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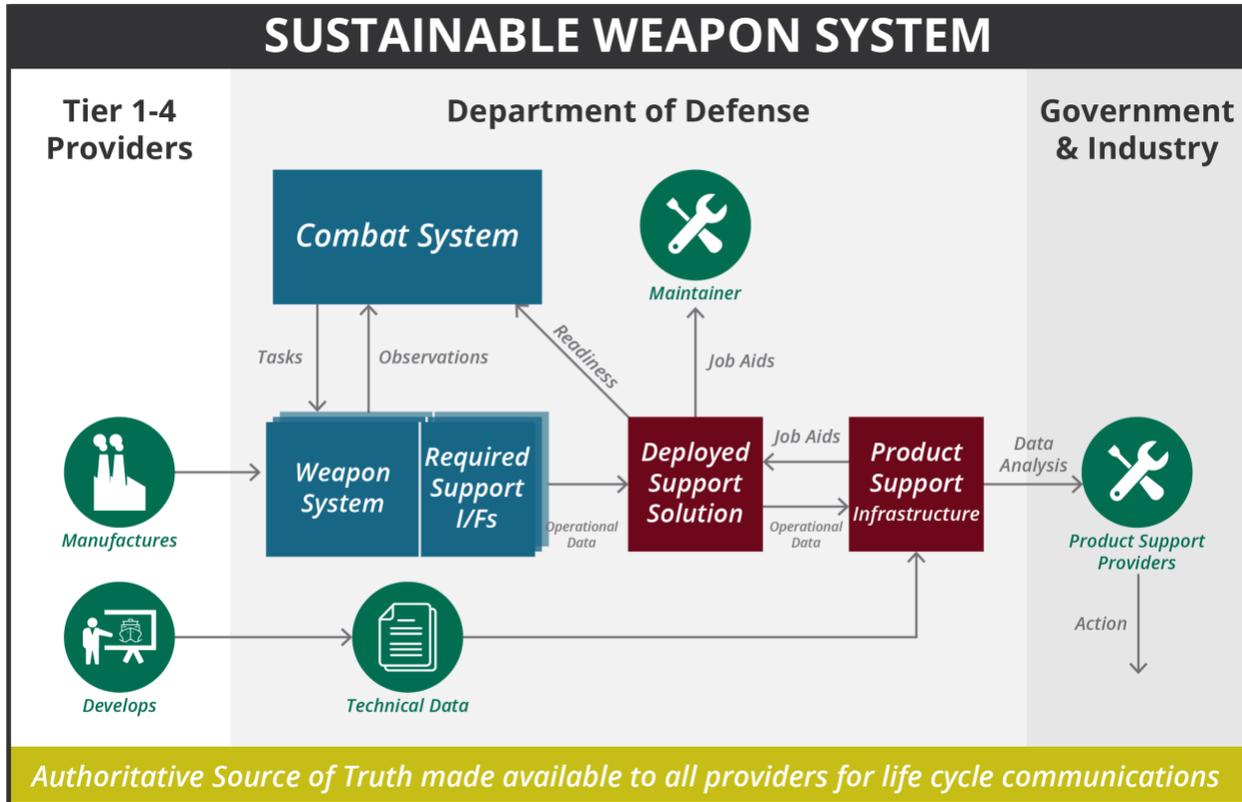
The Digital Authoritative Source of Truth

Systems Innovation Engineering (SIE) is a Systems Engineering company that is transforming the digital environment, including systems modeling and product support activities. As an example, SIE has developed a diagram (shown below) showing a high-level Product Support Strategy (PSS) concept depicting the development, delivery, and support of a DoD weapons system.

We are seeing an emphasis being placed on developing a performance-based PSS around a “digital authoritative source of truth” with the release of DoD Instructions 5000.85, Major Capability Acquisition, and 5000.88, Engineering of Defense Systems. These policy documents state that the Program Manager will make the PSS and digital authoritative source of truth accessible throughout the life of the program.

Spanning the following 10 U.S. Codes (§2334 - Independent cost estimation and cost analysis; §2337 - Life-cycle Management and Product Support; § 2337a - Assessment, management, and control of operating and support costs for major weapon systems; and §2441 - Sustainment Reviews), the digital authoritative source of truth will be used to capture sensitivities in a life-cycle cost analysis, improve material availability and reliability, increase operational availability rates, and reduce operations and sustainment costs.

Emphasizing development data use and the sustainment requirements built into the design to report operational data, the PSS identifies the process and the specific data elements to be contained in the digital authoritative source of truth. This is then modeled and used to communicate to the development team throughout the system’s lifecycle to support operational effectiveness. Identifying early product support technical data collection helps to standardize communication throughout the lifecycle of the system and significantly reduces the DoD weapons system sustainment costs through objective, testable, and measurable outcomes.



This strategy and data will then be used to develop, measure, assess, and report sustained mission capability and readiness as well as implement corrective actions for trends diverging from the required performance.

Effective application of the digital authoritative source of truth must then be used to communicate the required and achieved capability, supportability, and cost of the program.

Along with objective measurable product support, the National Defense Strategy (NDS) recognizes the need for the insertion and modernization of key capabilities. So how do we use this sustainment model to address the scope and pace of our adversaries' ambitions? Specifically,

1. How does the defense industry, or those wanting to do business with the DoD, implement best practices and strategies that demonstrate key capabilities and product supportability, and rapidly meet acquisition demands?
2. How does the defense acquisition community communicate needed future capabilities early enough to enable more resilient and competitive suppliers when seeking alternate sources or developing proposed concepts and equipment?