# Dossier: Utron Kinetics LLC

## SBIR Award Details

**Award Title:** N/A

**Amount:** $154,997.87

**Award Date:** 2024-08-05

**Branch:** MDA

## AI-Generated Intelligence Summary

**Company Overview:**

Utron Kinetics LLC appears to be a specialized engineering and manufacturing firm focused on developing advanced kinetic energy solutions for defense, aerospace, and industrial applications. Their core mission appears to be to provide innovative, high-performance, and reliable kinetic energy storage and release systems for applications requiring rapid and precise energy delivery. The problems they aim to solve include limitations of traditional energy storage systems (like batteries) in environments demanding high power, low weight, and resistance to extreme conditions. Their unique value proposition likely lies in their ability to tailor-design kinetic energy solutions optimized for specific application requirements, potentially offering superior energy density, cycle life, and environmental resilience compared to alternatives. Based on available information, their differentiation comes from in-house system design, simulation, prototyping, and manufacturing capabilities.

**Technology Focus:**

* Flywheel Energy Storage Systems: Design, development, and manufacturing of high-speed flywheel energy storage units. Specific performance metrics are difficult to obtain but indications are they target energy densities above 100 Wh/kg and discharge rates significantly higher than conventional battery systems.
* Kinetic Launch Systems: Custom engineered launch systems utilizing stored kinetic energy for precise and repeatable deployment of various payloads. These systems are likely adaptable for applications ranging from drone deployment to high-speed projectiles.

**Recent Developments & Traction:**

* Partnership with AFWERX (Specific date unknown - likely 2022-2024):\*\* Appears to be participating in AFWERX programs, indicating interest and engagement with the U.S. Air Force for potential technology applications. Exact project details are not publicly available, but it likely involves advanced energy storage solutions.
* Expansion of Manufacturing Capabilities (Estimated 2023):\*\* Public job postings suggest an expansion of their manufacturing and engineering teams, indicating growth and increased production capacity to fulfill potential orders.
* Small Business Innovation Research (SBIR) awards (multiple):\*\* Publicly available information suggests that Utron Kinetics has won several SBIR awards. Specific details about the topics of these awards and the agencies from which they originated are scarce.

**Leadership & Team:**

Information about the leadership team is limited on their website and public sources. Further due diligence needed to confirm key individuals. LinkedIn searches may yield insights.

**Competitive Landscape:**

* Beacon Power: A company specializing in flywheel energy storage for grid-scale applications. Utron Kinetics differentiates by focusing on smaller, more specialized kinetic energy solutions tailored for defense and aerospace.
* General Atomics Electromagnetic Systems (GA-EMS): Developing advanced electromagnetic systems, including kinetic energy weapons. Utron Kinetics likely competes in niche applications where rapid deployment and portability are critical, compared to the higher-power, larger-scale systems developed by GA-EMS.

**Sources:**

1. [https://www.utronkinetics.com/](https://www.utronkinetics.com/) (Official Website – Provides general company information)

2. [https://www.linkedin.com/company/utron-kinetics/](https://www.linkedin.com/company/utron-kinetics/) (LinkedIn company page - For employee information)

3. AFWERX Website (Search results show participation with company, but direct links to specific projects are limited)