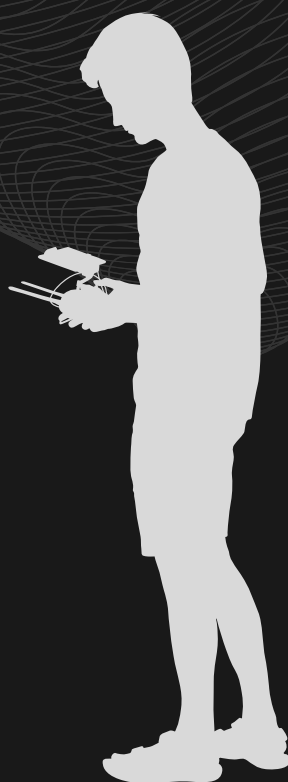




When once you have tasted flight, you will forever walk the earth with your eyes turned skyward. For there you have been, and there you will always long to return.

- Leonardo da Vinci 🦋



WHO WE ARE?

At Javiat Aerospace, we engineer the future of flight. With a passion for innovation and precision, we deliver cutting-edge aerospace solutions that push boundaries – on the ground and in the skies. Our core strengths lie in drone manufacturing, high-performance testing systems, and next-gen security tech that redefines airspace safety.

WHAT WE DO – OUR KEY VERTICALS

Anti-Drone Defense Systems

Stay a step ahead of threats with our advanced jamming and neutralization technology. Engineered for reliability, our anti-drone systems are trusted for critical infrastructure, defense, and public safety operations.

Motor-Propeller Test Benches

From static thrust stands to gyroscopic precision rigs, our test equipment empowers drone developers and researchers to fine-tune propulsion with pinpoint accuracy.

Surveillance Drones

Real-time intelligence meets rugged reliability. Our surveillance drones feature advanced cameras, AI tracking, and long-range communication for effective border patrol, law enforcement, and emergency response.

Training & Drone Lab Setup

We build the future of aerospace, one mind at a time. Our turnkey drone R&D labs and training programs for schools, colleges, and institutions are designed to cultivate next-gen UAV talent – hands-on and industry-ready.

Built on Precision. Backed by Trust.

Our commitment to quality, transparency, and innovation has earned the confidence of industry leaders, institutions, and partners across the globe. With every product we deliver, we reinforce the trust our clients place in us – and we never take that for granted.

Trusted by Experts. Proven in the Field.

We don't just build technology – we build trust. From government sectors to educational institutions, our clients choose us for our reliability, responsiveness, and results.

Your Mission, Our Integrity.

At Javiat Aerospace, trust isn't a promise – it's our standard. Every system we create reflects our commitment to excellence, safety, and long-term partnerships.

Your One-stop aerial solutions provider

We deliver high-performance aerial solutions engineered for mission-critical demands. Our advanced drones and specialized UAV testing systems are crafted for precision, durability, and uncompromising safety – even in the most extreme environments.

From surveillance and industrial inspections to agricultural intelligence and defense applications, our technology adapts to diverse industries with ease. Backed by relentless R&D and a commitment to excellence, we empower organizations to achieve greater efficiency, smarter security, and superior operational outcomes.

Innovation isn't an option – it's our flight path.



OUR SOLUTIONS

Our technologies are engineered to meet the evolving demands of the modern aerospace landscape. Whether it's surveillance, industrial inspections, or precision agriculture, our high-performance drones deliver unmatched reliability, intelligence, and endurance.

Backed by advanced UAV testing systems and a network of international manufacturing partners, we ensure every product upholds global standards of safety, quality, and innovation. Crafted with aerospace-grade precision and built for real-world durability, our solutions help industries maximize productivity, elevate security, and streamline operations – from ground to sky

Anti-Drone Systems : The D-FENDER Series represents our powerful, Made-in-India anti-drone guns equipped with multi-frequency jamming capabilities. Designed for reliability and tactical edge, they deliver robust protection against unauthorized aerial threats. Trusted for critical missions, our systems ensure airspace control in defense, public safety, and sensitive zones.

Drone Test Benches : Our testing solutions range from gyroscopic stands capable of mounting full drones to high-precision single and dual motor test benches. With 99.9% data accuracy, and collaborations with Eureka Dynamics, Dynotis, and Semai Aviation, we help eliminate costly manufacturing errors and flight failures. These systems are engineered for serious developers and institutions seeking data-driven UAV performance optimization.

Surveillance Drones: The NOVA X2 and X3 drones are engineered for advanced surveillance. Equipped with intelligent systems and long-range capabilities, they provide real-time monitoring for public safety, defense, and critical infrastructure. They're built tough, fly smart, and serve as the aerial eyes that never blink.

Training & Drone Lab Setup : We offer complete drone R&D lab setups for institutions, covering every stage from design and testing to flight and jamming. Our one-stop solution empowers students to explore the full spectrum of UAV technology under one roof. From theory to hands-on learning, we build India's next generation of drone innovators.





INDIGENOUS UAV ADVANCEMENTS

Javiat Aerospace Private Limited, headquartered in Bengaluru, India, is a leading force in the evolution of Testing and manufacturing of unmanned aerial systems and aerospace technologies. With a strong focus on innovation, precision, and performance, we develop advanced drone platforms, anti-drone defense systems, and high-accuracy motor-propeller testing equipment tailored for real-world aerospace challenges

Our team at Javiat Aerospace combines expertise and ingenuity to push the boundaries of aerospace technology. With a commitment to research and development, we continuously strive to enhance the performance, reliability, and security of our products. From our base in Bengaluru, we drive forward-thinking solutions that address real-world challenges, ensuring that our clients benefit from the latest advancements in UAV technology and aerospace systems. By fostering strong industry partnerships and maintaining a customer-centric approach, we are dedicated to achieving excellence and setting new standards in the aerospace field.

Driven by a vision to revolutionize aerospace with indigenous excellence, Javiat delivers technology that is trusted, scalable, and future-ready – serving the needs of India and the world.

Call +91-86185-26014 (or) Email contact@javiataerospace.in to connect with us

FOLLOW US



VISIT US

www.javiataerospace.in



D-FENDER 6 Channel Long Distance Drone Gun Jammer

1. INTRODUCTION

The D-FENDER is a next-generation, six-channel portable UAV jamming platform engineered for mission-critical protection of strategic zones, VIP assets, sensitive installations, and tactical forces. Built with high-gain directional antenna architecture, independent RF units, and fireproof rugged housing, the system ensures rapid neutralization of unauthorized drones at ranges up to 2000–2500 meters.

This product is purpose-built for organizations that cannot afford operational blind spots — law enforcement, security establishments, industrial infrastructure, and high-value events.



2. PRODUCT OVERVIEW

2.1 Key Capabilities

- 6 independently controlled RF jamming channels covering all major UAV communication and satellite navigation bands:
433 MHz, 900 MHz, 1.1 GHz, 1.5 GHz (GPS L1/L2), 2.4 GHz, 5.8 GHz
- High-gain 8–12 dBi directional antenna for long-range jamming.
- Effective range: 1000–2500 meters depending on terrain and obstruction.
- Neutralization time: ≤3 seconds from trigger activation.
- Battery backup: 40–50 minutes (extendable to 2 hours).
- Fireproof, impact-resistant housing for harsh environments.
- Built-in cooling system (inner fans) for sustained performance.

3. TECHNICAL SPECIFICATIONS

3.1 Physical Attributes

- Dimensions (Main Unit): 800 × 125 × 80 mm
- Weight: 6.3 kg standard; lightweight variants available on request



3.2 Jamming Channel Performance

Channel	Frequency Range	Output Power	Notes
CH1	2400–2485 MHz	46 dBm (40 W)	≥100 MHz bandwidth for UAV frequency-hopping coverage
CH2	5725–5850 MHz	44 dBm (25 W)	Wideband jamming for 5.8G FPV drones
CH3	860–930 MHz	41 dBm (10 W)	Sub-GHz control links
CH4	1560–1620 MHz	46 dBm (40 W)	GPS L1/L2 denial
CH5	1170–1280 MHz	40 dBm (10 W)	GNSS secondary bands
CH6	433–437 MHz	40 dBm (10 W)	Long-range low-frequency RC links

3.3 System Performance

- Total Output Power: 135 W
- Transmitter Gain: >110 dB
- Jamming Range: Up to 2500 m (environment-dependent)
- Water Resistance: IP65
- Operating Temperature: –20°C to +55°C
- Relative Humidity: 35–85%
- Battery: 24V, 10Ah (replaceable)
- Charge Time: ~3.5 hours

4. FUNCTIONAL BLOCK ARCHITECTURE

- Signal Generator → RF Amplifier → Band-Pass Filters → High-Gain Antenna
- Independent Control Switches route each RF chain

This architecture ensures rapid response, low latency, and highly directional neutralization.

5. COMPONENTS & CONTROLS

5.1 External Components

- Main trigger switch
- Power switch with LED indicator
- Individual channel ON/OFF switches
- Battery compartment (replaceable pack)
- Fan ventilation outlets
- Directional antenna panel



5.2 Indicators

- Power LED
- Battery status/charging indicator
- Channel activation indicators

6. OPERATING INSTRUCTIONS

6.1 Before Deployment

1. Ensure the battery is fully charged.
2. Inspect vents and casing for dust or obstruction.
3. Confirm frequency channels required for mission (GPS On/Off selectable).
4. Ensure no charging cable is connected during operation (strictly prohibited).

6.2 Standard Operation Steps

1. Hold the jammer firmly using the front and rear grips.
2. Switch POWER ON to activate the device.
3. Choose the required jamming bands:
 - 433 MHz, 900 MHz, 1.1G, 1.5G, 2.4G, 5.8G
4. Aim at the drone using the directional sight line — the jamming cone is ~45°.
5. Activate the trigger or channel switches.
6. Maintain continuous tracking until drone:
 - Loses control,
 - Returns home, or
 - Force-lands depending on mode.

6.3 Critical Usage Notes

- Running all bands at the same time increases power consumption. The document recommends limiting full-power multi-band use to under 10 minutes to extend battery life.
- Physical obstructions (buildings, trees, vehicles) reduce jamming distance.

7. CHARGING & BATTERY GUIDELINES

7.1 Charging

- Input: AC 100V–240V → DC 24V adapter
- Charging time: ~3.5 hours
- Do not power the jammer ON while charging.

7.2 Battery Best Practices

- Avoid continuous deep discharge.
- Store between 10–30°C when unused for long periods.
- Replace battery only with certified Javiat Aerospace units.

8. SAFETY PRECAUTIONS

1. Do not attempt to modify RF output modules.
2. Avoid pointing the jammer at personnel or sensitive RF equipment.
3. Ensure compliance with national RF emission policies (Indian regulatory conditions apply).
4. Never operate the unit while connected to power.
5. Maintain clearance around cooling vents for optimal internal airflow.



9. MAINTENANCE GUIDELINES

Routine Maintenance (Weekly/Monthly)

- Air-vent cleaning
- Switch/button functionality test
- Battery health check
- Channel performance verification (training team support available)

Annual Maintenance

- Full internal health audit
- RF performance re-calibration
- Antenna integrity assessment

Training & maintenance guidance is explicitly offered per your document.

10. WARRANTY & SUPPORT

From the specifications in the client document:

- 1-Year Standard Warranty on manufacturing defects
- Lifetime Maintenance Support (service-only, parts chargeable after warranty)
- Dedicated Customer Service with response commitment
- On-site training available at additional cost

Contact Channels:

- Website: www.javiataerospace.in
- Email: contact@javiataerospace.in
- Phone: +91 86185 26014

12. COMPLIANCE & LEGAL USAGE

- Usage must comply with Indian Wireless Planning & Coordination (WPC) norms.
- Javiat Aerospace provides guidance for clients seeking WPC authorization when required.
- Unauthorized deployment in civilian zones is strictly prohibited.

13. TROUBLESHOOTING GUIDE

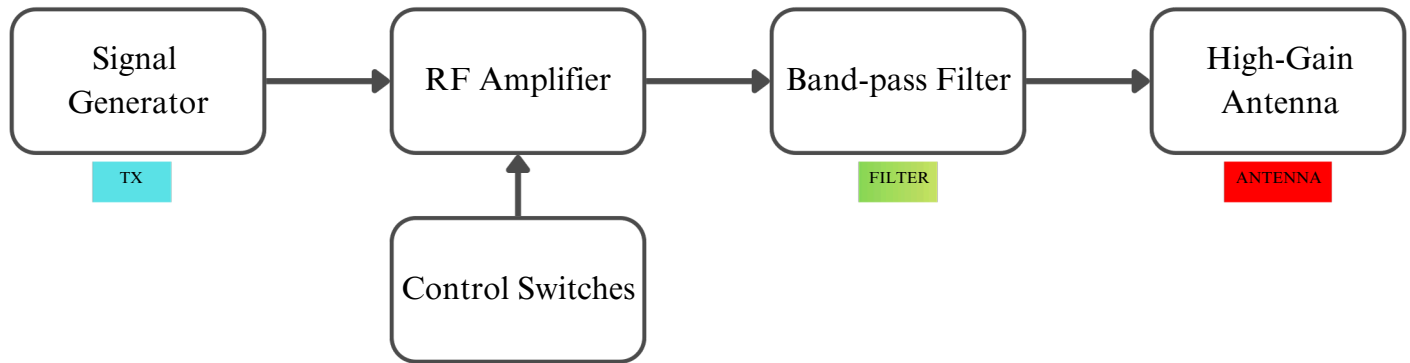
Issue	Possible Cause	Solution
Device won't turn on	Battery not charged	Charge fully (~3.5 hrs)
Reduced jamming range	Obstacles / low battery	Reposition / recharge
Overheating	Continuous multi-band use	Reduce channels, allow cooldown
Drone not responding	Wrong band selected	Activate appropriate channels

14. STORAGE CONDITIONS

- Storage Temperature: -20°C to +60°C
- Operating Temperature: -20°C to +55°C
- Humidity: ≤75%–85% recommended



FUNCTIONAL BLOCK DIAGRAM.



APPLICATION :

To avoid the rapidly emerging threat by UAV, our jammer can be used in below recommend places:

- **Government:** Prison, Court, Military, Police, other Law enforcement, etc.,
- **Infrastructure:** Petrol Station, Oil Depot, Gas Station, Airport, Drug rehabilitation centers, Security agency, etc.,
- **Public & Events:** Stadium & Events, Important Meetings, etc.,
- **Transportation:** Port & marine, Superyachts, etc.,
- Detention Centers, School (examination, library ,etc.,) Theatre, Church, Hospital, etc.,
- Personal VIP & Privacy, etc.,



POLICE



PRISON



SWAT



INFRASTRUCTURE



OIL DEPOT



MILITARY BASE



BASE STATION



AIRPORT



IMPORTANT BASE



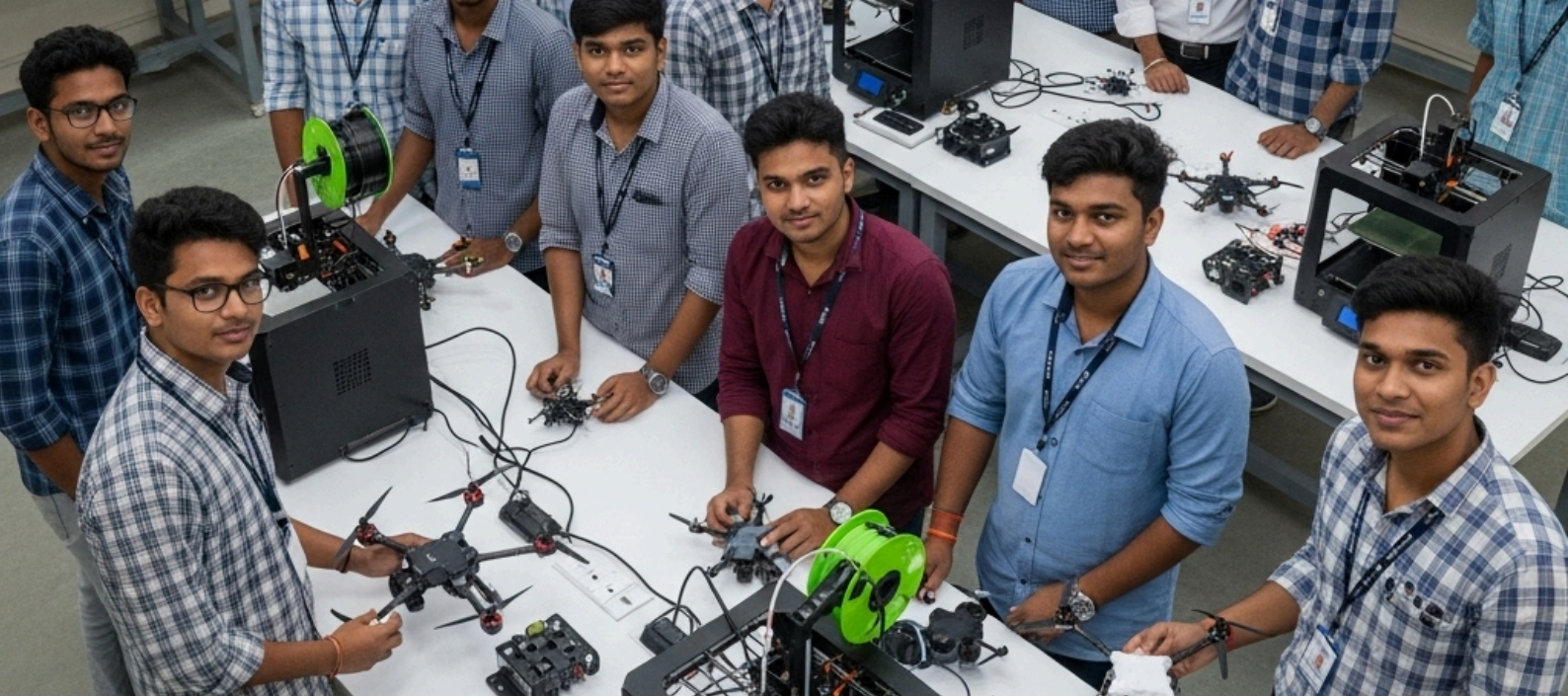
GOVERNMENT



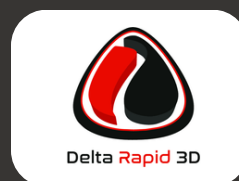
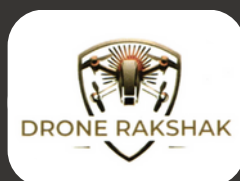
POWER PLANT



LARGE ACTIVITIES



OUR CLIENTS



OUR INDUSTRIAL PARTNERS



#startupindia





**JAVIAT
AEROSPACE**

Email : contact@javiataerospace.in

Phone : +91-86185-26014

Address: Ranka Junction, 3rd Floor 224, Old Madras Road,
Workflo by Oyo, Jn, Bengaluru, Karnataka 560016

FOLLOW US



www.javiataerospace.in

Copyright Notice and Content Accuracy: All content within this brochure, including text, images, and design, is the intellectual property of Javiat Aerospace Private Limited and is protected under copyright laws. Any unauthorized reproduction, distribution, or use of this material is strictly prohibited. While we have taken great care to ensure the accuracy of the information provided, Javiat Aerospace Private Limited disclaims any responsibility for errors or omissions. Specifications, features, and availability of products are subject to change without prior notice. For the most current and detailed information, please refer to our official documentation or contact us directly.

REV 1/2025