BACKGROUND
The SURVICE Engineering Company is a small business that has been providing the U.S. Department of Defense (DoD) and related customers with high-quality analytical products and services since 1981. Working with DoD customers as well as industry manufacturers, SURVICE supports vulnerability analyses, Live Fire Test and Evaluation (LFT&E), fire mitigation efforts, and foreign target exploitation for fixed-wing programs.

VULNERABILITY ASSESSMENTS
Building on 27 years of fixed-wing survivability experience, SURVICE can provide complete support, from concept to fielding and beyond. We support all aspects of vulnerability analyses, from model generation, to design analysis of alternatives, to vulnerability code input generation and analysis.

LIVE FIRE TEST AND EVALUATION
With offices strategically located in Dayton, OH; Eglin, FL; Ridgecrest, CA; and elsewhere, SURVICE is able to provide LFT&E support to any fixed-wing platform. We employ our proven survivability experience combined with state-of-the-art metrology solutions to support the fixed-wing community by providing LFT&E test planning, pre-test predictions, data collection, and post-test analyses.

FIRE EVALUATION & MITIGATION
Fire is one of the largest vulnerable area contributors to the fixed-wing aircraft. With that in mind, SURVICE has invested internal funds and has assembled a dedicated team of experienced engineers to provide testing and analysis capabilities to address the fire threat to military and commercial systems. Using our LFT&E experience, we have also supported model development and analyses to understand phenomena such as hydrodynamic ram and dry bay fires. SURVICE is the principal developer of the Fire Prediction Model (FPM), which simulates dry bay fire scenarios and mitigation alternatives.

FOREIGN THREAT SYSTEMS EXPLOITATION
SURVICE provides full exploitation support of foreign threat systems to include power train, suspension, fuel and hydraulics, weapons, control/avionics, communications, and other systems to develop functional descriptions, fault trees, geometric models, and signature models to support susceptibility and vulnerability analysis, weapons and countermeasures effectiveness studies, and test and evaluation activities. SURVICE leverages our leading-edge metrology technology coupled with in-house software packages to develop on-site 3-D models with a quick-turnaround time. We offer numerous touch-probe contact and non-contact scanning equipment options to cover customer tolerance requirements down to micrometer accuracy levels.

SUPPORTED PLATFORMS
Some of the recent fixed-wing platforms that SURVICE has supported include:

- JSF
- C-5
- F-22
- B-2
- F-14
- F-18
- AV-8B
- A-6
- P-3
- UCAR
- Predator
- Various foreign targets