

DRONE Directional Neutralization & Optical Surveillance System

DZ-OF1 unmanned aerial vehicle optical detection and tracking system, includes visible light monitoring (color, black and white), infrared thermal sensor and infrared laser monitoring technology and equipment.

Visible light monitoring is used for the detection, validation and tracking of targets during daytime or nighttime glare conditions, infrared laser can be used when the target active infrared fill light, thereby enhancing the target monitoring resolution.

Infrared thermal induction can be applied to completely no light or low light conditions to detect the infrared emitted to target and identify the UAV target.

DZ-DN1 Directional RF Mitigation System is a purpose-designed multi-band system, includes two types solution, one is standard band type to inhibit 2.4GHz, 5.8GHz and GNSS signal. The other is optional full band type to be against UAV's signal across 40MHz to 6GH.

The two types solution are completely independent and complementary, which are combined with optical surveillance system to track, disrupt and neutralize the hostile targets.



DZ-DN1	
Index Name	DZRD-H10K-64A
Neutralizing frequency range	1550-1620MHz, 2400-2500MHz, 5725-5850MHz (Optional: 430-436MHz, 860-930MHz, 1180-1280MHz)
Navigation type	GPS (U.S.), Beidou (China), GLONASS (Russia) and Galileo (Europe)
RF neutralizing distance	3-5km (without block) custom-made the neutralizing distance.
Neutralizing time	No limit
Output power	<80W (basic frequency type - 3 bands) <120W (Full frequency type - 6 bands)
Power supply	AC220/10A
Detecting mode	Automatically and manually
Working time	7x24 hours (day and night, all weathers conditions).
Total weight	<30Kg (Basic frequency type) <40Kg (Full frequency types)

DZ-OF1		
Monitoring distance	Visible light	3,000m in the daytime and 1,500m in the night
	Thermal imaging	1,000m in the daytime and 1,200m in the night
IR lens	Focus	30~150mm (5 times continuous zoom)
	Viewing angle	3.1°×2.4°~15.2°×12.2°
Detector	Spatial resolution	0.25~1.00mrad
	Type	Uncooled microbolometer focal plane array (VOx)
	Effective pixels	324×256
HD lens	Spectral range	7~14μm
	Image processing	Digital detail enhancement(DDE), 10 pseudo-color
	Video output	PAL
Camera	Focus	15.6~500mm (32 times continuous zoom)
	Type of sensor	1/1.8"Progressive Scan CMOS
	Video resolution	1080p, support three-bit stream
Pan-Tilt	Load	50kg (bilateral loading structure)
	Horizontal angle	Horizontal 0°~360°, continuous rotation without limit
	Pitch angle	Pitch -20°~80°
Pitch speed	Horizontal speed	0.1°~12°/s, rotation speed settable
	Pitch speed	0.1°~8°/s, rotation speed settable