As of August 16, 2011, the new business system rule addresses deficient contractor business systems and the Federal Government's authority to withhold $5 \%$ of contractor progress payments when a significant deficiency is present. This MBA project focuses on applying the Operational VaR model to Earned Value Management Systems (EVMS). The research team developed a quantitative EVMS risk-analysis model that can support a monetary withhold decision and withstand push-back (to include litigation) from the defense contractor.


## Summary of Results

- Results show that the rank order of severity for the 13 EVMS high risk guidelines can be applied to the operational VaR model in which a monetary risk value can be calculated to withhold contractor progress payments.
- Loss frequency by CAGE code tailors the individual contract's value-at-risk to the government.
-The operational VaR model could be used by DCMA personnel as a defensible risk value model for withholding contractor payments.
- For all EVMS deficient contracts, it is likely that the total operational VaR will exceed the maximum payment withholding amount.

