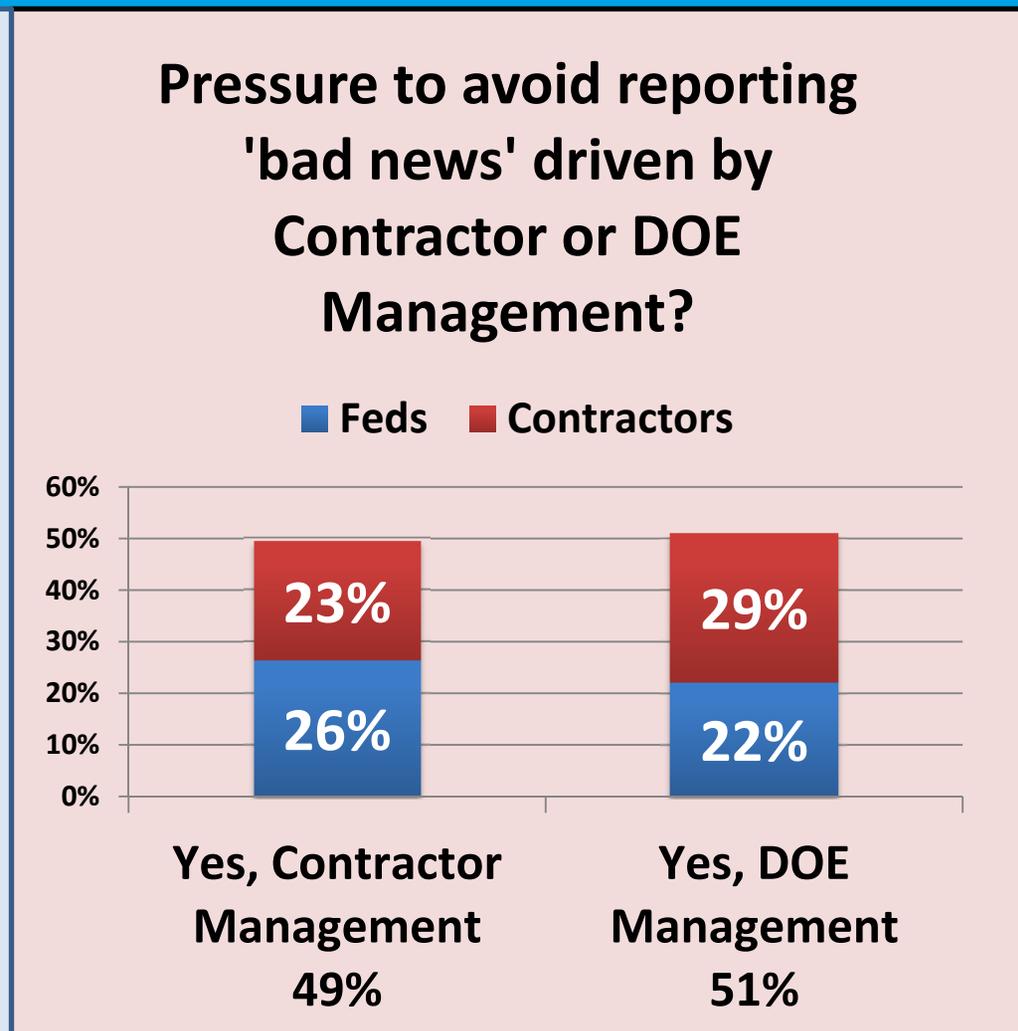
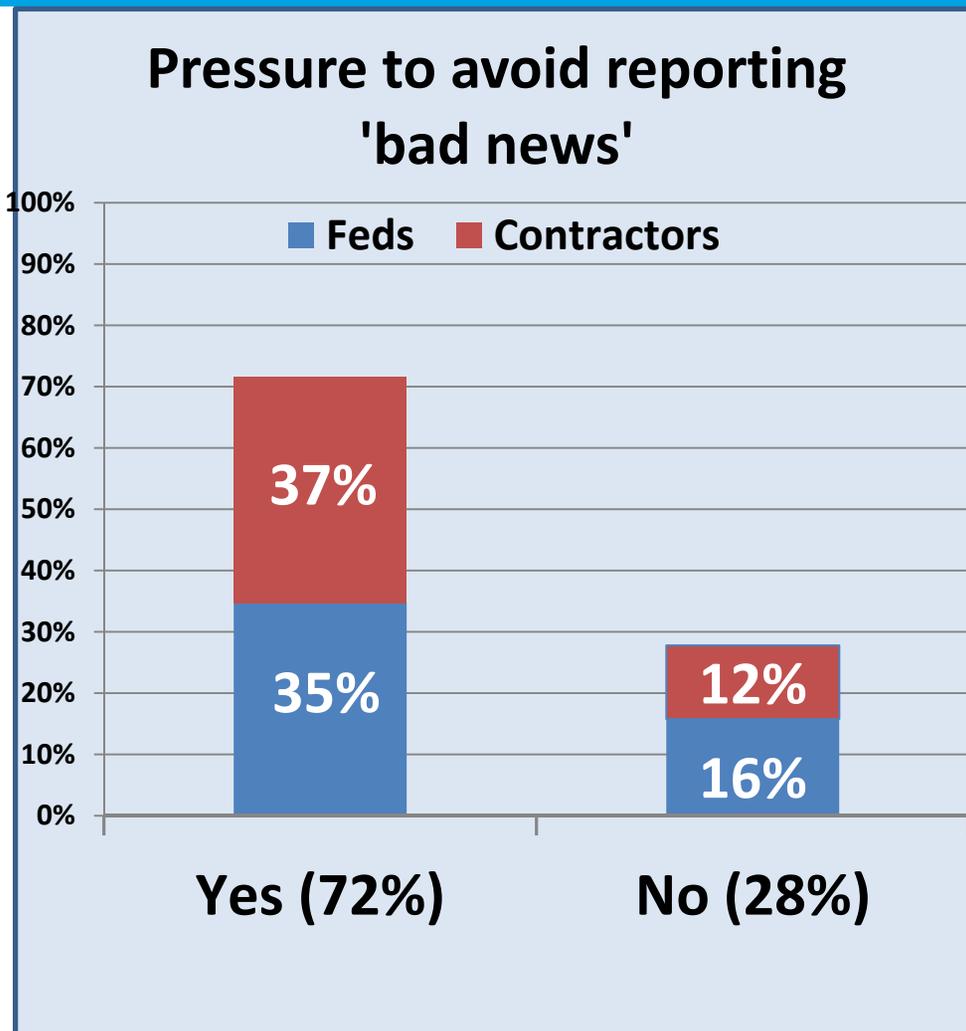
Improving Integration of PM and EVM Study: Survey Results



Do EIA-748 compliant EVM Systems provide data to make management decisions and forecasts?



It is all good news until it isn't . . .



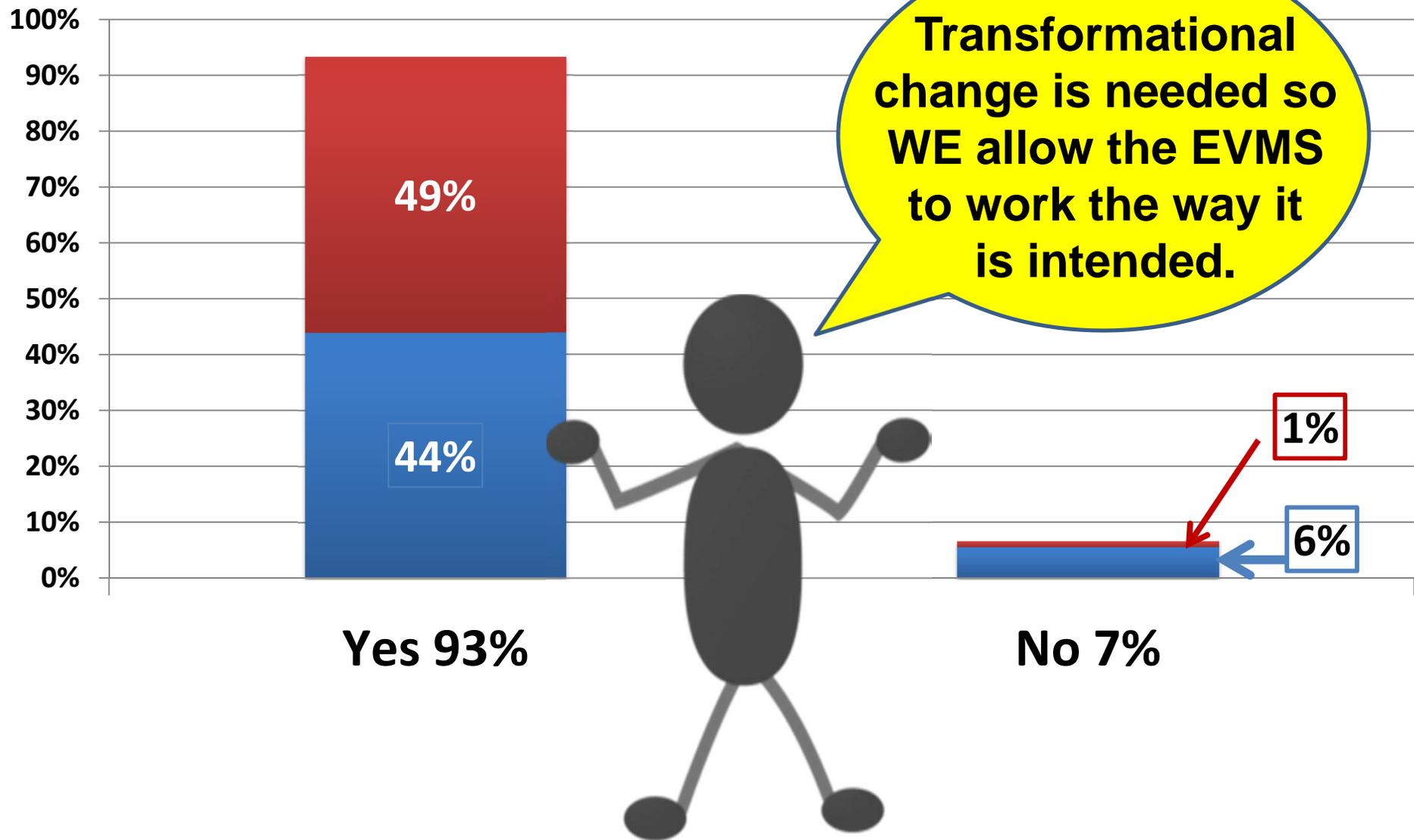
Comments Re: Reporting Bad News



Slide 11

- **(F) Bad news tends to be punished way more than is warranted, and this drives a “hide and seek” behavior, which is detrimental to both DOE/NNSA’s priorities, as well as the contractor’s.**
- **(C) Too much trying to get around EVMS or trick the system with huge WPs and CAs and long durations that cannot be used for real analysis.**
- **(C) Pressure by local DOE to “BCP to Green”. They do not want the project to go Red in PARS II.**
- **(F) Very few of the headline challenged projects over the past few years were a surprise to anyone, so it also doesn’t help when so many run for cover – an example of behavior that sends the wrong message to those we want to be open and objective and timely in their reporting.**

Do EIA-748 compliant EVM Systems provide data to make management decisions and forecasts?





- **The primary message is clear (and no coincidence):**

CONSISTENCY

- **Increase consistency/reduce complexity regardless of who is assessing compliance (HQ PM, Project Management Support Office (PMSO), Federal Project Directors (FPD), or Contractor)**
 - Consistent application
 - Consistent execution
 - Consistent results



- **Transformational Change**
- **One Certifying Authority – Office of Project Management Oversight and Assessments (PM)**
 - O 413.3B Update Changes EVMS Thresholds
 - ≥\$100M: PM-led EVMS Review Team conducts certification and surveillance
 - <\$100M: PM-led Surveillance on an exception basis or at PMSO request
- **Focusing DOE Compliance Efforts**
 - EVMS Interpretation Handbook (EVMSIH)
 - Improvements
 - Tested in a Pilot Environment
 - Increased Automation
 - Standard Operating Procedures (SOPs)
 - Roadside Assist Visits (RSAV)
 - Communication
 - Collaboration



DOE EVMSIH UPDATES

(V1.0 - V2.0)



EVMSIH Important Considerations



Slide 16

- **Provide the necessary levels of interpretation to establish a consistent and clear definition of EIA-748 EVMS compliance**
 - Based on an understanding of historical precedence and the present day needs of project management that when fully implemented can successfully pass a DOE EVMS compliance review
- **EVMSIH based on the following authoritative sources:**
 - Bowman Guide
 - DCMA EVMIG and DCMA DIG
 - NDIA Intent Guide
 - DOD EVMSIG
 - NDIA IPMD PASEG
 - GAO Schedule Guide

Benefits of the EVMSIH Solution



Slide 17

- **Serves as a consistent, automated review standard**
- **Based on minimum expectations**
 - Qualifying Expectation Lines of Inquiry (QE LOI)
- **Establishes a basis for reciprocity expectations**
- **Provides flexibility for other CFAs to supplement for Agency-specific areas of concern**
- **Benefits the Entire EVMS Community**
 - Mandatory in DOE
 - Recommended/Shared with CAIWG



- **Authoritative body of knowledge for determinations of EIA-748 EVMS compliance**
 - September 2015: V1.0 Release
 - January 2016: V1.1 Release (DRAFT)
 - **August 2016: V2.0 Release**
- **V2.0 update defines minimum compliance requirements - some QE LOI preferences may be candidates for Continuous Improvement Opportunities (CIO)**
- **Revisions to the EVMSIH do not change the purpose and interpretation of compliance for each EIA-748 EVMS Guideline; however, testing protocols can alter significantly to help realize operating efficiencies.**
- **EVMSIH (3.0) – Agile, incremental release strategy tied to CNS EVMS Pilot Project results**

EVMSIH 2.0 – New Streamlined Look



EARNED VALUE MANAGEMENT SYSTEMS INTERPRETATION HANDBOOK EVMSIH (2.0)

U.S. DEPARTMENT OF ENERGY
OFFICE OF PROJECT MANAGEMENT
OVERSIGHT AND ASSESSMENTS (PM)
WASHINGTON, D.C.

AUGUST 2016



The Mission of the Energy Department is to Ensure America's Security and Prosperity by Addressing Its Energy, Environmental and Nuclear Challenges through Transformative Science and Technology Solutions

TABLE OF CONTENTS

<i>Approvals</i>	2
<i>Document Change Control</i>	7
<i>Preface</i>	8
<i>Foreword</i>	9
<i>1.0 Introduction</i>	11
<i>1.1 – Purpose Of The EVMSIH</i>	11
<i>1.2 – EVM Policy</i>	12
<i>1.3 – EVMS Compliance</i>	12
<i>1.4 – Content And Format Of The EVMSIH</i>	15
<i>1.5 – General Topics To Understand Guideline Intent</i>	18
<i>2.0 Organization</i>	20
<i>Guideline 1 – Define The WBS</i>	22
<i>Guideline 2 – Define The Project OBS</i>	26
<i>Guideline 3 – Integrate Subsidiary Management Processes</i>	28
<i>Guideline 5 – Integrate WBS/OBS To Create Control Accounts</i>	31
<i>3.0 Planning, Scheduling, And Budgeting</i>	35
<i>Guideline 6 – Scheduling Work</i>	38
<i>Guideline 7 – Identify Products And Milestones For Progress Assessment</i>	60
<i>Guideline 8 – Establish The Performance Measurement Baseline</i>	62
<i>Guideline 9 – Authorize And Budget By Cost Elements</i>	69
<i>Guideline 10 – Determine Discrete Work And Objective Measures</i>	73
<i>Guideline 11 – Sum WP/PP Budgets To Control Account</i>	83
<i>Guideline 12 – Level Of Effort (LOE) Planning And Control</i>	84
<i>Guideline 14 – Identify MR And UB</i>	86
<i>Guideline 15 – Reconcile To Target Costs</i>	90
<i>4.0 Accounting Considerations</i>	92
<i>Guideline 16 – Record Direct Costs</i>	93
<i>Guideline 17 – Summarize Direct Costs By WBS Elements</i>	100
<i>Guideline 18 – Summarize Direct Cost By OBS Elements</i>	102
<i>Guideline 20 – Identify Unit And Lot Costs</i>	104
<i>Guideline 21 – Track And Report Material Cost/Quantities</i>	106
<i>5.0 Analysis And Management Reports</i>	112
<i>Guideline 22 – Calculate Schedule Variance And Cost Variance</i>	113

EVMSIH 2.0 – New Streamlined Look



IMPACT OF NONCOMPLIANCE

Failure to link scope with the WBS may result in required work being omitted or unauthorized work being performed.

QE LOI DISCUSSION

1.A.1. IS A SINGLE PRODUCT-ORIENTED WBS USED FOR A GIVEN PROJECT EXTENDED TO THE CONTROL ACCOUNT LEVEL AS A MINIMUM?

The key aspect of this QE LOI is a single, product/deliverable-oriented WBS extended to the CA level at a minimum to integrate, plan, and manage the project work scope, schedule requirements. In all cases, the contractor must extend the WBS to a level needed for internal management control. This level should not be an arbitrary level established by the project. The WBS is a direct representation of the work scope of each specific project. The WBS documents the hierarchy and description of the activities to be performed and their relationship to the project deliverables. The WBS is used as a nomenclature that demonstrates integration of scope, schedule, and budget systems of the project. Therefore, only one WBS is acceptable. The WBS represents the complete project scope.

For projects involving scope content being implemented by other performing entities, the performing entities should also reflect this work content within the overall hierarchy of project work. If performing entities may, or may not have standard contractual arrangements, they are responsible for specified WBS elements through some type of directed agreement arrangement with DOE. This work content must also be subdivided to an appropriate level of product-oriented for project planning, control, and reporting. The resulting work elements must be clear and included within the project WBS under the correct hierarchical branches in just the prime contractor WBS elements.

As the end product is decomposed into smaller sub products at lower WBS levels, the required by each element can be identified to functional organization units at a lower level. At some level on each WBS branch, management will assign responsibility for schedule, and cost performance. It is at this intersection of WBS element and organization that a Control Account (CA) is usually established, work is scheduled, budget is planned, collected, and performance is measured, recorded and controlled. The technical requirements for each work product must be clearly specified and documented. As project is accomplished, actual completion and technical requirements can be verified.

The WBS level at which a CA is established is primarily a function of the size of the product type of product. The responsible organization level is a function of the management span and upper management's desire to delegate technical, schedule, and cost responsibility.

Filter and Sort on Testing Criteria by EIA-748 Guideline and QE LOI

Guideline 1 - Define the authorized work elements for the Program project. A work breakdown structure (WBS), tailored for effective internal management control, is commonly used in this process.					
A Work Breakdown Structure (WBS) is the structure and code that integrates and relates all project work (scope, schedule and cost). It is the cornerstone of effective project planning, execution, control, status, and reporting. All the work contained within the WBS is to be identified, estimated, scheduled, and budgeted. The WBS contains the scope baseline necessary to achieve the technical objectives of the work described. It is generally a multi-level framework that organizes and graphically displays elements representing the work to be accomplished in logical relationships. Relationships among WBS elements and detailed descriptions of each element are presented in the WBS dictionary accompanying the hierarchical diagram.					
#	Interpretive Discussion	Test Steps	Test Metric	Metric Threshold	Artifacts
I.A.1	<p>The key aspect of this QE LOI is a single, product/deliverable-oriented WBS extended to the CA level at a minimum to integrate, plan, and manage the project work scope, schedule and budget requirements.</p> <p>IMPACT OF NONCOMPLIANCE Without a single WBS that contains all authorized project work, the project cannot be properly planned, managed, and executed.</p>	<p>Manual Tests:</p> <p>1. Review the WBS and verify only one WBS structure is used for the project.</p> <p>2. Verify the WBS is a product oriented WBS consistent with the DOE PM Work Breakdown Structure (WBS) Handbook.</p>	<p>a. Compare the WBS Index to the WBS structure in the RAM, WADs, IMS, EVM Cost Tool, Control Account Plan (CAP), and the IPMR/CPR Format I and verify the WBS structure is consistent through the system.</p> <p>b. Using the previous trace artifacts, verify the WBS is extended to the control account level at a minimum.</p> <p>c. Identify any WBS elements that are not part of the project scope. If present, these WBS elements should not be considered for purposes of...</p>	<p>Document all discrepancies as compliance concerns</p>	<p>Project WBS Index, WBS Dictionary, RAM, WADs, IMS, EVM Cost Tool, CAP, IPMR/CPR (CDRL)</p> <p>Project WBS Index, WBS Dictionary, RAM, WADs, IMS, EVM Cost Tool, CAP</p> <p>Project WBS Index, WBS Dictionary, SOW and/or Performance Work Statement (PWS)</p> <p>WBS Dictionary, DOE PM WBS Handbook</p>



Partnering to Pilot the DOE EVMSIH





- **Pilot Project:**

- Allows CNS to participate in and contribute to the development of EVMSIH compliance protocols, while **working towards obtaining DOE EVMS compliance credentials**
- Simultaneously facilitate the **development of testing methods and automated solutions** that focus on identifying management processes and quality issues
- Establishes a **collaborative laboratory-type environment** to develop and test the EVMSIH, while understanding the commercial practices used in managing projects

Core Team Roster Participants



Slide 23

- **Mel Frank – PM30**
- **David Kester – PM30**
- **Karen Urschel – PM30**
- **Wayne Harris – PM30**
- **Luis Contreras – PM30**
- **Buck Wilkerson – PM30**
- **Igor Pedan – PM30**
- **Sandi Tracy – CNS**
- **Kevin McGuire – CNS**
- **Sarah Blakey – CNS**
- **Lisa Frank – CNS**
- **Brooke Ratliff – UPF**
- **Paul Tackett – UPF**
- **Mike Blake – Bechtel**
- **Pamela Brooker – SRR**
- **Steve Dismuke - CNS**
- **Jeff Fronzak – LANL**
- **Craig Hewitt – RL**
- **Anita Hirschy – ETTP**
- **Mike Lassiter – NPO**
- **Derek Lehman – RL**
- **John Clayton - UPO**
- **Patrick Milliken – WTP**
- **Rick Millikin –
CHPRC/EFCOG**
- **John Newberry – UPF**

Concept of Operations



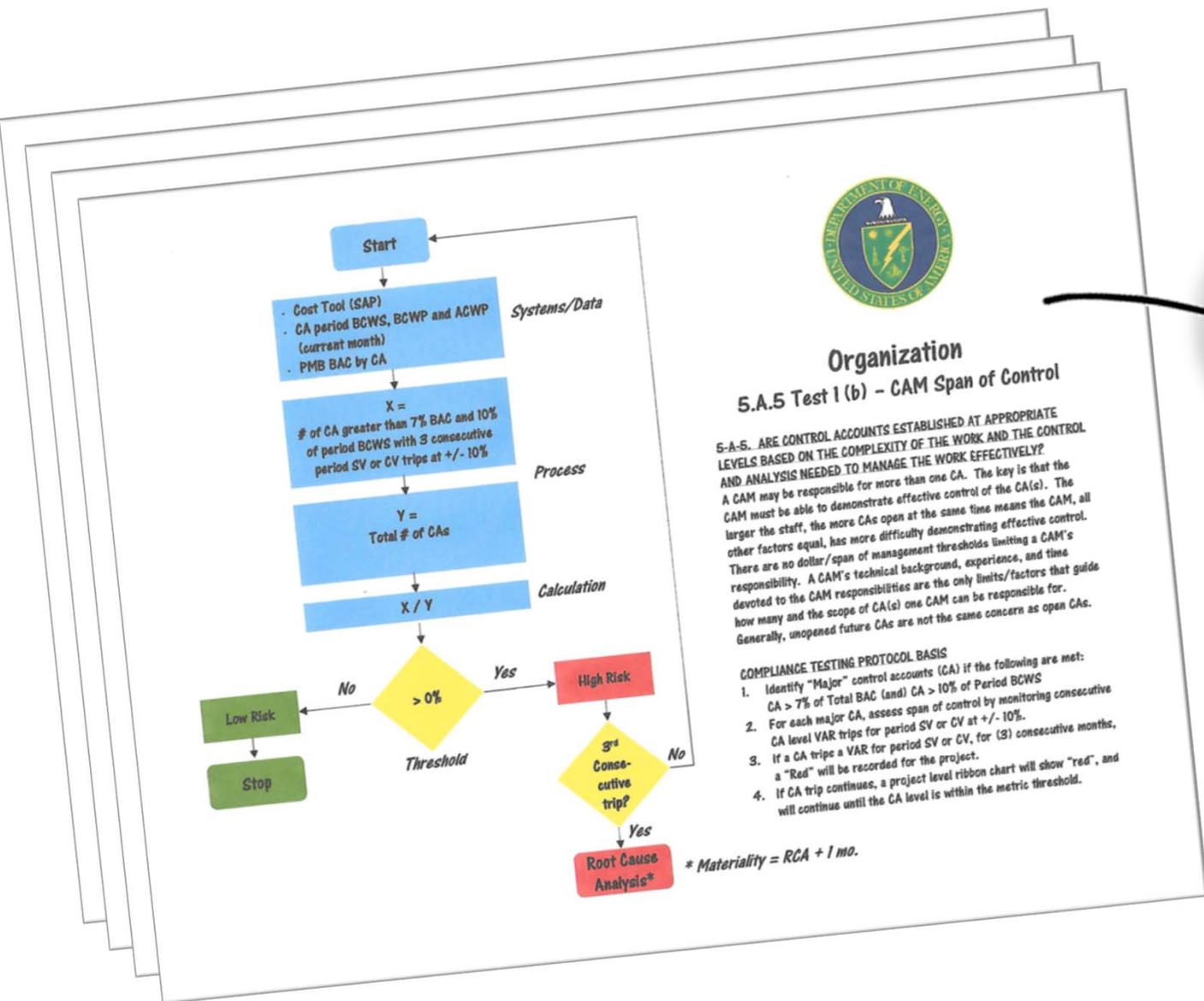
Slide 24

- **PM, as the lead for the CNS Pilot Project, is the final decision authority with respect to defining and determining EIA-748 EVMS compliance**
- **The scope requires mutual support by DOE HQ, NNSA, DOE Field Offices, EFCOG (as applicable), and CNS to successfully complete the pilot project objectives**
 - Championing a culture of project management excellence and use of EVM as a necessary and viable project management practice
 - Collaborating on ways to help effect change and openly address problem areas that impact full EVMS implementation
 - Dedicating resources, and making the Pilot Project a high priority
 - Providing full and open access to business systems, data, and other pertinent information
 - Providing full and open access to key personnel



- **Progress made towards the successful completion of Pilot schedule IMP events and accomplishments**
 - Compliance Reference Checklist (EVMS Description)
 - LOI Testing Protocol Flowcharting
 - Automation of Testing Protocols
 - QE LOI Burndown
 - QE LOI Test Results
 - Gap Analysis (Fishbone)
 - Action Item Closures
 - Full EIA-748 Compliance (CNS DOE Compliance Credentials)
 - EVMSIH 3.0 (Streamlined)

Pilot Flowcharting Process for EVMSIH 3.0



Organization 5.A.5 Test 1 (b) - CAM Span of Control

5-A-5. ARE CONTROL ACCOUNTS ESTABLISHED AT APPROPRIATE LEVELS BASED ON THE COMPLEXITY OF THE WORK AND THE CONTROL AND ANALYSIS NEEDED TO MANAGE THE WORK EFFECTIVELY?
A CAM may be responsible for more than one CA. The key is that the CAM must be able to demonstrate effective control of the CA(s). The larger the staff, the more CAs open at the same time means the CAM, all other factors equal, has more difficulty demonstrating effective control. There are no dollar/span of management thresholds limiting a CAM's responsibility. A CAM's technical background, experience, and time devoted to the CAM responsibilities are the only limits/factors that guide how many and the scope of CA(s) one CAM can be responsible for. Generally, unopened future CAs are not the same concern as open CAs.

- COMPLIANCE TESTING PROTOCOL BASIS
1. Identify "Major" control accounts (CA) if the following are met:
CA > 7% of Total BAC (and) CA > 10% of Period BCWS
 2. For each major CA, assess span of control by monitoring consecutive CA level VAR trips for period SV or CV at +/- 10%.
 3. If a CA trips a VAR for period SV or CV, for (3) consecutive months, a "Red" will be recorded for the project.
 4. If CA trip continues, a project level ribbon chart will show "red", and will continue until the CA level is within the metric threshold.

```

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    </head>
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```

Coding is the Critical Path to Pilot and DOE EVMS Mission Success

Master Plan and Schedule



Slide 27

- **The period of performance of this Charter is expected to last from May 2016 through March 2017**
 - EVMS Pilot Project 05/02/16 - 03/31/17
 - EVMS PP Approval 05/02/16 BL 05/02/16 A
 - Kick off (@ Oak Ridge, TN) 05/16/16 BL 05/16/16 A
 - Organization Assessment 07/15/16 BL 09/12/16 A
 - Planning, Scheduling Assessment 08/29/16 BL 09/26/16 A
 - Analysis Assessment 10/10/16 BL 11/16/16 F
 - Revisions Assessment 11/07/16 BL 12/29/16 F
 - Accounting Assessment 12/21/16 BL 02/23/17 F
 - Indirect Assessment 12/21/16 BL 02/23/17 F



Results and Observations

- **Good team chemistry and collaboration – reaching consensus, getting results**
- **Consideration of Commercial Best Practices being weighed against EIA-748 EVMS compliance requirements**
- **A significant number of QE LOI Test Metrics have been removed from EVMSIH 2.0**
 - 52% reduction of tests through Rev & Data Maintenance
 - Remaining 99 tests, assuming no reductions, would result in an overall 44% reduction

	EVMSIH 2.0	Totals Through Revisions & Data Maintenance		Accounting & Indirects <small>(scheduled for review 11.7.16 to 11.18.16)</small>	Total Including Accounting & Indirects <small>(Assumes no reductions)</small>
		EVMSIH 2.0	Pilot Program	EVMSIH 2.0	Pilot Program
LOI	134	103	80	31	111
Test Steps	345	292	154	53	207
Test Metrics	597	498	238	99	337

Q1 QE LOI Stats

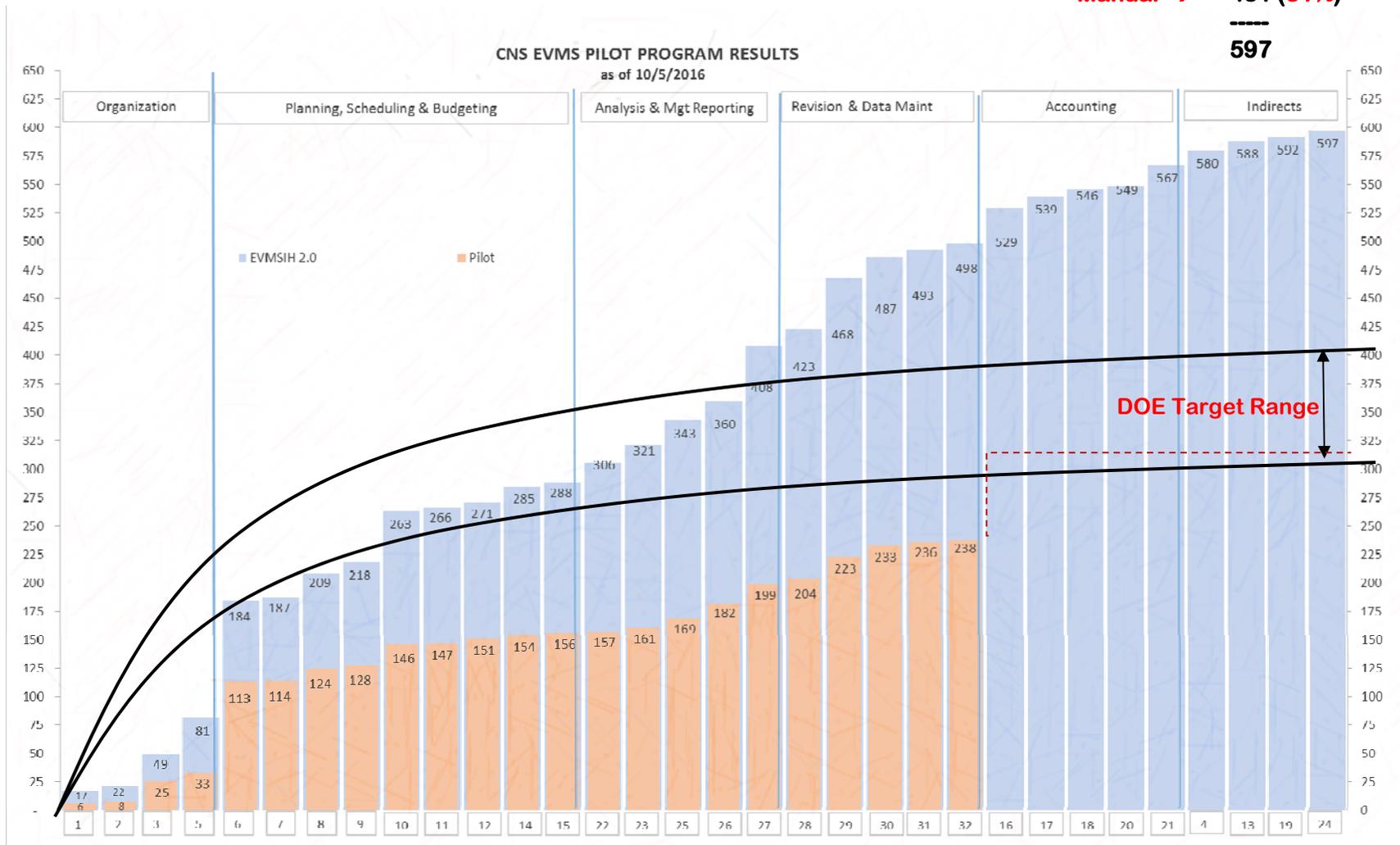


EVMSIH 2.0 Test Metrics

Auto → 116 (19%)

Manual → 481 (81%)

597



Final Thoughts



Slide 30

- **Still working towards a March 2017 completion date; adjustments needed to schedule**
- **Active Compliance Review Underway**
- **Commitment and Automation Remains Key to Success**
- **Next visit scheduled for 07-18 November 2016 (Accounting & Indirects)**
- **Interviews of CAMs and PM to begin with the next visit**
- **Clarification of expectations are being identified to both the EVMSIH and CNS EVMSD**
- **Integration with EIR and Other Reviews**
- **Incorporation of New Technologies**

CNS Compliance Considerations



EVMS Compliance Considerations



Slide 32

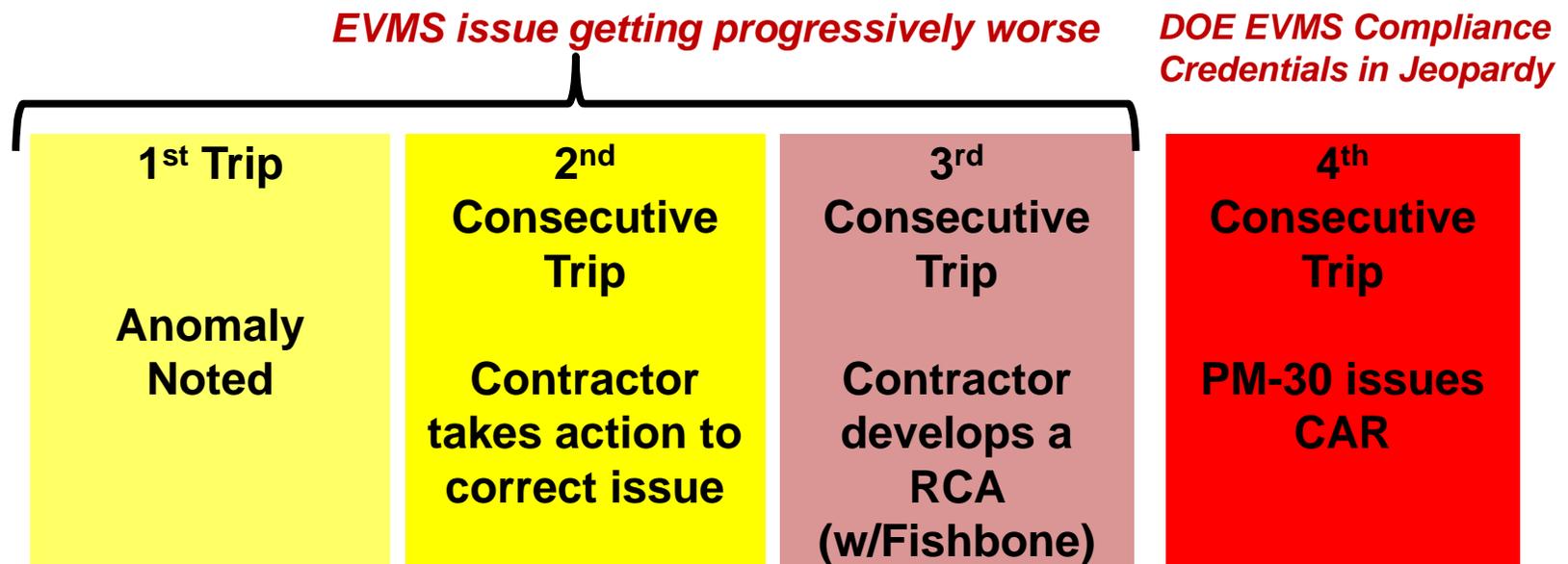
- **DOE EVMS Compliance assessment is organized by the five guideline areas with Indirects broken out separately**
- **Compliance assessment is accomplished through data analysis, data traces, and manager interviews**
 - ✓ – Whether descriptive processes and practices are compliant with EIA-748 guidelines
 - ✓ – Whether descriptive documents containing policies and procedures are followed in the actual execution of work
 - ✓ – How the data and information are generated by the EVM System
 - ✓ – How the data are used in the decision making and management of the project
 - ✓ – Managers' knowledge of EVM System content, roles and responsibilities

EVMS Compliance Considerations



- **Process Approach**

- EIA-748 compliance definitions are translated into testing protocol flowcharts and developed for each QE LOI
- ‘Tripped’ testing thresholds indicate an anomaly exists that may require further review and explanation
- Definition of thresholds or tolerance levels **consider the materiality of the breach**



Analysis Tool Evolution



Tools Used by PM-30 for Review



Slide 35

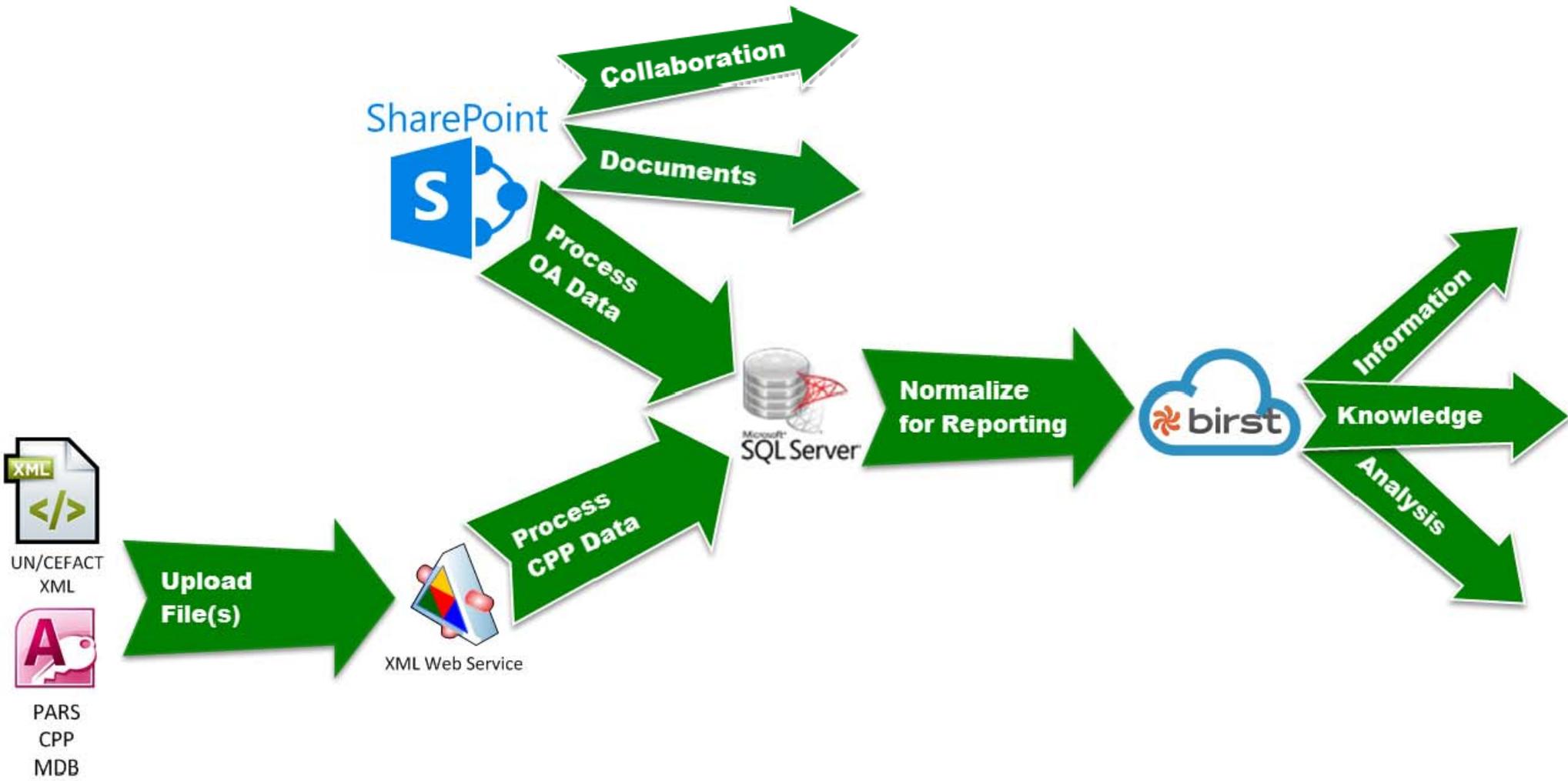
- **PM-30 Toolkit**

- P6
- Deltek Acumen Fuse
- MS Office Professional including MS Access
- Contractors not required to use these same tools
 - However, these are what PM-30 uses to test compliance
 - Making available to all when complete
 - Most tests can be replicated in other tools and each test is defined to make this achievable

- **PM-30 Toolkit in Future**

- PARS II will be upgraded to incorporate most if not all of the DOE EVMSIH Automated Tests
- P6
- Validating tests as we conduct RSAVs, Reviews, etc.

PARS II Path Forward



Collaboration and Communication





Standard Operating Procedures (SOPs)

- **EVMS Review (ERSOP)** 
 - Applies to Certification, Implementation, Review for Cause, Surveillance, ICE, EIR, and Project Peer
- **Independent Cost Estimate/Review (ICE/ICRSOP) and External Independent Review (EIRSOP)** 
 - Added EVM perspective for Performance Measurement Baseline (PMB)
 - Focus on technical assessment of scope, schedule, budget to establish a logical, realistic, and executable baseline
- **Project Peer Review (PPRSOP)** 
 - EVM-related focus:
 - Achievability of cost and schedule baselines
 - Assess project status
 - Assess project management control systems
- **EVMS Corrective Action SOP (ECASOP)**
 - Detailed instructions on:
 - Corrective Action Requests (CARs) and Continuous Improvement Opportunities (CIOs) processes
 - Assessment of contractors procedures and implementation associated with Variance Analysis Reports (VARs) and Corrective Action Plans (CAPs)
- **EVMS Project Analysis SOP (EPASOP)**
 - Update after PARSII enhancements

Roadside Assist Visit (RSAV)



Slide 39

- **HQ Comes to the Sites**
- **Work together with EFCOG members towards a *common goal* of effective EVMS implementation**
 - Provide a chance for DOE personnel and EFCOG members from the various different sites to discuss their work in progress towards EVMS compliance
 - Review government requirements and expectations for EIA-748 EVMS compliance and to discuss new methods and automated toolsets to maximize their usefulness to the whole community
 - Discuss how to improve project management by the way we think about (and use) EVMS data and information

Roadside Assist Visit (RSAV)



Slide 40

- **Focus on EVMSIH Planning, Scheduling, & Budgeting**
 - Topics
 - Techniques
 - Quality Checks
- **Share Automated Test Results**
- **Opportunity to Discuss Site and Contractor Questions**



Integrated EVM / PM Acquisition Lifecycle

EVM is Integral to DOE's PM Philosophy from CD-0 to CD-4

- Guideline 1 – Define Work Scope (WBS)
- Guideline 2 – Define Project Organization (OBS)
- Guideline 3 – Integrate Processes
- Guideline 4 – Identify Overhead Management
- Guideline 5 – Integrate WBS/OBS to Create Control Accounts
- Guideline 6 – Schedule with Network Logic**
- Guideline 7 – Set Measurement Indicators**
- Guideline 8 – Establish Budgets for Authorized Work**
- Guideline 9 – Budget by Cost Elements**
- Guideline 10 – Create Work Packages, Planning Packages**
- Guideline 11 – Sum Detail Budgets to Control Account
- Guideline 12 – LOE Planning and Control
- Guideline 13 – Establish Overhead Budgets
- Guideline 14 – Identify Management Reserve and Undistributed Budget
- Guideline 15 – Reconcile to Target Cost Goal
- Guideline 16 – Record Direct Costs
- Guideline 17 – Summarize Direct Costs by WBS Elements
- Guideline 18 – Summarize Direct Costs by OBS Elements
- Guideline 19 – Record/Allocate Indirect Costs
- Guideline 20 – Identify Unit and Lot Costs
- Guideline 21 – Track and Report Material Costs and Quantities
- Guideline 22 – Calculate Schedule Variance and Cost Variance
- Guideline 23 – Identify Significant Variances for Analysis
- Guideline 24 – Analyze Indirect Cost Variances
- Guideline 25 – Summarize Information for Management
- Guideline 26 – Implement Corrective Actions
- Guideline 27 – Revise Estimate at Completion (EAC)
- Guideline 28 – Incorporate Changes in a Timely Manner
- Guideline 29 – Reconcile Current to Prior Budgets
- Guideline 30 – Control Retroactive Changes
- Guideline 31 – Prevent Unauthorized Revisions
- Guideline 32 – Document PMB Changes

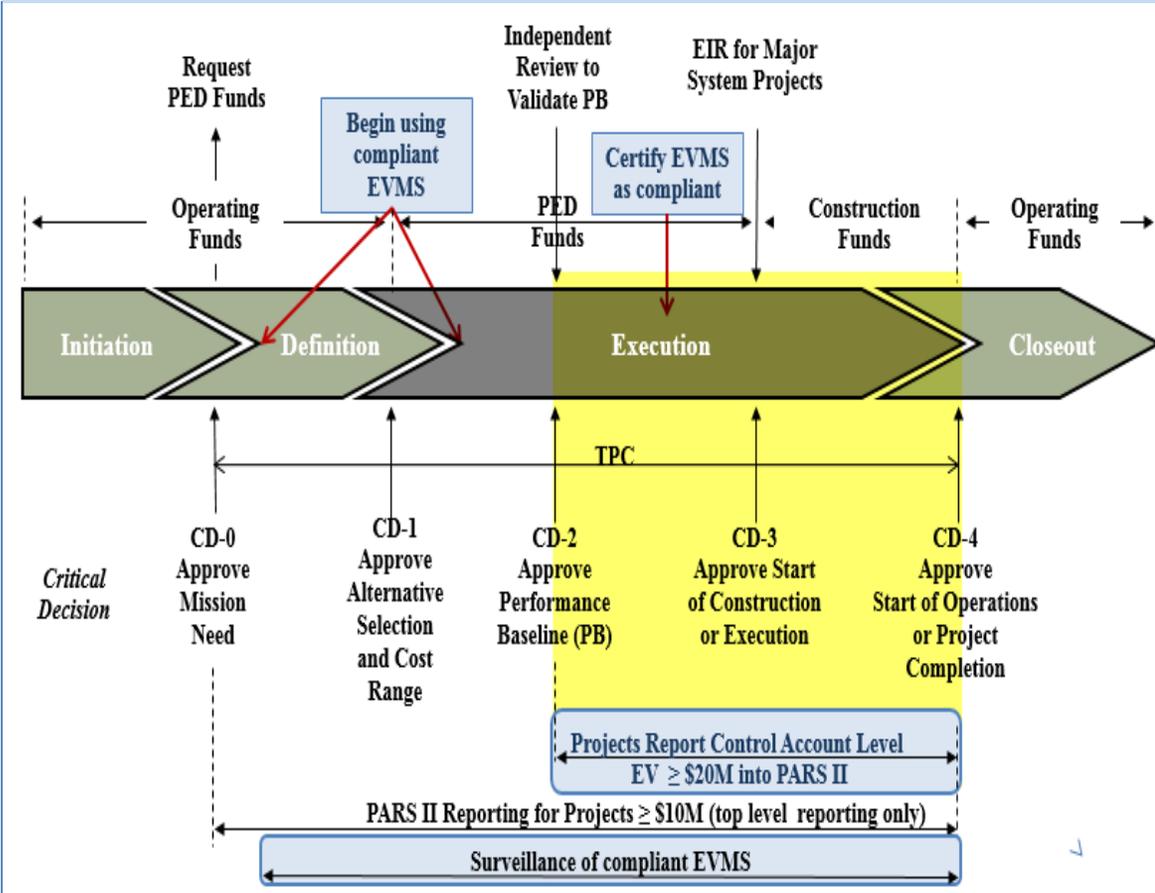
Organize

**Planning
Scheduling
Budgeting**

Accounting

Analysis

Revisions



Typical DOE Acquisition Management System for Line Item Capital Asset Projects

Appearing at an RSAV Near You!



Slide 42

- ★ LANS (1/11/16)
- ★ SRNS/PGS/SRR (2/22/16)
- ★ CNS/UCOR (3/7/16)
- ★ CHBWV/FBP (4/4/16)
- ★ WIPP/NWP (7/21/16)
- ★ RL/ORP (8/8/16)
- ★ CNS/Pantex (TBD)
- ☆ SPRO/FPO (Q2FY17)
- ☆ NTS/NSTec (Q2FY17)
- ☆ LLNL/LLNS (TBD)
- ☆ INL/BEA (TBD)
- ☆ SNL/Sandia (TBD)





- **RSAV**
- **Teaming with EFCOG**
- **Webinars**
- **Newsletters**
- **Rolodex of Project Controls Federal and Contractor POCs**
- **And last but not least, Project Controls Workshops**
 - Spring Project Management Workshops (Day 3)
 - Fall Integrated Program Management Workshop (DOE Track)





- **Transparency of Data Analysis via Monthly PARS II (Central Data Repository)**
 - Visible to Individual Contractors
 - We see what they see...and...They see what we see!
 - Allows contractors to take the initiative to course correct before DOE steps in
- **Opens Door for true and effective Self-Governance**
 - Reduced Government Oversight
 - Puts the contractual EVMS compliance oversight back on the Contractor



- **DOE approach serves as a consistent, automated review standard**
 - Minimizes differing opinions of the reviewer
 - Streamlines assessment from event-driven to monthly; from behind closed doors by assessors to transparency
- **Based on minimum expectations**
- **Excellent basis for self-governance**
- **Establishes a basis for reciprocity expectations**
- **Allows for flexibility for other CFAs to supplement for Agency-specific areas of concern**
- **Benefits the Entire EVMS Community**
 - Mandatory in DOE; Recommended/Shared with CAIWG, PARCA



EARNED VALUE MANAGEMENT

- Project Management
- Earned Value Management**
- EVMS Guidance
- EVM SMEs
- Training
- Glossary of Terms & Acronyms
- Career Development (PMCDP)
- Policy Development
- Information Systems



KEY RESOURCES

- PMCDP
- EVMS
- PARS IIe
- FPD Resource Center
- PM Newsletter
- Forms and Templates

The mission of the DOE Earned Value Management website is to educate and train on theory and practice of Earned Value Management, and use it as an integrated Project Management process.

Earned Value Management (EVM) is a systematic approach to the integration and measurement of cost, schedule, and technical (scope) accomplishments on a project or task. It provides both the government and contractors the ability to examine detailed schedule information, critical program and technical milestones, and cost data.

- Integrates scope, cost, and schedule, with risk management
- Allows objective assessment and quantification of current project performance
- Helps predict future performance based on trends

DOE INITIATIVE TO IMPROVE INTEGRATION OF EVM AND PM

- [DOE EVMS Survey Results Report](#)
- [EVM/PM Integration Improvement Recommendation Report](#)