

How “a” Government Program Manager Manages a Program

Mr. Mark Malatesta (Tauri Group)
NDIA Joint Government-Industry Day
15 April 2015

Backdrop

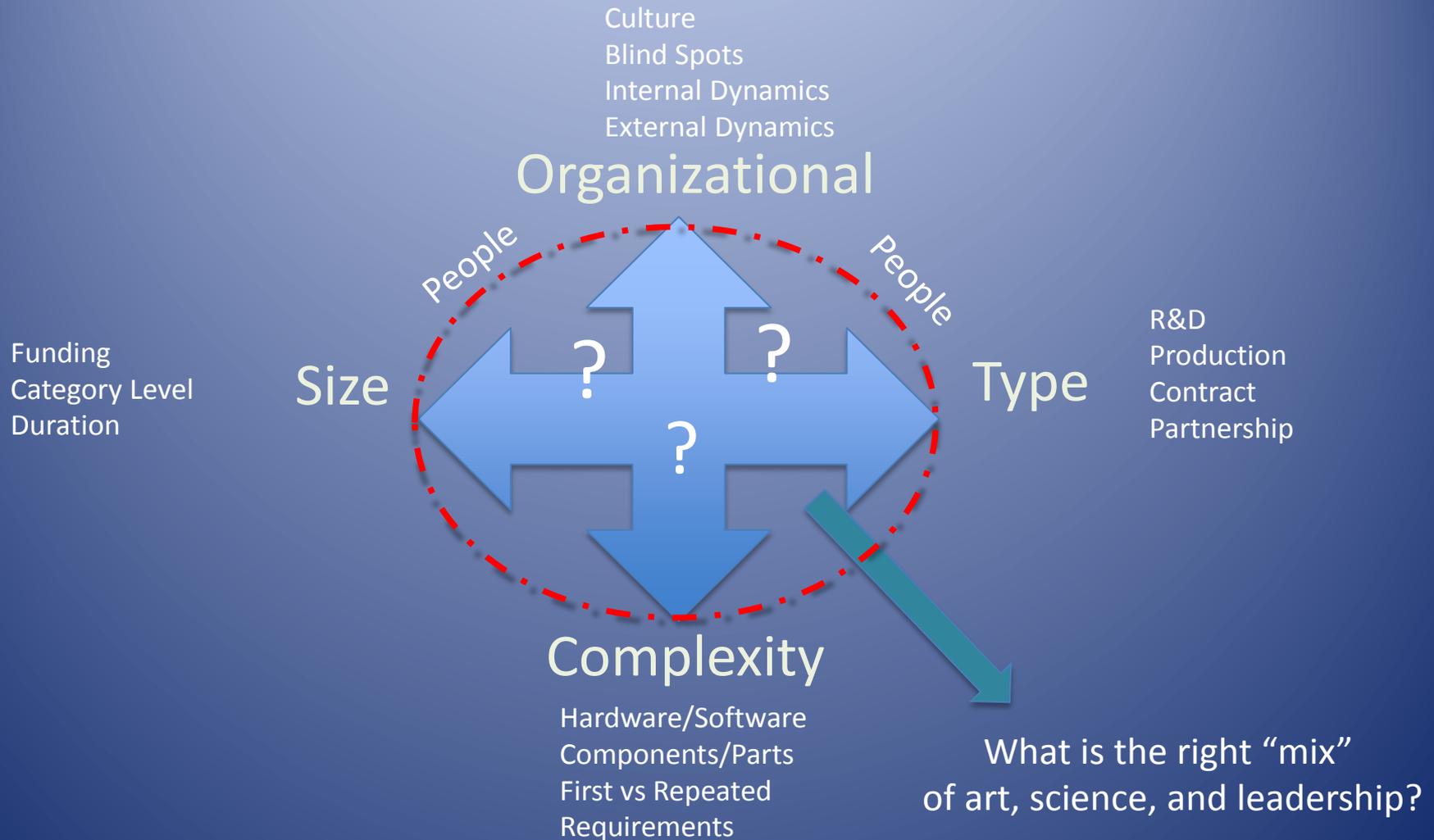
- The current environment demands getting it right at the established cost (cost is not a variable in execution)
 - Its about the right & complete Acquisition Strategy (Contract).
- Requires a return to “Blocking and Tackling”
 - For many years it was a varied XX% solution—as fast as possible.
 - Deviations were fairly normal (and relatively painless).
- There is continuous evaluation of need vs capability vs cost.
- While the environment has definitely changed some driving policies/practices are not exactly aligned to maximize the desired outcome.
 - Execution Requirement/Goals
 - Contracts and Tests/Validation

An appropriate environment for Layered Program Management

Premise

- There is no recipe for success—but rather its the expert application of program management science, art and leadership
- Custom developed upfront for each program
 - Updated in execution
- Embrace the science—Master the art—Be the leader
- It begins, progresses and ends with people—actually its all about people
- Be ready to terminate a program-when necessary (and the right thing to do)

Program Environment



What are the Root Causes of “Problem Programs” —Some Insight from a Snapshot

Dominant:

- **(57%) Poor management performance**
 - Systems engineering
 - Contractual incentives
 - Risk management
 - Situational awareness
- **(36%) Baseline cost and schedule estimates**
 - Framing assumptions
- **(21%) Quantity changes** outside acquisition community’s control

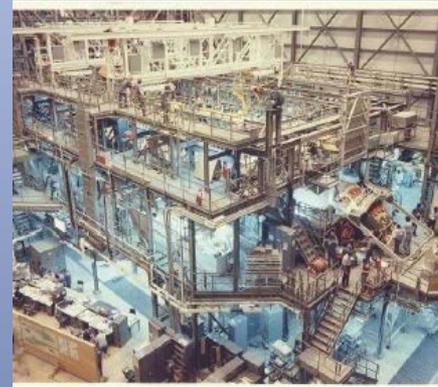


Suggests in part a shortfall in Program or
Phase Design/approach

Infrequent:

- Once each
 - Immature technology, excessive manufacturing, or integration risk
 - Unrealistic performance expectations
 - Unanticipated design, engineering, manufacturing or technology issues.
- Never
 - Funding inadequacy or instability

What are some practices to improve program design from the start?



- Establish “Anchoring” Assumptions (a.k.a Framing)
- Incorporate Knowledge Points
- Robust Cost Estimate Goals--Ranges
- Robust Independent & Contrarian reviews
 - Internal
 - Rigorous
- Impactful Measurement techniques (minimum necessary)
- Trained, Motivated, and Experienced Team
- Management by Walking around and Talking (layered)

Anchoring (Framing) Assumptions

A Primer

- Requires detailed analysis.
- Generally includes factors directly tied to the program.
- Can be present, future, or program environment
- By definition if wrong, it should result in significant cost, schedule, or performance issues.
- Along with assumptions should identify the consequences & underlying estimating assumptions.
- Best to identify early indicators & criteria to ensure assumption is still correct (i.e. a design review, or milestone)

An Example:

- **Vendors will primarily integrate existing Mission Equipment Packages (MEP) onto a Modified Capital Asset (MCA) or a current existing chassis**
- **Re-furbish existing MCA or a current existing chassis to meet base vehicle performance specifications**
- **Design/Integrate/Host MEP for 5 mission roles**
- **Army provided MCA assist OEMs in achieving Average Unit Manufacturing Cost (AUMC) Target of \$1.8M**
- **Program will receive funding for two brigades per year in full rate production**
- **No requirement to protect the current tracked vehicle Industrial Base**
- **Requirements will remain stable**
- **Industry will trade lower tier requirements to manage cost**
- **Competition will encourage industry to control procurement cost**
- **Competition in production yields the best opportunity for cost savings**

Knowledge Points (KP)

- Provide a solid foundation for requirement refinement, cost estimating, and capability trade-off decisions.
- Goal is to gain knowledge in order to obtain a set of technically achievable, operationally relevant and affordable CDD requirements.
 - Also used to initiate further analysis to address problems raised at the KP.
- A KP is a pre-determined, event that is injected into the “requirement” revision process based on analysis or test results.
- Generally an incremental process.
- Leverages system engineering best practices.
- Co-owned by the government (developer and user)—along with the contractor.

Program level Execution Challenges

- Lack of planning in scheduling resources and activities
- Milestones not being met
- Substandard Quality Control
- Costs are increasing beyond control
- Inadequate coordination of resources
- Poor overall management
- Mis-management of progress
- Supplier Issues

Source: Why not implement EVM (Top Ten Reasons)

Predictive Measures I Tend to Emphasize

- Personnel:
 - Critical Skills (Churn/Dilution)
 - 80/20 rule?
 - Staffing Profiles
- Risk Assessment:
 - Risk & Opportunity vs Management Reserve
 - Risk Burn-down (adapted)
- Requirement Metrics:
 - Requirement Completeness
 - Volatility
 - Traceability
- Quality/Supply Chain
 - Acceptance Rates

Generally used in conjunction with MBTWA or Reviews

My Thoughts on EVM

- Should be part of a program's manager's tool box
 - Useful for “internal” process insight.
- If used—generally should be as a component of a broader management or oversight approach.
- Value really depends on its set-up, adoption, and expertise.
 - Resources required vs Cost vs Benefit.
- In my experience had significant latency
- Hard to get the right data for Fixed Priced Contracts

Management by Talking and Walking Around (MBTWA)

- Reports do not pick-up everything (miss quite a bit)
- Essential to understanding the “heartbeat” of the program
- Lead fairly and with passion--it will have favorable impact
- Inspire (Demand) your team to do the same

People

- The 80/20 rule is true—the goal is to keep it above or close to 20%
 - Individualized leadership
 - Develop them
- The good ones get moved around
- You do get the “B” team—and that is fair--the key is how do you deal with it
 - Know when it happens
 - Try to change it—negotiate and do not take “No” for an answer

Terminate a Program

- A PM is supposed to champion a program but—he/she must retain objectivity
 - Lose objectivity—and you may have a “blind spot”
- Bad Programs definitely—Good programs sometimes
 - Can't be turned around
 - Do not meet the requirement
 - Just cannot afford it
 - Politics

Summary

- Programs are unique and must be custom developed
 - It takes art, science, and management
- Think critically about the program
 - Set-up has the biggest impact
 - Know it from different views
- Management requires a layered approach for optimum outcome
- People are the core of the program
- “Fold-em” when appropriate