Performance-Based Logistics Basics
PBL 101

Submitted by Mr. Jamie Marsh

Performance Based Logistics (PBL) and its strategies can help us better support and improve the life cycle logistics and product support needs of the Air Force. Life cycle logistics and product support, by their very nature, can be difficult to understand. Each deals with various fields of study and requires a breadth of expertise in areas such as maintenance, supply, transportation, training, support equipment, and technical data, just to name a few. The term PBL was first introduced to the Department of Defense (DoD) in the late 1990s and formally defined in DoD and the Air Force (AF) in 2001. However, many of us who aren't involved in the day-to-day product support planning activities remain confused about what PBL is; how PBL strategies align into their unique program or project support strategies; and even the acronym PBL itself often conjures many misconceptions. Simply stated, PBL aligns product support performance with dollar value. PBL incentivizes support providers to find and establish more reliable and maintainable solutions which provide the military support performance at the best value.

WHAT IS PBL?

Although PBL elements are not new to "what" DoD requires in terms of support, they do result in a change in "how" the military wishes to do business. The term PBL was first proposed to DoD by a Product Support Committee of Aerospace Industries Association (AIA) as part of a Joint Aeronautical Commander's Group study performed in 1999. A 2001 Under Secretary for Defense (AT&L) PBL Memorandum clarified Defense Planning Guidance, thus establishing PBL as a "preferred" strategy; "PMs [Program Managers] shall develop and implement performance-based logistics strategies that optimize total system availability while minimizing cost and logistics footprint."

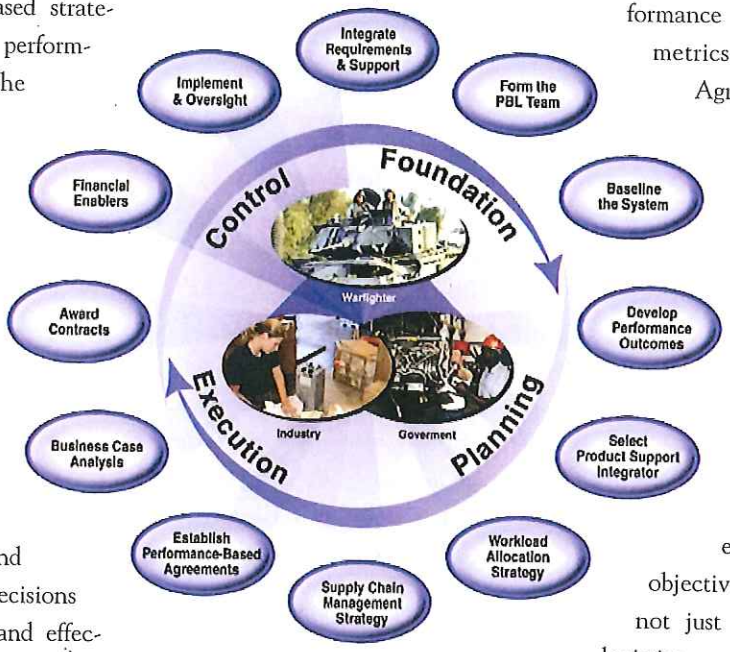
The DoD has formally defined PBL in 5000.1 Policy as "the acquisition of support as an integrated, affordable, performance package designed to optimize system readiness and meet performance goals for a weapon system through long-term support arrangements with clear lines of authority and responsibility. Performance-based strategies focus on achievement of performance outcomes, not the transactional products or services that enable those outcomes."

The Air Force further defines PBL in Air Force Instruction 63-101 as a: "Product support strategy where PM develops and implements performance-based logistics strategies that optimize total system availability while minimizing cost and logistics footprints. Trade-off decisions involving cost, useful service, and effectiveness shall consider corrosion prevention and mitigation. Sustainment strategies shall include the best use of public and private sector capabilities through government/industry partnering initiatives, in accordance with statutory requirements."

So what does all this really mean? PBL buys performance, not goods and services. For example under a traditional support strategy, support providers are paid each time they provide the military a part or repair action. Under a PBL support strategy, support providers are paid based on the availability and/or reliability of the system. This strategy better meets our AF warfighting mission. PBL is not a "one size fits all" strategy or an "all or nothing" proposal—in fact it is just the opposite. Product support is varied and complex and PBL strategies can include or range from a single logistics support element at the component level to all elements of support at the system level. Not every PBL strategy needs to be a large system level arrangement like C-17, F-117 or B-2. PBL strategies may provide both the "means" and "ends" of product support for these systems. The number of AF programs planning or currently executing PBLs is growing everyday. In an Oct 07 survey, over 29 programs within AFMC were actively involved in PBL with another 20 projected to use PBL during 2008-2010. That number will continue to grow as more contracts and agreements for program support emerge for renewal.

PBL requires a different mindset in order to understand how we think about buying support. It is a support strategy that places primary emphasis on optimizing weapon system support by requiring PMs to document warfighter performance requirements as measurable metrics in Performance-Based Agreements (PBAs) or contracts. The focus is on metrics that drive operational availability. A PBL strategy also requires the PM to designate a single point of accountability for performance using a Product Support Integrator (PSI), and to develop support metrics and accompanying incentives and penalties to ensure that those performance objectives are met. However, PBL is not just another name for contract logistics support. There are also many government organizations actively participating in PBL either as PSIs or produce support providers. A good example is the B-2 Sustainment at Oklahoma City Air Logistics Center. It is one of six DoD PBL pilot programs designed to find new and better ways to execute government PBL strategies.

PBL 12-step Process



BENEFITS

An aging AF fleet; the cut in military and civilian workforce; and fiscal constraints have all contributed to the AF looking for a

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PBL IPT Meeting

strategy that could help improve overall warfighter performance. So why is PBL being used within the Air Force? First, PBL is the preferred method of support for the DoD and is required by DoD and AF Policy/Guidance for Acquisition Category (ACAT) I and II systems, plus is preferred on new ACAT III and fielded systems, if practical. Programs are asked to use PBL, but can opt out if a Business Case Analysis (BCA) determines PBL is not the correct strategy to use. There are times when it is not cost effective to enter into a PBL arrangement. Second, PBL can be used in many different ways. PMs are given a wide latitude in how they execute the policy, allowing them to choose those areas that will work for them in their unique environment. In addition, they can tailor a PBL strategy to use one, some, or all of the logistics elements. Third, reliability and maintainability improvements can be obtained from a well executed PBL strategy. PBL provides for incentives to improve availability or reliability of the system. PBL pays for performance outcomes, vice paying for transactions such as buying parts or services that may be unnecessary or inefficient. Traditionally, providers profit from the malfunction and maintenance requirements of weapons systems, whereas PBL providers are incentivized for fewer malfunctions. The AF has never needed a warehouse full of spare parts, what we needed was an 'operational-go-to-war" system. PBL pays for performance of that system and incentivizes providers to find ways to reduce repairs, transportation, and other logistical related costs. For every part that doesn't fail the Air Force can reduce the deployment footprint; use fewer supply resources to stock, store, and issue inventories; and employ fewer mechanics to remove and replace the items. All of these can result in significant life cycle cost savings. Paying for outcomes such as mission capable rates, availability rates, and longer mean time between failure rates, encourages overall life cycle cost reductions, thus allowing the Air Force to receive greater performance values at a lower cost. PBL also facilitates better communications among acquisition personnel, the war fighter, and support providers by better defining the necessary requirements.

Finally, the successfulness of PBL strategies has been proven many times over. One Government Accountability Office (GAO) study from Sep 05 reported on 15 programs, and 10 of those programs exceeded the Performance Requirements cited in their PBL strategies. The remaining 5 met all Performance Requirements. The GAO stopped short of giving PBL full credit for this success because not all costs and other data were tracked under the PBL, but the DoD is convinced that it was the primary reason for this phenomenal success.

CHALLENGES

Pulling together all the different aspects of PBL into an executable strategy can be challenging. Some of the questions any

PM or PBL Integrated Process Team (IPT) may ask are: "How is funding going to work? How long should the terms of the contract be? How can we develop meaningful metrics? How do you do an effective BCA? How can we incorporate the PBL strategy into existing legacy systems? Answers to all of those questions and more are available with a little training and research.

For example, funding can be a challenge under a PBL environment since it requires managers to enter into formal documented agreements with the major stakeholder earlier than other traditional strategies—sometimes even before final AF budget decisions. The funding must be available at the right time to pay for the agreed upon level of performance plus any improvement incentives. PBL funding strategies are best executed when they strive to establish long term contracts or agreements. These types of agreements provide the contractors the ability to invest in longer term reliability improvement projects. However, long term funding agreements can be difficult to negotiate due to the uncertainty of available AF dollars and the very real possibility of execution year budget cuts. A major challenge is to build some flexibility in performance agreements that allow for the inevitable priority and funding level changes.

Another obstacle to successful implementation can be in the data systems arena. While each PBL strategy is unique and tailored to that particular program's needs, some level of standardization is necessary for AF sustainment data systems. Most of our current data systems were built to support the traditional transaction based environment and therefore must be modified to fully support a PBL arrangement, until they are replaced in the coming years by the Expeditionary Combat Support System (ECSS). Until then, some work-arounds and patches have been made so we can operate under PBL and still communicate with all the necessary financial, supply, requirements data bases. These workarounds are sometimes costly and reduce some of the potential savings.

PBL "Buy in" along with applying systems engineering and systems support are also challenges to overcome. From Senior Leaders to Program Managers to Contractors to the warfighter, the PBL strategy must be understood—government and industry are in this together. Once everyone understands this message, PBL can be very successful. Moreover, PBL functions correctly when proper systems engineering and system support functions are applied in a holistic manner. Unfortunately, there are times when this important step is omitted in the implementation process or not properly worked, thereby eventually driving unintended effects that suboptimize performance.

PBL TOOLS & TRAINING:

In order to assist with developing and implementing PBL strategies, The Defense Acquisition University (DAU) developed a PBL 12 Step Process Model. DAU's PBL tool kit provides an interactive web-based tool which navigates the user through each of the 12 steps. Directions are also provided on how to support the successful completion of each step, as well as supporting materials and resources. The model can be found at https://acc.dau.mil/CommunityBrowser.aspx?id=32529. Properly following DAU's PBL 12 Step Process Model will help improve the skills and habits of Program Managers, IPT members, and Airmen.

Training courses for PBL are also available. Basic PBL tools and concepts are introduced in online Continuous Learning Lessons and formal classroom settings. Both Level 1 and 2 Acquisition Certification training requires individuals to take PBL related courses. We encourage you to take advantage of the training tools and courses available for individuals and teams. Along with training, you can also look around your work area or job for opportunities to use PBL strategies and principles. Take the time to suggest ideas and possible improvements to the appropriate decision makers. The bottom line is everyone in the workforce can contribute to implementing successful PBL.

Remember, PBL is a great way to get better performance for every dollar spent over the life cycle of a system. PBL is a support strategy that rewards and incentivizes the right kind of behavior by providing improved availability and reliability of the system. The incentive for support providers is to make it last and reduce the number of spares/repairs. PBL doesn't always produce instant results; long term reliability improvement can take time depending on the complexity of the system. Be patient. Continue to use PBL in as many programs as possible. Take the opportunity to learn more detailed information about PBL and how it can help your organization improve. Specific training is available, so take advantage of this rewarding strategy and see what PBL can do for you!

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