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Straight Talk: Major Program Manager Views of Defense Acquisition

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#### **Preface & Acknowledgements**

During his internship with the Graduate School of Business & Public Policy in June 2010, U.S. Air Force Academy Cadet Chase Lane surveyed the activities of the Naval Postgraduate School's Acquisition Research Program in its first seven years. The sheer volume of research products—almost 600 published papers (e.g., technical reports, journal articles, theses)—indicates the extent to which the depth and breadth of acquisition research has increased during these years. Over 300 authors contributed to these works, which means that the pool of those who have had significant intellectual engagement with acquisition issues has increased substantially. The broad range of research topics includes acquisition reform, defense industry, fielding, contracting, interoperability, organizational behavior, risk management, cost estimating, and many others. Approaches range from conceptual and exploratory studies to develop propositions about various aspects of acquisition, to applied and statistical analyses to test specific hypotheses. Methodologies include case studies, modeling, surveys, and experiments. On the whole, such findings make us both grateful for the ARP's progress to date, and hopeful that this progress in research will lead to substantive improvements in the DoD's acquisition outcomes.

As pragmatists, we of course recognize that such change can only occur to the extent that the potential knowledge wrapped up in these products is put to use and tested to determine its value. We take seriously the pernicious effects of the so-called "theorypractice" gap, which would separate the acquisition scholar from the acquisition practitioner. and relegate the scholar's work to mere academic "shelfware." Some design features of our program that we believe help avoid these effects include the following: connecting researchers with practitioners on specific projects; requiring researchers to brief sponsors on project findings as a condition of funding award; "pushing" potentially high-impact research reports (e.g., via overnight shipping) to selected practitioners and policy-makers; and most notably, sponsoring this symposium, which we craft intentionally as an opportunity for fruitful, lasting connections between scholars and practitioners.

A former Defense Acquisition Executive, responding to a comment that academic research was not generally useful in acquisition practice, opined, "That's not their [the academics'] problem—it's ours [the practitioners']. They can only perform research; it's up to us to use it." While we certainly agree with this sentiment, we also recognize that any research, however theoretical, must point to some termination in action; academics have a responsibility to make their work intelligible to practitioners. Thus we continue to seek projects that both comport with solid standards of scholarship, and address relevant acquisition issues. These years of experience have shown us the difficulty in attempting to balance these two objectives, but we are convinced that the attempt is absolutely essential if any real improvement is to be realized.

We gratefully acknowledge the ongoing support and leadership of our sponsors, whose foresight and vision have assured the continuing success of the Acquisition Research Program:

- Office of the Under Secretary of Defense (Acquisition, Technology & Logistics)
- Program Executive Officer SHIPS
- Commander, Naval Sea Systems Command
- Army Contracting Command, U.S. Army Materiel Command
- Program Manager, Airborne, Maritime and Fixed Station Joint Tactical Radio System



- Program Executive Officer Integrated Warfare Systems
- Office of the Assistant Secretary of the Air Force (Acquisition)
- Office of the Assistant Secretary of the Army (Acquisition, Logistics, & Technology)
- Deputy Assistant Secretary of the Navy (Acquisition & Logistics Management)
- Director, Strategic Systems Programs Office
- Deputy Director, Acquisition Career Management, US Army
- Defense Business Systems Acquisition Executive, Business Transformation Agency
- Office of Procurement and Assistance Management Headquarters, Department of Energy

We also thank the Naval Postgraduate School Foundation and acknowledge its generous contributions in support of this Symposium.

James B. Greene, Jr. Rear Admiral, U.S. Navy (Ret.) Keith F. Snider, PhD Associate Professor



### Panel 14 - Major Programs: The Good, the Bad, and the Ugly

#### **Thursday, May 12, 2011**

9:30 a.m. -11:00 a.m.

Chair: Vice Admiral W. Mark Skinner, USN, Principal Military Deputy, Assistant Secretary of the Navy (Research, Development, & Acquisition)

An Assessment of the DoD's 2010 Portfolio of Major Defense Acquisition **Programs** 

Michael Sullivan, GAO

Cost and Time Overruns for Major Defense Acquisition Programs: An Annotated Brief

> David Berteau, Guy Ben-Ari, Joachim Hofbauer, Gregory Sanders, Jesse Ellman, and David Morrow, Center for Strategic & International Studies

Straight Talk: Major Program Manager Views of Defense Acquisition Roy Wood and Al Moseley, DAU

Vice Admiral W. Mark Skinner—Principal Military Deputy, Assistant Secretary of the Navy, (Research, Development & Acquisition). Vice Admiral Skinner assumed his duties August 9, 2010.

Skinner was born in Houston, Texas and graduated from the United States Naval Academy in June 1977.

As a flag officer, he was the program executive officer for Tactical Aircraft Programs and commanded Naval Air Warfare Center, Weapons Division, and served as assistant commander, Test and Evaluation, Naval Air Systems Command. Skinner held both operational and shore commands, to include commanding officer Patrol Squadron 47, chief test pilot and commanding officer of Naval Force Aircraft Test Squadron, and program manager for a chief of naval operations special project.

He is a graduate of the Navy Test Pilot School and served in Force Warfare Aircraft Test Directorate, where he was recognized as Directorate Test Pilot of the Year in 1986. Additionally, he received a degree in Financial Management from the Naval Postgraduate School, where he graduated as a Conrad Scholar and was awarded the Department of Navy award for excellence in financial management and the Rear Admiral Thomas R. McClellan award for excellence in administrative sciences.

His awards include Legion of Merit (3 awards), Meritorious Service Medal (4 awards), Navy Commendation Medal (2 awards), Navy Achievement Medal, and other unit deployment citations and ribbons.

#### Straight Talk: Major Program Manager Views of Defense Acquisition

Roy Wood—Dean, Defense Systems Management College, Defense Acquisition University. A retired Navy Engineering Duty Officer, Dr. Wood has experience in shipboard combat systems remote sensing, high energy lasers, and missile defense. He holds a BS degree in computer science from Texas A&M University, master's degrees in engineering and business, and a PhD in organization and management. His dissertation dealt with program manager competencies. [roy.wood@dau.mil]

Al Moseley—Professor, Program Management, Defense Acquisition University, Fort Belvoir, VA. An Air Force veteran, Dr. Moseley has over 26 years of experience in leadership and program management positions in the acquisition of military systems to include space, communication, command and control, and air traffic systems. He holds a BS degree in electrical engineering from Tuskegee University, Tuskegee, AL, an MS degree in electrical engineering from the Air Force Institute of Technology, Dayton, OH, and a Doctor of Strategic Leadership degree from Regent University, Virginia Beach, VA. [Alphronzo.moseley@dau.mil]

#### Abstract

Current efforts by the Office of the Secretary of Defense (OSD) and the Under Secretary of Defense for Acquisition, Technology, and Logistics (USD[AT&L]) to improve acquisition outcomes are focused on addressing perceived problems that create inefficiencies in major programs. Program Manager (PM) Forums were established by senior acquisition leaders within OSD to hear directly from a sampling of major PMs to help key OSD leaders understand PM perspectives and issues. This study analyzes the results from six PM Forums attended by 148 major PMs between November 2007 and November 2010, and it provides a synthesis and presentation of current programmatic issues and trends.

#### Introduction

The Department of Defense (DoD) plans to spend about \$189 billion for its acquisition programs in fiscal year 2011 and increase its investment in procurement during that period by nearly 8%, from \$105 billion to \$113 billion (Congressional Research Service, 2010). Although the DoD's submarines, destroyers, combat ships, carriers, fighter aircraft, missiles, and helicopters are widely regarded as unrivaled in superiority, for decades, many of the DoD's weapon systems acquisitions have experienced—and continue to experience—schedule delays and cost overruns (GAO, 2006). These overruns not only cost taxpayers, but they have also undermined the warfighting capabilities of U.S. military forces. The individuals responsible and accountable for the health of weapon systems acquisitions are the program managers.

The nation depends on program managers to be able to effectively and efficiently run major, complex weapon systems acquisitions. Yet, today's program managers face unprecedented challenges. Wartime threats are asymmetrical and evolve quickly. Weapon systems are increasingly sophisticated, networked, and interdependent. Development cycles that need to be faster are often slowed by legitimate changes in warfighting requirements, extensive oversight, and ever more complicated laws, regulations, and business practices.

In November 2007, OSD acquisition leaders established PM Forums to help them better understand the most pressing issues PMs believe they are facing. Since then, there have been six PM Forums, attended by a total of 148 major program managers. This paper



analyzes the results of those six PM Forums and provides a synthesis and presentation of programmatic issues and trends as viewed by the program managers at the tip of the execution spear.

#### Literature Review

#### The Role of the Program Manager

A program manager (PM) is the "designated individual with responsibility for and authority to accomplish program objectives for development, production, and sustainment to meet the user's operational needs" (DAU, 2009, p. 15). Accountable to the DoD's Milestone Decision Authority (MDA), the specific role of the PM is as follows:

> To direct the development, production, and initial deployment (as a minimum) of a new defense system. This must be done within limits of cost, schedule, and performance, as approved by the PM's acquisition executive. The PM's role, then, is to be the agent of the military service or Defense agency in the defense acquisition system to ensure the warfighter's modernization requirements are met efficiently and effectively in the shortest possible time. (DAU, 2009, p. 15)

For management purposes, all defense acquisition systems fall into one of three Acquisition Categories, or ACAT levels:

- Acquisition Category I, or Major Defense Acquisition Program (MDAP): a program with a designated value of more than \$365 million in research. development, test, and evaluation expenditures or more than \$2.19 billion in procurement expenditures.
- Acquisition Category II: a program with a designated value of more than \$140 million in research, development, test, and evaluation expenditures or more than \$660 million in procurement expenditures.
- Acquisition Category III: a program that does not meet either Acquisition Category I or II criteria. (DAU, 2009, p. 20)

DoD policy requires that a PM be designated for each acquisition program. The PM for the most complex ACAT I programs are typically military officers at the grade of O-6 or senior civilians at the GS-15 level. In 2009, there were 102 Acquisition Category I programs in the unclassified domain (Carter, 2009). ACAT I PMs are confronted with the dynamic challenge to deliver the most complex and expensive systems on time and under budget with superior warfighting performance.

#### Challenges in Defense Acquisition

In 1985, the Packard Commission was charged by President Ronald Reagan to conduct a comprehensive defense management study of the budgeting process, procurement system, legislative oversight, and organizational and operational arrangements among Congress, the Office of the Secretary of Defense (OSD), the Joint Chiefs of Staff (JCS), the Military Departments, and the regional commanders (A Formula for Action, 1986). The commission report concluded that there were fundamental and systemic problems within the defense acquisition system creating major undesired consequences. It reported the following:

> These problems are deeply entrenched and have developed over several decades from an increasingly bureaucratic and overregulated process. As a result, all too many of our weapon systems cost too much, take too long to

develop, and, by the time they are fielded, incorporate obsolete technology. (A Formula for Action, 1986, p. 5)

Given the complicated management environment involving many stakeholders as well as internal and external pressures on the DoD, the commission report also concluded that PMs spent the majority of their time briefing and reporting on their programs, rather than managing them. The report stated,

> In effect, [the PM] is reduced to being a supplicant for, rather than a manager of, his program. The resulting huckster psychology does not condition the program manager to search for possible inconsistencies between performance and schedule, on the one hand, and authorized funding, on the other. Predictably, there is a high incidence of cost overruns on major weapon systems programs. (A Formula for Action, 1986, p. 5)

Twenty-five years later, with few systemic improvements to the underlying system, PMs are still faced with the dual challenges of managing both an extremely complex program and a bloated and bureaucratic acquisition system in search of the sweet spot among performance, schedule, and authorized funding. Some of the obstacles identified by the Packard Commission were reiterated in a later study: the 2006 Defense Acquisition Performance Assessment, or DAPA study. These include the following:

#### **Unstable Acquisition System**

A major PM challenge is operating in an unstable acquisition system. The 2006 DAPA report refers to this as government-induced instability. It is a cycle unto itself: unpredictable program cost, schedule, and performance beget leadership that loses confidence in the acquisition system, which begets more intervention and oversight, which begets adjustments in budget and schedule requirements. This cycle can begin with requirements developers who specify system performance that is well beyond what the technological state-of-the-art can deliver in the needed timeframe. Acquisition teams can also create undisciplined and escalating derived requirements, which in turn drive costs beyond the program's baseline. Comptrollers are often asked to "fix" a broken portfolio of programs, unilaterally adjusting program budgets and creating additional "churn" in planning and execution. These behaviors significantly add cost and lengthen development and production cycles (Kadish, 2006).

#### Requirements and Resources Gaps

Another major PM challenge is gaps between requirements and resources that are often not closed before or during program development. It is no secret that the DoD starts more acquisition programs than it can ultimately afford, creating an environment in which PMs must continually compete for funding. Winners proceed on plan, but losers must restructure their programs on the fly to continue to execute within the reduced funding. Stretching program schedules, reducing numbers or capabilities of systems, or reducing testing are all favorite ways to do this but have serious downstream impacts to costs, deliveries, and capabilities. It should also come as no surprise that DoD programs often proceed past milestones with immature technologies. Perverse incentives exist in the system to reward a program that proceeds without really knowing whether its technologies will work as intended. Once programs are started and have the initial commitment of funding, stakeholder advocates will continue to support the programs because their continuation benefits communities, constituents, and contractors (GAO, 2005).



#### Little Control Over Funding

Another major PM challenge is little control over funding. In other words, PMs cannot count on stable funding. When funding cuts happen, and they often do, PMs spend hours addressing funding-related problems to their senior acquisition leaders regarding impacts from these cuts that often translate to commitment challenges to contractors (GAO, 2005). Part of the problem is that in reality and practice, the budget, requirements, and acquisition system operate independently of each other rather than being efficiently integrated. In simplistic terms, the values of each are often misaligned with each other, as noted in the following:

- The...acquisition process values how to buy, striving to balance cost, schedule, and performance.
- The requirements process values the *why* and *what* to buy, focusing on obtaining the ability to achieve mission success at the lowest cost in lives.
- The budget process values how much and when to buy and focuses on control and oversight to balance the instability that advocacy creates. (Kadish, 2006, p. 4)

Indeed, many acquisition reform studies and initiatives have occurred alongside the Packard Commission and DAPA studies to address these and other acquisition issues.

#### More Acquisition Reform

The Weapon Systems Acquisition Reform Act (WSARA) of 2009 was passed by the 111th Congress on May 22, 2009. It made several changes to the acquisition process for acquiring Major Defense Acquisition Programs (MDAP) and Major Automated Information Systems (MAIS). Key provisions of the law include appointments of a Director of Systems Engineering, a Director of Cost Assessment and Program Evaluation (CAPE), and a Director of Developmental Test and Evaluation. It gave combatant commanders more influence in the requirements process, made changes to the Nunn-McCurdy Act pertaining to critical cost growth, and revised DoD conflict-of-interests guidelines for MDAP contractors (Weapon Systems Acquisition Reform Act of 2009, 2009).

An even more recent congressional acquisition reform initiative is the Implementing Management for Performance and Related Reforms to Obtain Value in Every (IMPROVE) Acquisition Act of 2010. While WSARA aimed to reform weapons system acquisitions, the IMPROVE bill's primary emphasis is on adding value in the acquisition of services and information technology programs. The act focuses on four specific areas: the defense acquisition system, the defense acquisition workforce, financial management, and the industrial base (Implementing Management for Performance and Related Reforms to Obtain Value in Every Acquisition [IMPROVE] Act, 2010).

Given the intense scrutiny and extensive acquisition reform initiatives over the years, why are there still problems and challenges for major PMs today? This study of PM Forums sought to hear directly from a sampling of major PMs and thereby gain a better understanding of the PMs' perspectives on the issues they face every day. A description of the methodology of this study follows.

#### Methodology

#### Sample

The target of this study was a group of invited PMs of ACAT I and II programs who attended the PM Forums from November 2007 to November 2010. This exclusive group of 148 senior (most were O-6 or GS-15 equivalent) program managers represented significant acquisition experience and provided a glimpse into their lived experiences on the front lines of the acquisition process.

#### PM Forum History

In February 2007, the Deputy Under Secretary of Defense for Acquisition and Technology (DUSD[A&T]) initiated the idea of a forum in collaboration with ACAT I PMs attending the executive PM course at the DAU. A central tenet of the forum would be "straight talk" directly from major PMs without the filters of Program Executive Officers and Service Acquisition Executives. This would allow PMs to convey, in a non-attribution environment, their unvarnished opinions of what was going well—and not so well—in the acquisition process and to seek OSD guidance and even resolution on tough programmatic issues.

In a memo dated September 26, 2007, the USD(AT&L) created the first PM Forum to be held in conjunction with the annual Program Executive Officer/Systems Command Commander's Conference in November 2007. Subsequent two-day forums have been held semi-annually, sponsored by the USD(AT&L) and hosted by the DAU at Fort Belvoir, VA.

#### Data Collection

Data have been collected from 148 PMs who attended the six PM Forums from November 2007 to November 2010. These PMs represented 12 defense acquisition agencies (see Table 1).

Table 1.	Number of PMs Attending Forum by Acquisition Defense Agency
	(Moseley, 2010)

Acquisition Agencies	Nov 2007	Apr 2008	Nov 2008	May 2009	Nov 2009	Nov 2010
BTA	1	2	0	2	0	0
DISA	3	4	3	3	1	2
DLA	0	0	2	0	0	0
MDA	2	3	2	2	1	0
NGA	1	1	0	1	1	1
NSA	0	1	0	0	2	1
USAF	8	6	3	5	4	3
USA	9	3	7	3	4	6
USN	5	4	5	4	5	6
USMC	1	1	1	1	1	2
USSOCOM	2	0	3	1	1	0
USTRANSCOM	0	0	2	0	0	0
Total	32	25	28	22	20	21

Services and agencies nominated approximately 30 major PMs to attend each forum. PMs were asked to be prepared to discuss their top three programmatic issues. The group is kept to a manageable number so that PMs can shape the forum dialogue with OSD



senior acquisition leaders. Forum rules value open, two-way communication and interactive discussions with a focus toward action-oriented outcomes.

Formulation of major PM issues was facilitated using a proven software tool called ThinkTank by GroupSystems. ThinkTank is a team collaboration tool used for innovation, decision-making, and leadership to enhance the performance of leaders in business, government, and professional services. Besides the DoD, the tool has been used by NASA, IBM, Proctor and Gamble, PricewaterhouseCoopers, and many others (GroupSystems, 2010). Utilizing a trained DAU facilitator, the software tool focuses on extracting the PMs' top programmatic issues through the process defined in Figure 1.

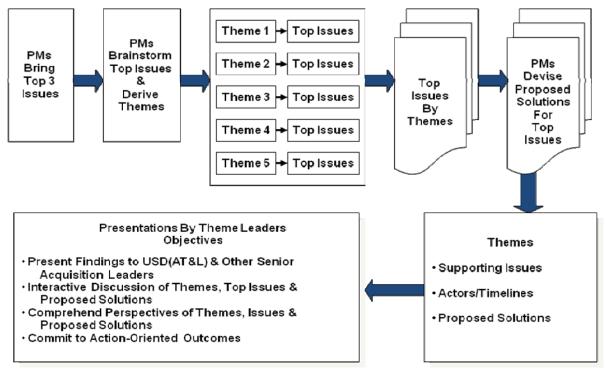


Figure 1. Formulation of Program Manager Top Issues and Proposed Solutions (Moseley, 2010)

During the sessions, the PMs enter their top three programmatic issues into ThinkTank and then brainstorm their entries into a set of common themes that emerge from the team discussions.

After the themes had been agreed upon, the PMs are divided into small teams. Each team selects a theme and a team leader, then builds a list of recommended solutions to the problems that have been identified within their theme. They create a presentation and present their findings to the larger group and the OSD officials. Each team's presentations include supporting issues, the actors required to assist in resolving the issues, the timeline for issue resolution, and the team's proposed solution set. During each presentation, the PMs engage in "straight talk" with the OSD senior acquisition leaders, who have shown a keen interest in understanding the PMs' perspectives and then have committed to actions based on the PM recommendations.

#### **Results and Discussion**

#### PM Straight Talk

Table 2 reports the summary of the major themes from the six PM Forums.

Table 2. **Summary of Major Themes From Six PM Forums** (Moseley, 2010)

8 Nov 2007 32 PMs	3 Apr 2008 25 PMs	6 Nov 2008 28 PMs	28 May 2009 22 PMs	5 Nov 2009 20 PMs	4 Nov 2010 21 PMs
OSD Policy & Staff	Funding Stability	Qualified/ Experienced Acquisition Workforce	IT Acquisition & Implementation	Manpower Skills & Knowledge Shortage	Requirements/ Testing
Requirements	People, Staffing & Skills	Funding & Contracting	Oversight & Excessive Documentation	Funding Instability & Minimal Reprogramming Authority (Reduces PM Flexibility & Mgt Control & Causes Frequent Program Restructures)	IT & Software- Intensive Systems
Program Management Resources	Speed of Acquisition	Controlling Requirements	Policy	Requirements Instability, Growth & Inadequate Definition Drive Cost & Schedule Execution Issues	Contracting: Process— Management— Procurement Timeline
Resources— Personnel	Integration, Interoperability & Interdependency	Inconsistent Policy & Oversight	Staffing & Personnel	Policy Unclear, Inconsistent, & Burdensome	Funding Flexibility & Workforce Experience
Lack of End- to-End System of Systems Engineering Process	Industrial Base		Requirements & Funding	Focus of OSD Staff Misplaced	Leadership Intent: Disconnected Implementation
Testing	Oversight/ Governance			Issues with Contracting & Industrial Base	
Industry	Requirements				

PMs captured major issues within each theme as supporting issues. For the supporting issues, PMs identified key stakeholders/actors that should help address or resolve the issues, and a set of proposed solutions for each issue. Since the supporting



issues derived from the major themes were too numerous to report in this paper, only a sampling of the major themes, subsequent supporting issues, and proposed solutions from only one of the many themes for each forum are presented.

PM Forum #1. Thirty-two PMs attended the November 2007 forum and reported the following major themes:

- Program Management Resources,
- OSD Policy and Staff.
- Requirements.
- Resources—Personnel,
- Lack of End-To-End System of Systems Engineering Process,
- Testing, and
- Industry.

Of the seven major themes, supporting issues and proposed solutions are provided for the major theme *Program Management Resources*. PMs were adamant that funding instability was affecting baseline management; there were "unfunded mandates" consisting of Unique Identification, Information Assurance, Net-Ready Key Performance Parameters, Selective Availability Anti-Spoofing Module/Global Air Traffic Management, and Mode 5/S Compliance; supplemental funding was driving the PMs to a higher ACAT oversight; and there was a lack of Service commitment for Joint programs. Table 3 shows the PMs' supporting issues and proposed solutions for major theme *Program Management* Resources.

Table 3. PMs' Supporting Issues & Proposed Solutions for Program Management Resources (Moseley, 2010)

Supporting Issues	Proposed Solutions
Funding Instability	<ul> <li>Permit multi-year procurement authority</li> </ul>
Affecting Baseline	<ul> <li>Support for baseline adjustments caused by external stakeholders</li> <li>Permit capital funding</li> </ul>
Unfunded Mandates	<ul> <li>Any policy issued must have funding to implement</li> <li>Communicate required funding impact review with Services</li> </ul>
Supplemental Funding	<ul> <li>Industrial Base is not always able to execute the funding</li> <li>Waive ACAT I program documentation and requirements for ACAT II programs</li> </ul>
Joint Program Lack of Service Commitment	<ul> <li>Properly adjust Service TOA when Agency program is transitioned after development. E.g., DARPA projects transitioned to Joint Agency or Service adversely effects TOA</li> </ul>

PMs proposed eight solutions. For example, to address the issues of funding instability affecting baselines and unfunded mandates, PMs advocated for multi-year procurement authority, the support for baseline adjustments caused by external stakeholders, the permission for capital funding, funding support for any policies issued, and the need to communicate funding impacts through reviews with the Services.

PM Forum #2. The following major themes were documented by 25 PMs who attended the April 2008 forum:

- Funding Instability;
- People, Staffing, and Skills;
- Speed of Acquisition;
- Integration, Interoperability, & Interdependency;



- Industrial Base:
- Oversight/Governance; and
- Requirements.

The major theme Funding Instability was selected to provide the supporting issues and proposed solutions. In this forum, PMs pointed out that funding cuts were forced and unpredictable, that there was a lack of flexibility to plan a resilient program, that the DoD did not use the most probable cost for program baselines, and the DoD subscribed to a currentyear focus rather than an overall life cycle cost focus. Table 4 shows the PMs' supporting issues and proposed solutions derived from the major theme Funding Instability.

Table 4. PMs' Supporting Issues & Proposed Solutions for Funding Instability (Moseley, 2010)

Supporting Issues	Proposed Solutions
Forced & Unpredictable Cuts	<ul> <li>First answer should be no - second answer should be yes only with data driven/risk based APB/EMA revisions—this should be implemented by Component Acquisition Executives (CAE)</li> <li>Require fully funded increments—this should be an OSD policy that is implemented by the CAE</li> </ul>
Lack of Flexibility to Plan Resilient Program	<ul> <li>OSD &amp; CAEs should advocate for the Economic Order Quantity policy to Congress (lot size, multi-year, value based)</li> </ul>
Not Using Most Probable Cost for Program Baseline	<ul> <li>Budget to 80% confidence level (Policy OSD, Industry/C/S Implementation)</li> <li>Allow visible government management reserve—this should be an OSD policy implemented by Industry &amp; CAEs</li> </ul>
Current-Year Focus verses Overall Life Cycle Cost Focus	<ul> <li>Create ROI account or Weapons Capital Fund</li> <li>Payback to the account the fund required</li> <li>Share saving with the contractor, program office—this should be an OSD policy implemented by the CAEs</li> </ul>

PMs proposed eight solutions to resolve the supporting issues. For example, to resolve the issues of the lack of flexibility to plan a resilient program and the non-use of the most probable cost for the program baseline, PMs advocated for OSD and the Component Acquisition Executives to gain Congress' approval for the establishment of an economic ordering quantity policy that would be value based and aimed at lot sizes and multi-year procurements. They also advocated for visible government management reserve that would be an OSD policy implemented by both Industry and the Component Acquisition Executives.

PM Forum #3. The following major themes were documented by 28 PMs who attended the November 2008 forum:

- Qualified/Experienced Acquisition Workforce,
- Funding & Contracting,
- Controlling Requirements, and
- Inconsistent Policy & Oversight.

The PMs argued that for the major theme Qualified/Experienced Acquisition Workforce, the supporting issues were recruiting, training, retention, experience, and lack of billets. The PMs' supporting issues and proposed solutions are shown in Table 5.

Table 5. PMs' Supporting Issues & Proposed Solutions for Qualified/Experienced Acquisition Workforce

(Moseley, 2010)

Supporting Issues	Proposed Solutions
Recruiting	<ul> <li>Establish mentoring/intern programs</li> </ul>
	<ul> <li>Pursue relationships with local/state colleges</li> </ul>
	<ul> <li>Stream-line hiring timeline/process</li> </ul>
	<ul> <li>Consider wounded warrior programs</li> </ul>
Training	<ul> <li>Establish acquisition training for requirement officers</li> </ul>
	<ul> <li>Institute refresher courses</li> </ul>
	<ul> <li>Consider/review reducing length of DAU's PMT401 course</li> </ul>
Retention	<ul> <li>Provide the Services with compensation options</li> </ul>
	<ul> <li>Establish focused incentives</li> </ul>
Experience	<ul> <li>Manage resource officer rotations</li> </ul>
	<ul> <li>Require defense sector PM experience for SAEs &amp; staffs</li> </ul>
	■ Facilitate an "A Team" concept
Lack of Billets	<ul> <li>Review force structure requirements/balance</li> </ul>

To address or resolve the supporting issues, PMs proposed 13 solutions. For instance, in the areas of experience and lack of billets, PMs advocated for better management of resources as they apply to officer rotations, the requirement for defense sector PM experience for the Service Acquisition Executives and their staffs, the facilitation of an "A Team" concept, and the review of force structure requirements to ensure balance.

PM Forum #4. Twenty-two PMs who attended the May 2009 forum presented the following major themes:

- Policy,
- IT Acquisition & Implementation,
- Oversight & Excessive Documentation,
- Staffing & Personnel, and
- Requirements & Funding.

During this forum, PMs insisted that acquisition policies were inconsistent, unclear and overly complex, and difficult to implement as it pertained to the major theme *Policy*. PMs proposed nine solutions to fix the supporting issues, as shown in Table 6.

Table 6. PMs' Supporting Issues & Proposed Solutions for *Policy* (Moseley, 2010)

Supporting Issues	Proposed Solutions
Policies are inconsistent	<ul> <li>Establish process for policy change approval &amp; implementation (e.g., change control, roles &amp; responsibilities, interdependencies)</li> <li>Ensure timing of policy implementation is part of every policy change</li> <li>Force rigor into policy change process by mandating use of metrics &amp; historical analysis</li> <li>Mandate establishment of supporting processes</li> </ul>
Policies are unclear & overly complex	<ul> <li>Mandate agency level review of all candidate policy changes</li> <li>Audit &amp; baseline existing policy volume &amp; complexity. Moratorium on changes in interim</li> <li>Establish best practices for determination of minimum documentation required for milestones</li> </ul>
Policies are difficult to implement	<ul> <li>Mandate ADM/PMD dialogue between MDA &amp; PM before final signature to eliminate surprise</li> <li>Mandate minimum implementation durations &amp; success criteria for policy changes</li> </ul>



For example, to address or resolve the issue of policies that are unclear and overly complex, the PMs advocated for an agency-level review of all candidate policy changes, for an audit and then baseline of existing policy volume and complexity, and for a moratorium on changes in the interim. They also wanted to see the establishment of best practices in the determination of minimum documentation required for milestones.

PM Forum #5. The following major themes were presented by 20 PMs in the November 2009 forum:

- Requirements Instability, Growth & Inadequate Definition Drive Cost & Schedule Execution Issues:
- Manpower Skills & Knowledge Shortage:
- Funding Instability & Minimal Reprogramming Authority (Reduces PM Flexibility & Management Control & Causes Frequent Program Restructures);
- Policy Unclear, Inconsistent, & Burdensome;
- Focus of OSD Staff Misplaced; and
- Issues with Contracting & Industrial Base.

The PMs documented four supporting issues as essential to the major theme Requirements Instability, Growth & Inadequate Definition Drive Cost & Schedule Execution Issues: Director of Operational Test & Evaluation (DOT&E) levies excessive testing requirements; there are unfunded mandates such as anti-tamper; there are inadequate requirements definition and ability to perform adequate cost estimation prior to Milestone A (MS-A); and there is a lack of consistent requirements/program initiation process between the DoD and the Intelligence Community. Table 7 shows the PMs' supporting issues and proposed solutions for the major theme Requirements Instability, Growth & Inadequate Definition Drive Cost & Schedule Execution Issues.

PMs' Supporting Issues & Proposed Solutions for Requirements Table 7. Instability, Growth & Inadequate Definition Drive Cost & Schedule Execution Issues (Moseley, 2010)

Supporting Issues	Proposed Solutions
DOT&E levies excessive testing requirements	<ul> <li>Consolidate single authority for funding and requirements by VCJCS</li> </ul>
Unfunded mandates such as anti- tamper	<ul> <li>Implement adequate policy to ensure new requirements have associated funding in year of execution by USD/AT&amp;L</li> </ul>
Inadequate requirements definition and ability to perform adequate cost estimation prior to MS-A	<ul> <li>Implement improved disciplined process &amp; accountability for affordable test execution by DOT&amp;E</li> </ul>
Lack of consistent requirements/program initiation process between DoD & Intelligence Community	<ul> <li>Establish improved, linked policy between JCIDS &amp; acquisition processes to support earlier, adequate requirements definition by USD/AT&amp;L &amp; J8</li> </ul>

PMs proposed four solutions. For example, to address or resolve the issue of inadequate requirements definition and ability to perform adequate cost estimation prior to Milestone A, PMs advocated for the implementation of an improved disciplined process and accountability for affordable test execution by the Director of Operational Test & Evaluation.

PM Forum #6. The following major themes were presented by 21 PMs in the November 2010 forum:

Contracting: Process—Management—Procurement Timeline,



- Requirements/Testing.
- IT & Software-Intensive Systems,
- Funding Flexibility & Workforce Experience, and
- Leadership Intent: Disconnected Implementation.

The PMs derived the following supporting issues from the major theme Contracting: Process—Management—Procurement Timeline: the Defense Contract Audit Agency (DCAA) audit process is overly conservative and risk adverse; there is a double standard in the process (auditing takes the contractor 30-45 days but 6-18 months for the government); the contracting workforce is inexperienced; the contracting process exacerbates funds management issues; OSD & Services overlap as they pertain to process over product; and the certification to Competition in Contracting Act (CICA) and Truth in Negotiations Act (TINA) and certified cost and pricing data/Earned Value Management System (EVMS) actions are redundant and overly burdensome for lower value contracts. Table 8 shows the PMs' supporting issues and proposed solutions for the major theme Contracting: Process— Management—Procurement Timeline.

Table 8. PMs' Supporting Issues & Proposed Solutions for Contracting: Process—Management—Procurement Timeline (Moseley, 2010)

Supporting Issues	Proposed Solutions
DCAA audit process overly conservative/risk adverse (double standard: it takes contractors 30-45 days & government 6-18 months)	<ul> <li>Review DCAA audit processes to allow less than 100% perfection in audits—look to raise audit thresholds (OSD/DPAP)</li> </ul>
Inexperienced contracting workforce	<ul> <li>PCOs need to take PM training and vice versa— case based vs. "how-to"/checklist</li> </ul>
Contracting process exacerbates funds management issues	<ul> <li>PCOs &amp; buyers need to partner with the PM/Technical team to ensure government is a smart buyer – PK team generally not experts in the domain ("too much independence" today)</li> </ul>
Process over Product: OSD & Services overlap	<ul> <li>Ensure PCOs accountable to the PM while still fulfilling responsibilities (OPCON vs. ADCON)</li> </ul>
Certification to CICA (Competition In Contracting Act) & TINA (Truth In Negotiations Act) & certified cost & pricing data/Earned Value Management System (EVMS) actions are redundant and overly burdensome for lower value contracts	There is too much regulation: FARs, DFARs, AFFARs, AFFAR Sup, ARFARS, OSD Policy, Service Policy, Command Policies, & Functional Policy. Protests have made us risk averse; the workforce doesn't have bandwidth and experience/judgment to tailor the process; and approval levels are too high & dollar thresholds are too low

PMs proposed five solutions to overcome this major theme. For instance, to address or resolve the issues of an inexperienced contracting workforce and the PMs' perspective that the contracting process exacerbates funds management issues, PMs advocated that PCOs take program management training and vice versa in a case-based learning environment. PMs also advocated that PCOs and buyers needed to partner with the program management and technical team to ensure that the government is a smart buyer, because the contracting team, in general, does not have expertise in the domain. This must be done to eliminate the independence seen today.

The results presented in this paper represent data from 148 major PMs from 12 defense acquisition agencies who attended six PM Forums held from November 2007 to



November 2010. Senior OSD acquisition leaders heard directly from these PMs in the form of "straight talk" as they articulated proposed solutions for a plethora of burning programmatic issues. Referring back to Table 2 and conducting a comparative analysis, several major themes kept repeating themselves across the forums.

#### Trends

After conducting a comparative analysis of the major themes during the six PM Forums, the themes that repeated themselves were program management resources, policy and oversight, requirements, acquisition workforce, the contracting process, the industrial base, IT acquisition, and testing (See Table 9).

Table 9. **Comparative Analysis of the Repetition of Major Themes in PM Forums** (Moseley, 2010)

PM Forums in Which Major Themes Were Repeated						
Major Themes	Nov 2007	Apr 2008	Nov 2008	May 2009	Nov 2009	Nov 2010
Program Management Resources	Х	Х	Х	Х	Х	Х
Policy/Oversight	Χ	Χ	X	Χ	Х	X
Requirements	Χ	Χ	Χ	Χ	Χ	Χ
Acquisition Workforce	Χ	Χ	Χ	X	Χ	Χ
Contracting Process			Χ		Χ	Χ
Industrial Base	Χ	Χ			Χ	
IT Acquisition				Χ		X
Testing	Χ					X

However, the themes that were consistent over all six forums were as follows: program management resources, policy and oversight, requirements, and the acquisition workforce. The contracting process was a major issue in three forums: November 2008, November 2009, and November 2010. Likewise, the industrial base surfaced as a major issue in three forums: November 2007, April 2008, and November 2009. IT acquisition surfaced twice as a major issue in later forums: May 2009 and November 2010. Testing was more sporadic. It surfaced as a major issue only in the first and sixth PM Forum. It is interesting to note that in the November 2010 forum, the PMs captured all major themes from past forums with the exception of the industrial base.

While there is no direct evidence that the PM Forum discussions led to changes in the acquisition system, it appears that the seeds for several major initiatives may have been planted with OSD during these events. In particular, major workforce improvement initiatives, including the Defense Acquisition Workforce Development Fund (10 USC 1705, 2008), expedited hiring authority, and contractor insourcing may have a significant positive impact on the acquisition workforce issues raised by the PMs. Similarly, some PM requirements issues are being addressed through recent legislation mandating training of the requirements management workforce and establishment of Configuration Control Boards (CCBs) to help PMs control requirements creep. Finally, several recent USD(AT&L) efficiency initiatives are aimed at reducing the oversight burden and streamlining burdensome and expensive acquisition documentation (Carter, 2010).

Despite all of the reforms in acquisition to make the process better, one continued drumbeat of PMs that remains unanswered since the first PM Forum in 2007 is the issue of



unpredictable funding. The Planning, Programming, Budgeting, and Execution (PPBE) system, an arcane relic from the 1960s, is an inflexible, calendar-driven system that is rife with perverse incentives. PMs are measured and rewarded on their obligation and expenditure of funds with little regard to how or why the taxpayers' monies were spent. The fundamental mismatch between an event-driven program and the calendar-driven PPBE system often leaves the PM a Hobson's choice of losing or reprogramming money to adjust the schedule for a program event, or pressing ahead in the face of a clear need to slow down (or speed up) to fix a program technical or schedule issue. PPBE adjustments within one program often create ripple effects and churn in the wider program portfolio. "Colors of money" can have equally perplexing impacts. While a program may have an abundance of procurement dollars, for example, they may be short on research and development funds. Since the monies are not interchangeable, a crisis ensues, even though the PM has, in aggregate, sufficient funds for the program. To date, no one has offered a viable substitute for the PPBE system. PMs continue to indicate that they spend substantial amounts of time managing workarounds.

#### Conclusion

The Office of the Secretary of Defense (OSD) and the Under Secretary of Defense for Acquisition, Technology, and Logistics (USD(AT&L)) saw a need to improve acquisition outcomes by establishing PM Forums. These forums are venues where PMs can provide "straight talk" to OSD senior acquisition leaders. Six forums have been held since 2007 and attended by 148 major PMs from 12 defense acquisition agencies. Of the major issues and proposed solutions presented by PMs, issues in program management resources, policy and oversight, requirements, and the acquisition workforce still persist. Acquisition initiatives are ongoing and are attempting to address these tough, persistent issues. The effectiveness of these initiatives will undoubtedly continue to be evaluated by PMs in future forums.

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