Best Practices Reports

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If you have questions or would like to discuss our reviews, please contact Katherine V. Schinasi, Director of Acquisition and Sourcing Management, at (202) 512-4841.


U.S. General Accounting Office

Highlights of the Knowledge-based Approach Used to Improve Weapon Acquisition
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Knowledge point 1
Resources and needs match.

Knowledge point 2
Product design is stable.

Knowledge point 3
Production processes are mature.

When do you know you have achieved this knowledge point?

Knowledge point 1 occurs when a sound business case is made for the product—that is, a match is made between the customer's needs and the product developer's available resources, that is, time, money, and technology. This is the most leveraged decision point of the three junctures because it sets the stage for the eventual outcome—desirable or problematic.

When 90 percent of engineering drawings are released to manufacturing organizations. Drawings are the language used by engineers to communicate to the manufacturers the details of a new product: what it looks like, how its components interface, how to build it, and the critical materials and processes needed to fabricate it. This makes drawings a key measure of whether the design is stable or not.

This level of knowledge is achieved when it has been demonstrated that the product can be manufactured within cost, schedule, and quality targets. It is important that the product's reliability be demonstrated before production begins, as investments can increase significantly if defective parts need to be repaired or reworked.

When all key manufacturing processes have come under statistical control and product reliability has been demonstrated.