# Dossier: Modalai Inc

## SBIR Award Details

**Award Title:** N/A

**Amount:** $249,978.06

**Award Date:** 2024-10-15

**Branch:** ARMY

## AI-Generated Intelligence Summary

**Company Overview:**

ModalAI, Inc. is a US-based company specializing in the development of autonomy and robotics enabling hardware and software platforms designed to accelerate the deployment of intelligent systems. Their core mission is to provide accessible and open-source-centric tools that empower developers and researchers to build autonomous robots and drones more efficiently. ModalAI addresses the challenges of complex autonomous navigation, obstacle avoidance, and real-time decision-making in robotics and drone applications. Their unique value proposition lies in offering a complete, pre-integrated hardware and software solution stack, based on Qualcomm Snapdragon technology, coupled with open-source platforms like PX4 and ROS, drastically reducing the time and expertise required to develop and deploy autonomous robots.

**Technology Focus:**

* VOXL Series:\*\* A range of compact, power-efficient embedded computing platforms, including the VOXL Flight and VOXL 2, integrating Qualcomm Snapdragon processors, sensors (cameras, inertial measurement units (IMUs)), and wireless communication capabilities (WiFi, Bluetooth, 4G/5G). These are specifically designed for autonomous navigation and computer vision applications in drones and robots.
* Flight Core:\*\* A modular autopilot board integrating an inertial measurement unit (IMU), barometer, and flight controller that supports multiple open-source flight stacks. The most recent versions are tightly integrated with VOXL platforms to enhance communication and streamline development efforts.

**Recent Developments & Traction:**

* VOXL 2 Mini Launch (2023):\*\* Released a smaller, lighter, and more power-efficient version of their VOXL 2 platform, further targeting applications where size and weight are critical constraints, such as small drones.
* Partnership with Auterion (Ongoing):\*\* Continues integration of their VOXL platforms with Auterion's open-source drone platform, offering seamless integration for enterprise drone solutions. This reinforces ModalAI's commitment to open-source solutions.
* Strategic Partnerships:\*\* Numerous partnerships with Universities and Research Institutions that utilize VOXL for research and development efforts. Demonstrating a strong interest in accelerating research and development efforts.

**Leadership & Team:**

* Chad Sweet (CEO):\*\* Background includes engineering leadership roles at Qualcomm and previous work with embedded systems development. Holds multiple patents and a strong background in robotics.

**Competitive Landscape:**

* Auterion:\*\* Auterion is a direct competitor in the drone autonomy and robotics space, offering a similar focus on open-source platforms and pre-integrated hardware/software solutions. ModalAI differentiates itself through its tighter integration with Qualcomm Snapdragon processors and a strong focus on computer vision and on-device AI processing.

**Sources:**

1. [https://modalai.com/](https://modalai.com/)

2. [https://www.qualcomm.com/news/releases/2023/05/modalai-introduces-qualcomm-flight-rb5-5g-platform](https://www.qualcomm.com/news/releases/2023/05/modalai-introduces-qualcomm-flight-rb5-5g-platform)

3. [https://www.prnewswire.com/news-releases/modalai-announces-voxl-2-mini-next-generation-compute-and-sensor-platform-for-autonomous-robots-and-drones-301853314.html](https://www.prnewswire.com/news-releases/modalai-announces-voxl-2-mini-next-generation-compute-and-sensor-platform-for-autonomous-robots-and-drones-301853314.html)