



Condition Assessment and Performance Measurement Strategies for Roads

2004 Facilities and Asset Management Conference
“Stewardship of Federal Assets – United Commitment to Excellence”
Orlando Florida
May 4-6, 2004

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Presentation Outline

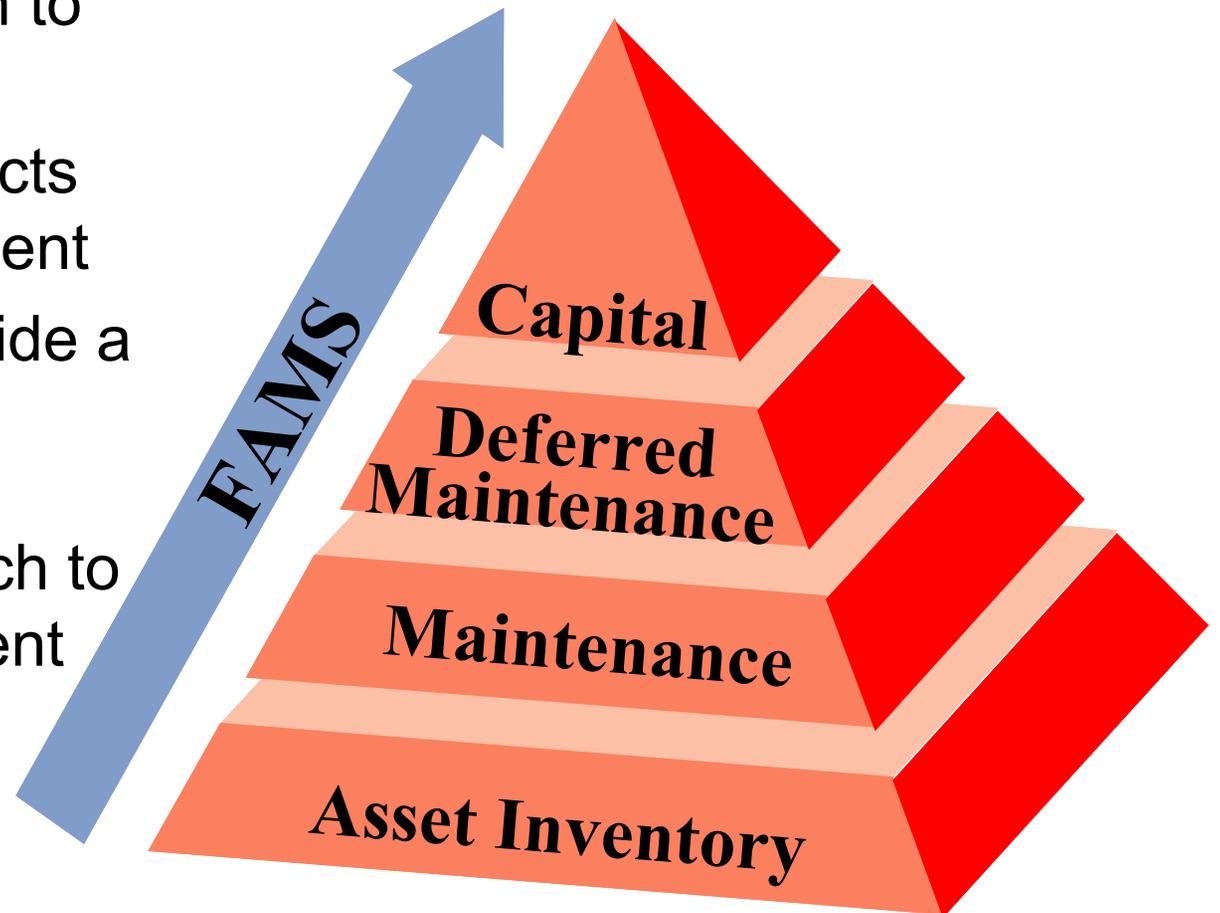
- **Overview** - BLM “*Stewardship Strategy*”
- **Background** – Not Your Typical Road...
- **Objective** – Reasonable, Consistent, and Auditable Results
- **Approach** – Asset Management for Roads
- **Performance Metrics** – Internal and External Gauges of Success
- **Challenges and Lessons Learned** – Ideas and Answers
- **Summary**





Overview - BLM “Stewardship Strategy”

- Strategic approach to asset stewardship
- Integrates all aspects of asset management
- Developed to provide a **Reasonable, Consistent, and Auditable** approach to Facility Management





Background – BLM Roads

- 82,000 Miles of Roads
- Range from engineered asphalt paved roads through “user defined” two tracks
- Represents one of the Bureau’s most critical assets
- Provides access to:
 - ▶ Recreation
 - ▶ Fire Fighting, Search and Rescue
 - ▶ Internal Resource and Administrative Needs
 - ▶ Commercial Users





Objective – Asset Management Strategy for the Bureau of Land Management Roads

- Utilize a *Reasonable*, *Consistent*, and *Auditable* Approach
- Provide **Meaningful** yet **Cost Effective** Solutions
- Develop a **Scalable** methodology appropriate to BLM Roads
- **Coordinate** and **Integrate** the solution within the Bureau
- Develop **Consistency** between BLM methodology and other land management agencies with similar assets





Approach – Asset Management *for Roads*

- Bureau-Wide Strategy
- Accurate Asset Inventory
- Standardized Condition Assessment Process
- Reasonable Current Replacement Value
- Standardized Condition Indices



Every journey begins with the first step..



Approach – Bureau-Wide Strategy

- Develop “Business Rules” as Baseline
- Partner with Other Stakeholders
 - ▶ Recreation
 - ▶ Fire
 - ▶ Forest Service and DOI Agencies
- Identify Key Asset Management Data for All Users
- Integrate with Current and Planned Initiatives
- Utilize Methodology Consistent with Other Asset Management Efforts





Approach – Standardized Asset Inventory

- Provides the **Foundation** for Asset Management
- National Standard for Asset Inventory
- Minimum National Data Requirements
 - ▶ Exception Policy
 - ▶ Based on “What it takes to manage the asset”
- Supports Facility Asset Management System Implementation





Approach – Condition Assessment Process

- Road “Stratification” Value Proposition
 - ▶ Inspect Maintenance Level 3 - 5
 - ▶ Allow for “discovery” and “reported” Deferred Maintenance on Maintenance Level 1 - 2
- Baseline Condition Assessment of all roads by Fall 2007
- **Reasonable, Consistent, and Auditable** process
- Standardized Inspection Process and Protocols for all Inspections
- Training for Inspection Teams and BLM “Sustainment” personnel





Approach – Current Replacement Value

- Challenges Associated with Development of a CRV
 - ▶ Many roads have no design or construction cost
 - ▶ Users (public and federal) have “created” roads
 - ▶ Roads lack a consistent Design Standard
 - ▶ Only federal investment is maintenance
- Strategy for Consistent and Meaningful Approach
 - ▶ Standardize CRV by Maintenance Level
 - ▶ Calculate cost of creating similar road adjacent to current road as a valid estimate of CRV





Performance Metrics

- Internal

- ▶ Deferred Maintenance per Mile by Maintenance Level
 - Maintenance Level represents priority for road use
 - Define standards within each Maintenance Level for “Good-Fair-Poor”
- ▶ Number of Miles by Maintenance Level in Good-Fair-Poor

- External

- ▶ Facility Condition Index
- ▶ Maintenance Level Priorities
- ▶ Number of Miles Maintained





Challenges and Lessons Learned

● Challenges

- ▶ Developing consistent standards and methodologies
- ▶ Integrating a wide range of stakeholders
- ▶ Addressing Federal Land Highway Program Requirements (Public Roads)
- ▶ Calculating a Current Replacement Value

● Lessons Learned

- ▶ Don't "reinvent the wheel"
- ▶ It is easy to try to collect too much (Simpler IS Better)
- ▶ Performance Standards provide focus and consistency





Summary

- The “*Stewardship Strategy*” provides a consistent and integrated plan across the Bureau
- Minimizing Inventory requirements to essential information has immediate and long term benefits
- Condition Assessment standards must provide efficient, maintainable answers to succeed
- Consistency in determining CRV is critical to good Performance Metrics
- Typical Performance Metrics are not designed for un-surfaced Roads



Reasonable, Consistent, and Auditable



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