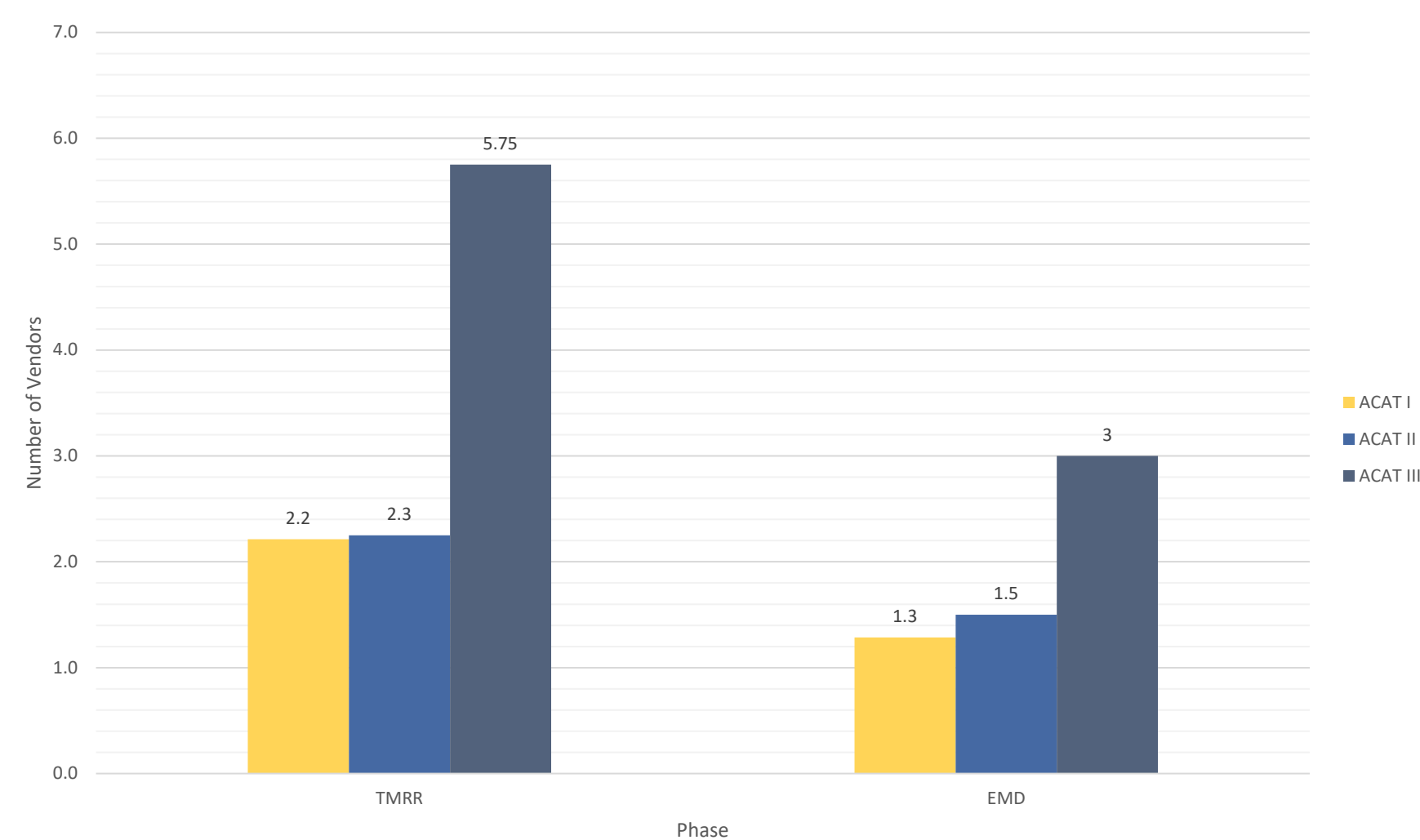


Abstract

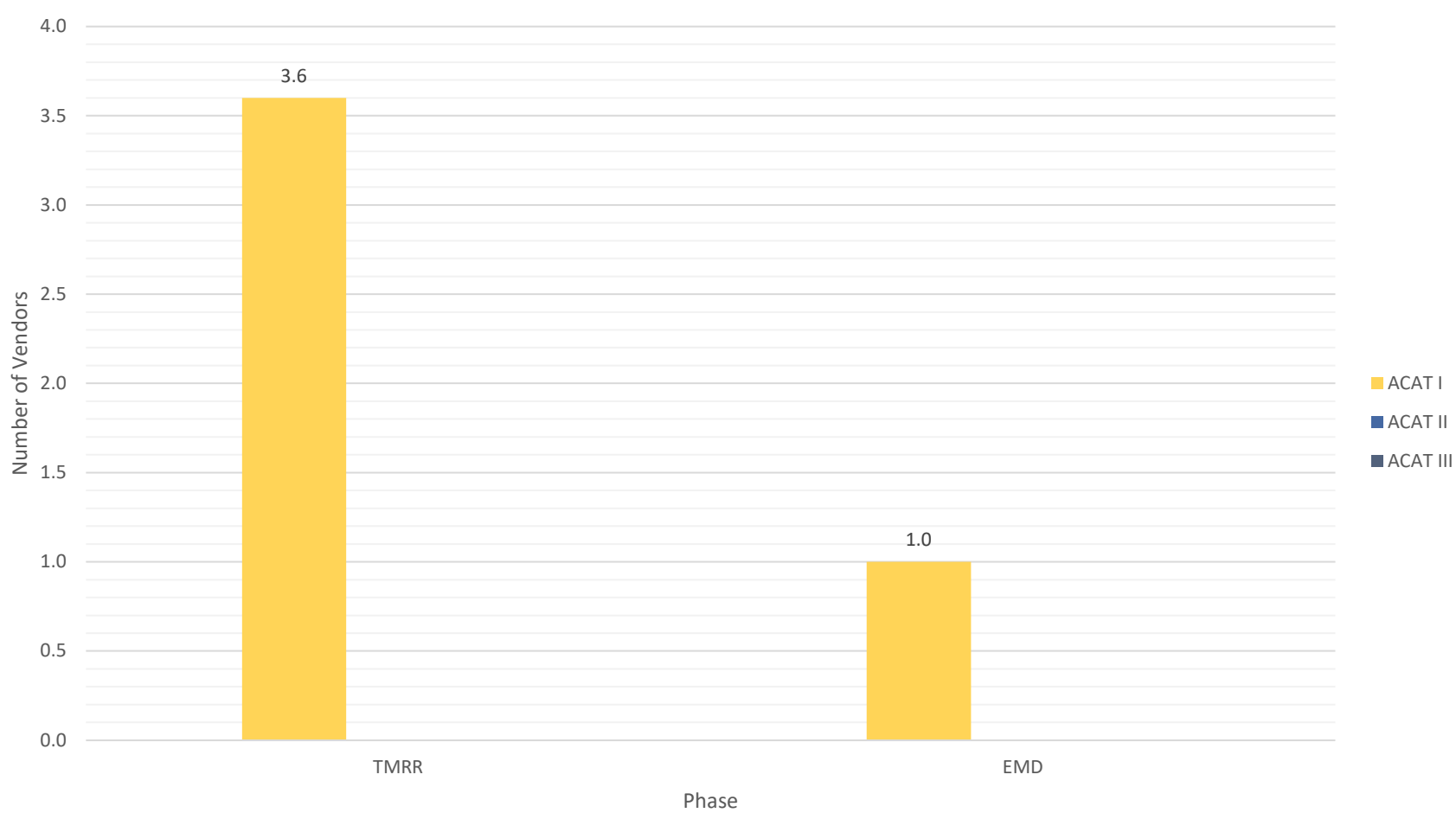
This study aims to evaluate the repercussions of early vendor down-selection strategies on the success metrics (cost, time, and performance) of DoD acquisition programs.

Research questions:

1. how do competition levels during the Technology Maturation & Risk Reduction (TMRR) and Engineering & Manufacturing Development (EMD) phases affect program success rates at different ACAT levels?
2. is there a relationship between the intensity of competition at various stages and subsequent program outcomes, specifically whether increased competition correlates with higher success rates?



Average level of competition per phase for successful programs



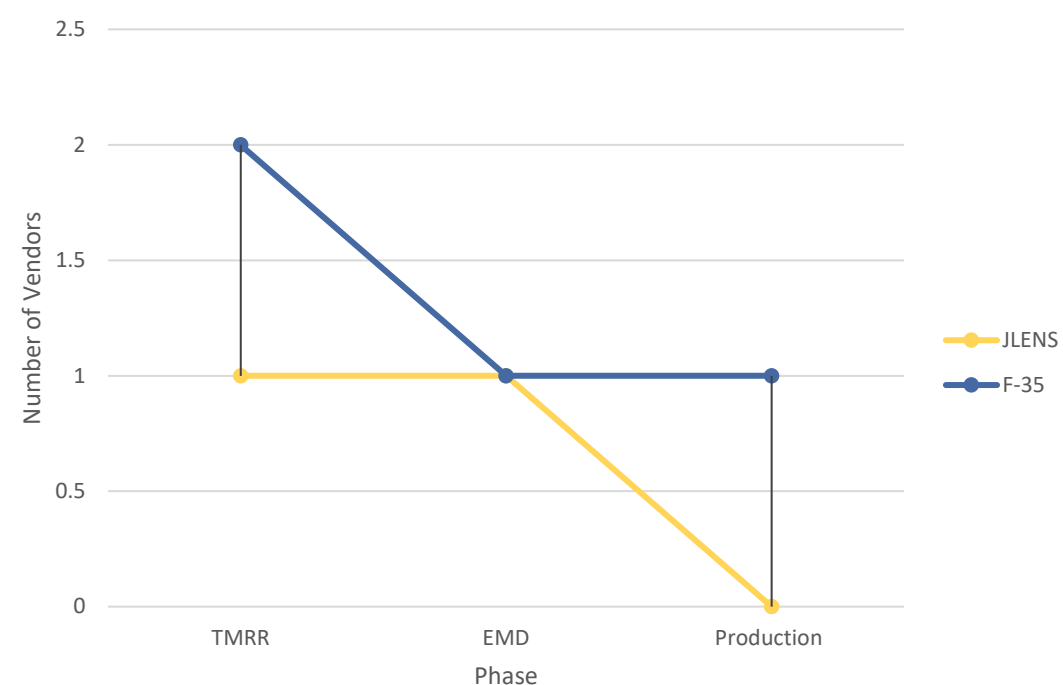
Average level of competition per phase for canceled programs

Methods

- The study used a comparative case study analysis approach to examine the implications of early vendor down-selection in defense acquisition programs. By comparing programs that employed early down-selection to those that maintained multiple vendors, the research aimed to highlight how reduced competition correlates with increased risks and negative outcomes, such as cost overruns and project delays.

Results & Their Impact

- ACAT I and II programs, due to their high costs, face challenges of justifying and maintaining competition through their lifecycle, balancing the benefits against potential resource losses and increased program risks.
- ACAT III programs maintain higher competition levels due to lower costs, a broader vendor base, direct impact on life cycle costs, and typically involving lower barriers to entry, enabling longer competitive durations and yielding benefits like cost-effectiveness and innovation.
- Cancelled programs had reduced to a single vendor before entering EMD phase, despite having above-average competition in TMRR, suggesting early-down selection to single-vendor may contribute to program cancellation.
- The limited data on Nunn-McCurdy breaches suggests that reduced competition in both TMRR and EMD phases might contribute to cost overruns and program challenges.



State of Competition for Programs with a Nunn-McCurdy breach

Recommendations

- Programs should retain two or more vendors through the EMD phase to increase the likelihood of entering production.
- Consolidate and improve the various repositories of historical data to improve transparency, knowledge management, and lessons learned.
- Empower PMs per the DoDI 5000 to tailor their approaches.
- Explore the benefits of competition at the subcontractor level for programs too expensive to retain multiple prime contractors.

