



United States Air Force Scientific Advisory Board

Ensuring Successful Implementation of Commercial Items in Air Force Systems

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The report provides detailed lessons learned from case studies of 34 system acquisition programs that attempted extensive use of COTS products.

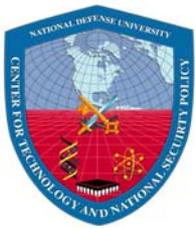
The bottom line of the report is that the introduction of COTS is hard and requires a culture change but is nonetheless inevitable in future acquisition.



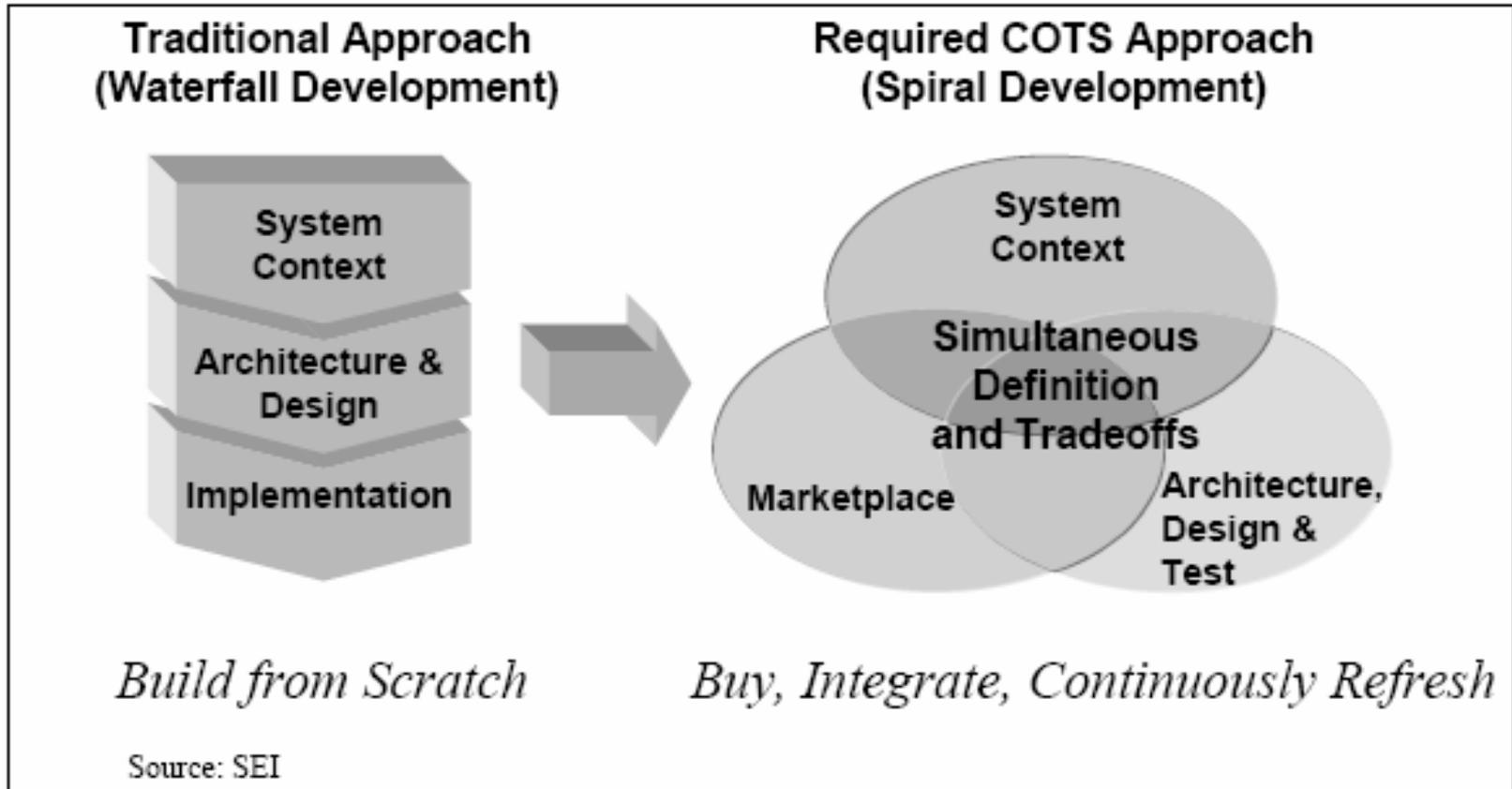
Anecdotal Findings

Myth #7: It's important to know what COTS components can do for you.

Reality: It's important to know what COTS components can do to you.



Fundamental Culture Shift





Critical Success Factors

1. All operational requirements and procurement specifications are negotiable.
2. Open system architecture and the spiral development process are utilized.
3. The prime contractor is incentivized to provide a credible estimate of support costs.
4. Total ownership cost is used as a source selection criterion.
5. The contractors past experience employing COTS products are assessed.
6. The contractor's processes for assessing, selecting, integrating, supporting and refreshing of COTS products are adequate.



Critical Success Factors

7. TOC is used to determine suitability of COTS versus custom products.
8. The contractors understanding of the commercial marketplace and relevant COTS products are evaluated.
9. The system application matches the COTS product functionality.
10. The contractor proposes to use COTS without modification.
11. Trade-off analyses of all changes versus TOC are conducted.
12. There is continuous interaction between government personnel (operations and acquisition) and the prime contractor in Integrated Product Teams.