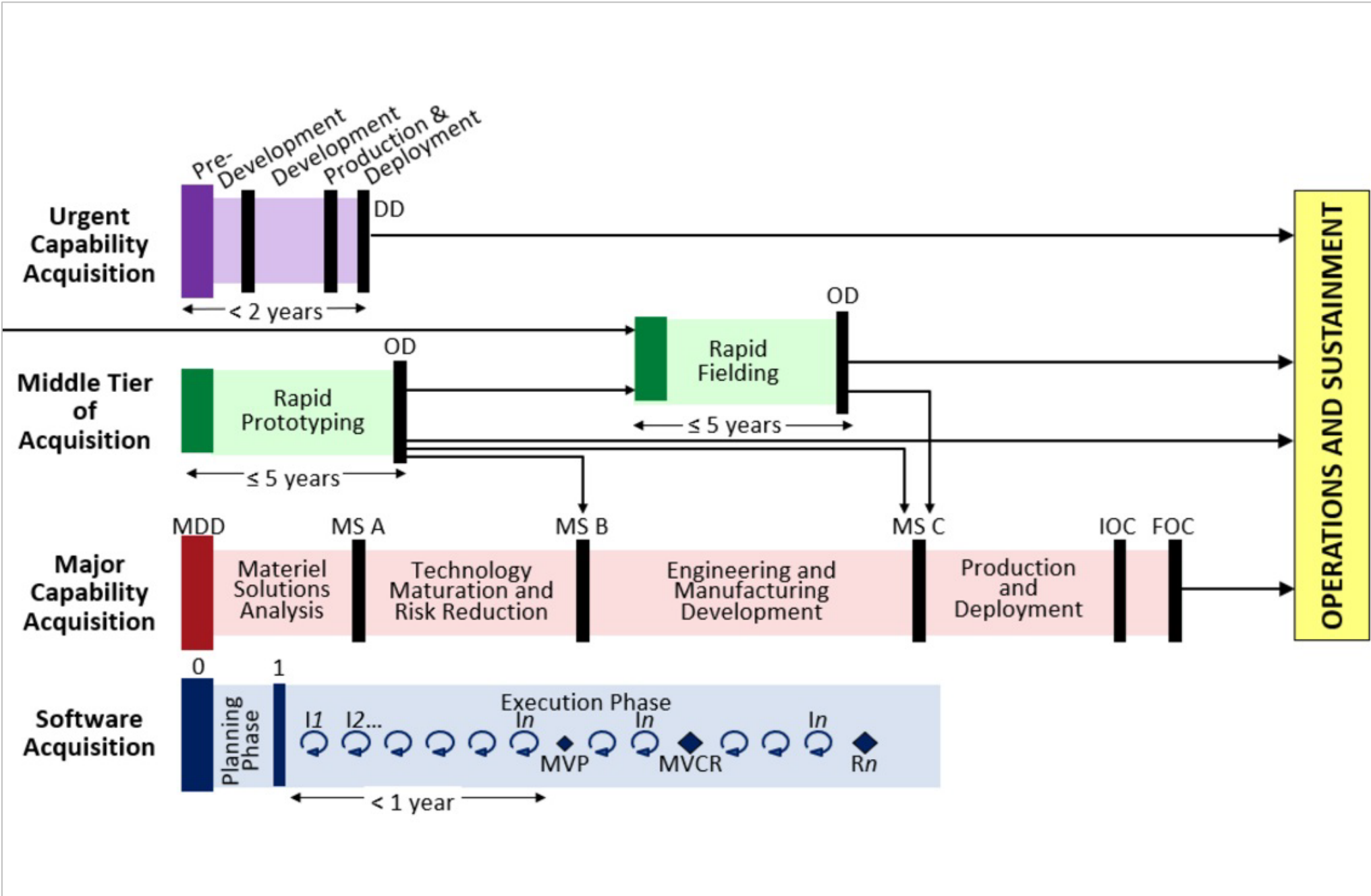


Abstract

The intent of our research is to observe MOSA equivalent concepts performed by commercial industries, gathering best practices, benefits, and failures, then correlating it to the DoD MOSA framework. The use of secondary sources, such as, public data and reports will be assessed to perform an analysis through desktop investigation and case studies, addressing the gaps in usefulness of the DoD’s implementation of MOSA. The aim of this research is to take the lessons learned from the successes and failures of the DoD and Industry to leverage the best practices and recommend areas to holistically improve the DoD’s implementation of MOSA. This will assist in meeting the original objectives of reducing cost, accelerating innovation and expediting timelines of the acquisition process.



Acquisition Pathways Observed

Methods

- Desktop Research was used to observe publicly available information, such as:
 - Academic Publications
 - DoD Regulations
 - US Law
 - Conference Resources
 - News Articles
 - Books
 - Websites
- Cases were formed after collecting information to compare the implementation of MOSA characteristics in the DoD acquisitions, and various commercial industries. The following categories observed are:

DoD

- US Air Force
- US Army
- US Navy

Commercial

- Automobile Manufacturing
- Telecommunication Development
- Medical Robotics Research

Results & Their Impact

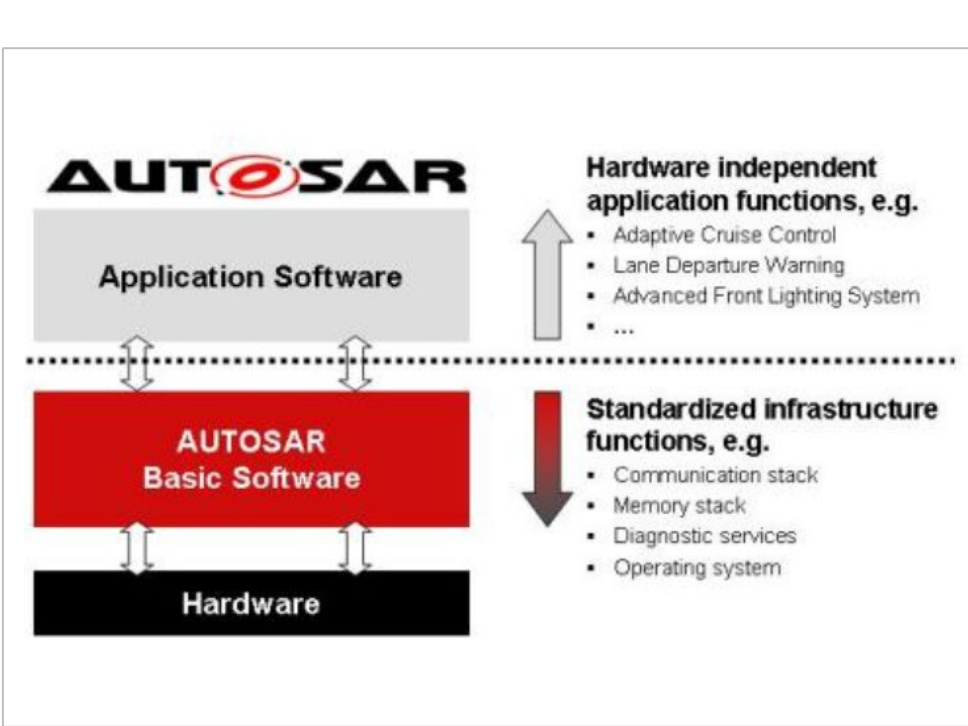
- MOSA is only required, by law, in acquisitions that use the MCA pathway. Limiting MOSA’s use mitigate the benefits for the DoD.
- Taking the lessons learned from industry, such as collaboration, product standardization, and individual interoperability, can yield lower costs, faster innovation, and more competition.



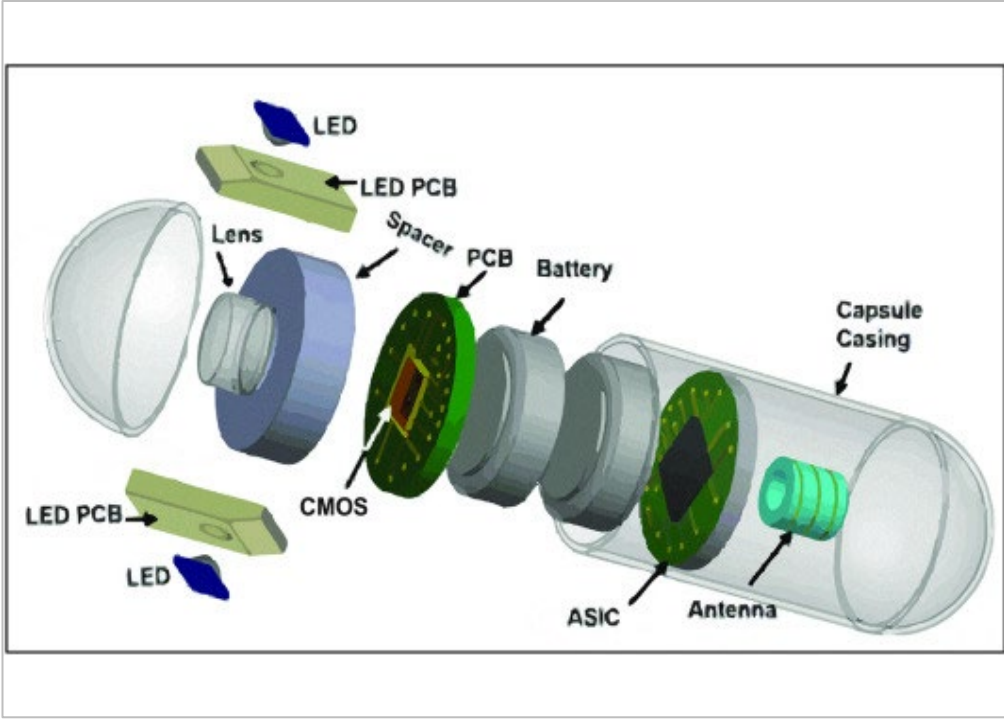
F-35 Joint Strike Fighter



V-280 FLRAA



AUTOSAR



Medical Capsule Robot