

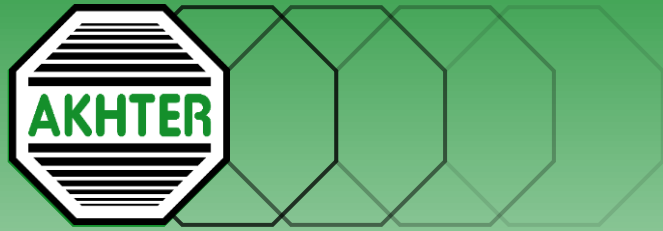
Akhter
Computers Ltd

1-3 Marshgate Business Centre, Harlow Business Park, Parkway, Harlow, Essex, CM19 5QP, UK
Tel: 01279 821200 - Email: Sales@akhter.co.uk - www.akhter.co.uk

Table of Contents



- Introduction
- What We Do
- Sectors Overview
- Service Overview
- Product Specifications



01

Company Overview

1-3 Marshgate Business Centre, Harlow Business Park, Parkway, Harlow, Essex, CM19 5QP, UK
Tel: 01279 821200 - Email: Sales@akhter.co.uk - www.akhter.co.uk

Introduction

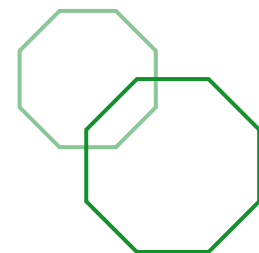
Trusted since

1979

Founded in 1979 by Professor Humayun Mughal, **Akhter Computers** has been at the forefront of technological innovation for over four decades.

From partnering with Acorn to develop the first computers for the BBC Schools Programme to supplying the Ministry of Defence in 1982, the company has built a legacy of trust, reliability, and technical excellence.

Today, Akhter stands as a leading UK government reseller and technology solutions provider, delivering end-to-end services across IT, hardware, software, audio-visual systems, and advanced assured products. With in-house developers, engineers, and architects, Akhter designs and builds bespoke IT solutions tailored to the specific needs of its clients—ranging from cutting-edge AI systems and gaming technology to battery innovation and office infrastructure.



What We Do

Broad spectrum

reliability

Akhter Computers serves a broad spectrum of public and corporate sector clients, including the Ministry of Defence, NHS, education institutions, security services, and blue light organisations.

The company operates across multiple government frameworks such as TePAS2, G-Cloud 14, KCS Procurement Y24003, and KCS Procurement Y21028, while also supporting procurement through platforms like Jaggaer and Proactis.

Its solutions power critical environments including NHS operating theatres, secure operational rooms, and defence communication networks. Beyond traditional IT supply, Akhter continues to drive innovation in emerging fields—developing rugged battery generators, secure AV and LED video wall systems, smart access control, AI and deep learning tools, and synthetic technologies such as AR, VR, and MR.



Current Supplier Partners



Sectors Overview



B l u e L i g h t



D e f e n c e



C o r p o r a t e



E d u c a t i o n



G o v e r n m e n t

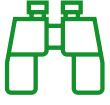


H e a l t h c a r e

Services Overview



**Strategic
Consulting**



**Discovery
Workshops**



**Infrastructure
Assessment**



**Solution Design
& Validation**



**Migration
Planning**



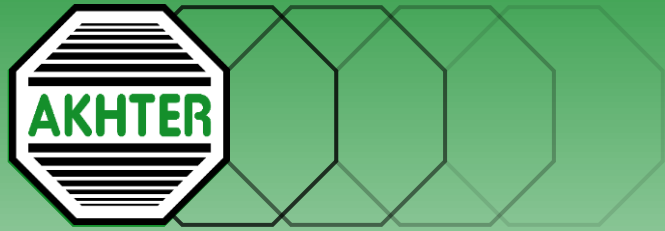
**Change & Risk
Management**



**Project
Management**



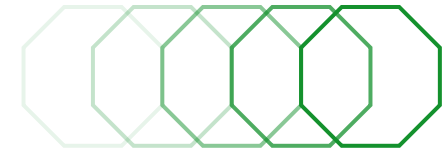
**Skills
Transfer**



03

Product Specifications

1-3 Marshgate Business Centre, Harlow Business Park, Parkway, Harlow, Essex, CM19 5QP, UK
Tel: 01279 821200 - Email: Sales@akhter.co.uk - www.akhter.co.uk



Akhter-Clogworks Technologies Limited is a UAV manufacturer based in the United Kingdom, offering multi-role, modular and adaptable carbon fibre multi-rotors.

With full stack in-house capabilities, we design, manufacture, assemble and fully test our high-performance autonomous systems to maximise quality, precision and performance.

We specialise in delivering high precision engineered UAVs to companies involved in industrial, security and commercial applications, as well as to Defence organisations.

Specifically, we offer:

- **Sovereign Manufacturing:** All systems are UK-designed and built, providing a secure alternative to non-NATO technology and mitigating supply chain risk.
- **Multi-role UAVs:** With a payload capacity of up to 12kg, we can integrate many solutions such as fibre optic reel, EO/IR sensors, Lidar surveying or dropping mechanism, amongst others. Our aircraft can also be tethered for semi-permanent surveillance operation.
- **Unified Avionics Architecture:** We have developed an industry leading avionics architecture, with non-proprietary software, which we deliver across all of our production standard systems.
- **Operational resilience:** Our systems are tested and proven to be operational even in the most extreme environments.

Our parent company, Akhter Computers Limited, has been a long-standing supplier of the UK MOD, for the last 40 years, and we can provide our products through MOD CP&F under the GCA Framework agreements.



DAK MATTER STAR



SPECIFICATIONS

The table below shows the aircraft specifications.

Dimensions

Overall dimensions (folded)	475 x 340 x 250 mm (LxWxH)
Overall dimensions (unfolded)	1122 x 1161 x 250 mm (LxWxH, with props extended)
Pack down	720 x 566 x 384 mm (LxWxH)
Time to setup	Less than 2 minutes

Power configuration

Number of motors	4 brushless electric motors
Motor make and model	Akhter-Clogworks
Electronic speed controller	Akhter-Clogworks 40A

Propellers

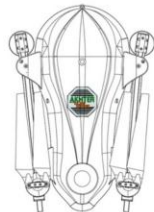
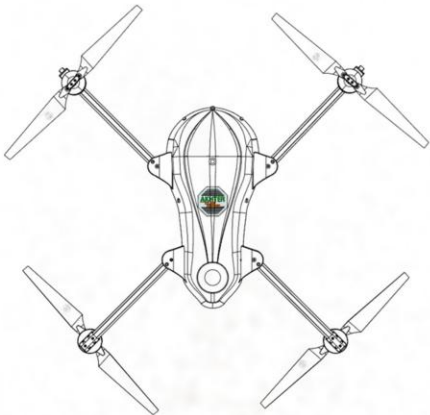
Propellers make and model	Akhter-Clogworks folding
Material	Carbon fibre
Orientation	2 CW and 2 CCW

Battery

Type	Lithium polymer (LiPo)
Nominal battery voltage	6S, 22.2V
Minimum battery configuration	10A (1 x 10A)
Maximum battery configuration	30A (1 x 30A)
Battery connectors	Integrated

Weights

Typical empty weight	3.4 kg
Max take-off mass	8.0 kg (at 20°C and 1013mbar)
Max payload capacity	Up to 3.0 kg, depending on specifications



Payload mounting

Location
System

Front (and bottom as option for tailored requirements)
Quick release with vibration dampers as standard

Efficiency

Flight endurance

Up to 88 minutes (with smallest payload)

Flight controller

Flight controller
Flight modes

Cube Orange (QGroundControl/MissionPlanner compatible)
Loiter, Altitude Hold, Stabilised, Return-to-Launch, GPS waypoint navigation (with auto land and take-off), Fly Here, Follow Mode
Incorporated
Incorporated
GPS/GLONASS/BeiDou/Galileo or a selection as required

Flight telemetry system
Battery telemetry system
Satellites

Command and Control

C2 and telemetry link frequency
C2 options

2.4/5.8 GHz as standard (other/extra frequencies as options)
Wireless licensed/unlicensed RF bands, Satcom, LTE, Fibre optics

Positioning accuracy

Horizontal
Vertical

Up to 0.4m or 0.02m with RTK
Up to 0.1m or 0.01m with RTK

Camera

Position
Camera options
OSD telemetry
Broadcast link frequency

Bottom front of core
Stabilised, Zoom, 4K/FHD, EO/IR
User configurable
2.4/5.8 GHz as standard (other/extra frequencies as options)

Lighting

Conspicuity light
Navigation lights
Beacon light (option)

Green flashing LED, stealth mode available
3 Watt red and green LED, stealth mode available
White (on/off/strobe)

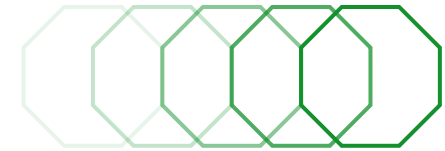
Operating limitations and conditions

Always stay within the limits set by your National Aviation Authority.	
Max horizontal speed	20 m/s
Max vertical speed	6 m/s
Wind tolerance	18m/s (40.3 mph)
Operating temperature	-20°C - +45°C
Precipitation	Can operate in rain or snow (IP44 equivalent)
Kp index	5 or less

Other options

Power
Detect and Avoid
AI

Tethered
ADS-B in/out
Object recognition & tracking





DARK MATTER #1 Gen3



SPECIFICATIONS

The table below shows the aircraft specifications.

Dimensions

Overall dimensions (folded, M to M)	1218 x 1055 x up to 710 mm (LxWxH, with props folded)
Overall dimensions (unfolded)	1746 x 1583 x up to 710 mm (LxWxH, with props extended)
Pack down	880 x 660 x 483 mm (LxWxH)
Payload ground clearance	Up to 280 mm (short legs) or 380 mm (long legs)
Time to setup	Less than 2 minutes

Power configuration

Number of motors	6 brushless electric motors
Motor make and model	Akhter-Clogworks
Electronic speed controller	Akhter-Clogworks 80A

Propellers

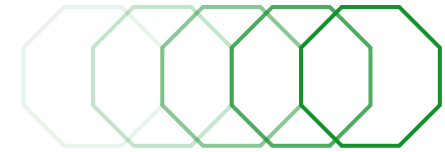
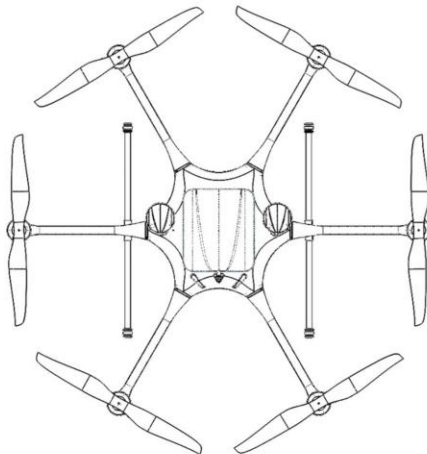
Propellers make and model	Akhter-Clogworks folding
Material	Carbon fibre
Orientation	3 CW and 3 CCW

Battery

Type	Lithium polymer (LiPo)
Nominal battery voltage	12S, 44.4V
Minimum battery configuration	30A (1 x 30A)
Maximum battery configuration	40A (1 x 40A)
Battery connectors	Integrated

Weights

Typical empty weight	9.0 kg
Max take-off mass	24.9 kg (at 20°C and 1013mbar)
Max payload capacity	Up to 12.0 kg



Bottom as standard (top as option)
Carbon fibre plate with rail system and vibration dampers

Payload mounting

Location
System

Efficiency

Flight endurance Up to 84 minutes

Flight controller

Flight controller Cube Orange
Flight modes Loiter, Altitude Hold, Stabilised, Return-to-Launch, GPS waypoint navigation (with auto land and take-off), Fly Here, Follow Mode
Flight telemetry system Incorporated
Battery telemetry system Incorporated
Satellites GPS/GLONASS/BeiDou/Galileo

Command and Control

C2 and telemetry link frequency 2.4/5.8 GHz as standard (other/extra frequencies as options)
C2 options Wireless licensed/unlicensed RF bands, Satcom, LTE, Fibre optics

Positioning accuracy

Horizontal Up to 0.4m or 0.02m with RTK
Vertical Up to 0.1m or 0.01m with RTK

Camera

Position Front of core
Camera options Stabilised, Zoom, 4K/FHD, EO/IR
OSD telemetry User configurable
Broadcast link frequency 2.4/5.8 GHz as standard (other/extra frequencies as options)

Lighting

Conspicuity light Green flashing LED, stealth mode available
Navigation lights 3 Watt red and green LED, stealth mode available

Operating limitations and conditions

Always stay within the limits set by your National Aviation Authority.

Max horizontal speed	20 m/s
Max vertical speed	6 m/s
Wind tolerance	18 m/s (40.3 mph)
Operating temperature	-20°C - +45°C
Precipitation	Can operate in rain or snow (IP45 equivalent)
Kp index	5 or less

Other options

Power Tethered
AI Object recognition & tracking



SPECIFICATIONS

The table below shows the aircraft specifications.

Dimensions

Overall dimensions (folded)	862 x 862 x up to 710 mm (LxWxH, with props folded)
Overall dimensions (unfolded)	1376 x 1376 x up to 710 mm (LxWxH, with props extended)
Pack down	880 x 660 x 483 mm (LxWxH)
Payload ground clearance	Up to 280 mm (short legs) or 380 mm (long legs)
Time to setup	Less than 2 minutes

Power configuration

Number of motors	4 brushless electric motors
Motor make and model	Akhter-Clogworks
Electronic speed controller	Akhter-Clogworks 80A

Propellers

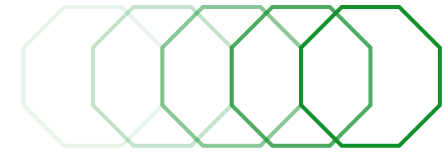
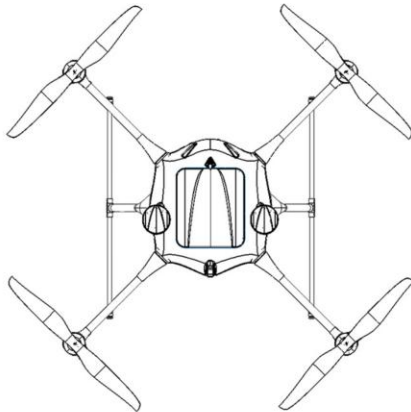
Propellers make and model	Akhter-Clogworks folding
Material	Carbon fibre
Orientation	2 CW and 2 CCW

Battery

Type	Lithium polymer (LiPo)
Nominal battery voltage	12S, 44.4V
Minimum battery configuration	30A (1 x 30A)
Maximum battery configuration	40A (1 x 40A)
Battery connectors	Integrated

Weights

Typical empty weight	7.5 kg
Max take-off mass	19.5 kg (at 20°C and 1013mbar)
Max payload capacity	Up to 8.0 kg



Bottom as standard (top as option)
Carbon fibre plate with rail system and with vibration dampers

Payload mounting

Location
System

Efficiency

Flight endurance Up to 84 minutes

Flight controller

Flight controller Cube Orange
Flight modes Loiter, Altitude Hold, Stabilised, Return-to-Launch, GPS waypoint navigation (with auto land and take-off), Fly Here, Follow Mode
Flight telemetry system Incorporated
Battery telemetry system Incorporated
Satellites GPS/GLONASS/BeiDou/Galileo

Command and Control

C2 and telemetry link frequency 2.4/5.8 GHz as standard (other/extra frequencies as options)
C2 options Wireless licensed/unlicensed RF bands, Satcom, LTE, Fibre optics

Positioning accuracy

Horizontal Up to 0.4m or 0.02m with RTK
Vertical Up to 0.1m or 0.01m with RTK

Camera

Position Front of core
Camera options Stabilised, Zoom, 4K/FHD, EO/IR
OSD telemetry User configurable
Broadcast link frequency 2.4/5.8 GHz as standard (other/extra frequencies as options)

Lighting

Conspicuity light Green flashing LED, stealth mode available
Navigation lights 3 Watt red and green LED, stealth mode available

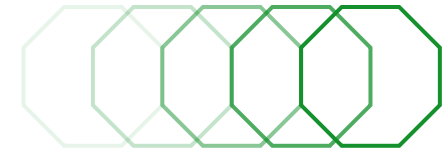
Operating limitations and conditions

Always stay within the limits set by your National Aviation Authority.

Max horizontal speed	20 m/s
Max vertical speed	6 m/s
Wind tolerance	18 m/s (40.3 mph)
Operating temperature	-20°C - +45°C
Precipitation	Can operate in rain or snow (IP45 equivalent)
Kp index	5 or less

Other options

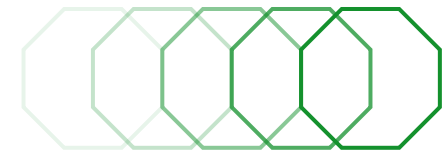
Power Tethered
AI Object recognition & tracking



AKHTER-CLOGWORKS – Tinhead Hill Farm Demo

Demo Location

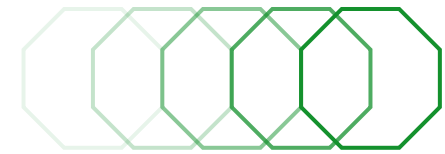




AKHTER-CLOGWORKS – Tinhead Hill Farm Demo

Various Sensor images

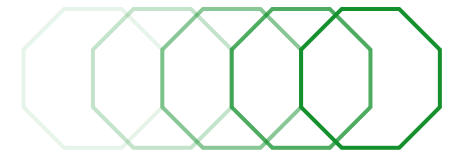




AKHTER-CLOGWORKS – Tinhead Hill Farm Demo

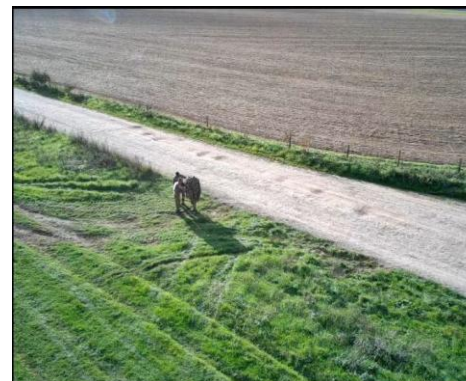
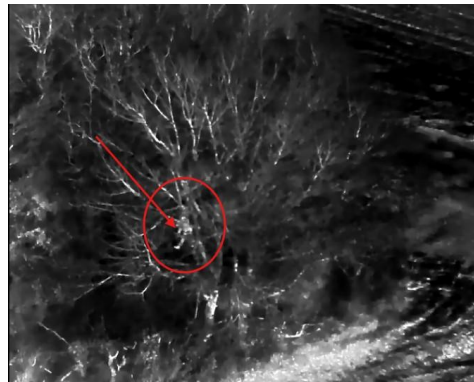
AI – Object Recognition & Tracking

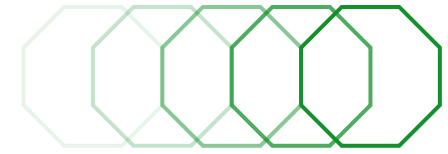




AKHTER-CLOGWORKS – Tinhead Hill Farm Demo

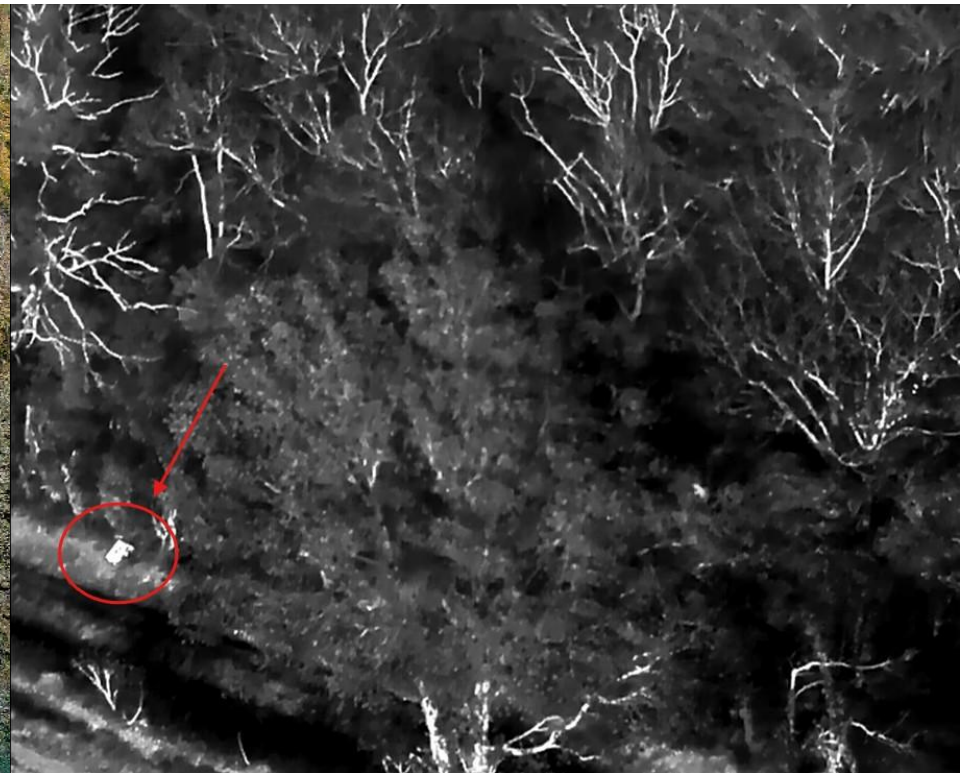
Cloak test results





AKHTER-CLOGWORKS – Tinhead Hill Farm Demo

Starlink antenna panel



Product Specifications

AKHTER-CLOGWORKS –SENSOR Specifications

Option 1:

- EO – 4k Ultra HD
- 8mp CMOS sensor
- 6 x digital zoom
- Starlight night vision
- AI – 10T computing power

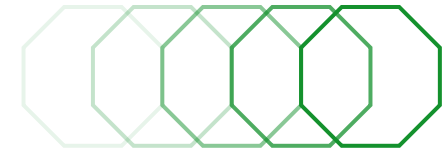
Option 2:

- EO zoom camera – 11x optical zoom, 165x hybrid zoom, 48mp (8k photo, 4k video)
- EO wide angle camera - 48mp (8k photo, 4k video)
- IR – 640x512 resolution, 30fps
 - Photo: 2560x2048 (super resolution)
 - Video: 1280x1024 (super resolution)
- LRF – 5 -to1200m
- AI – 10T computing power
- Night vision
- IP54

Option 3:

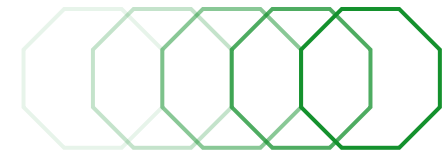
- EO zoom camera – 4K, 30x optical zoom, 180x hybrid zoom, (8k photo, 4k video)
- EO wide angle camera - 48mp (8k photo, 4k video)
- IR – 640x512 resolution, 30fps
- LRF – 5 -to1200m
- AI – 10T computing power
- Night vision
- IP54

Other sensor options available.



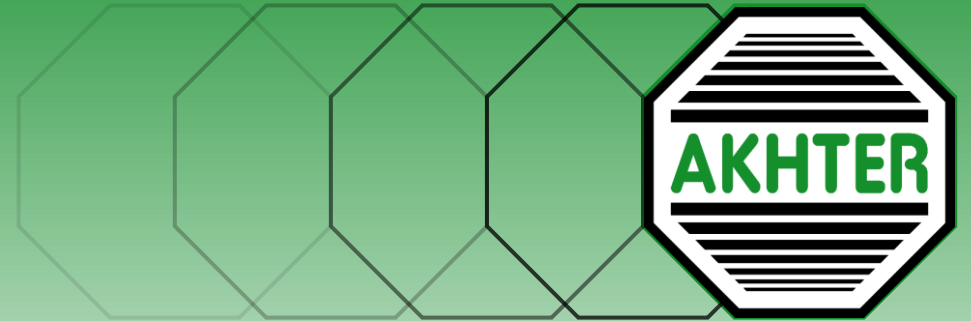
Product Specifications

AKHTER-CLOGWORKS –PAYLOADS OPTION



Akhter-Clogworks drones are equipped with a comprehensive range of payloads, including thermal cameras for heat detection, searchlights for illumination, loudspeakers for communication, cargo delivery boxes for transportation, water droppers, gimbal cameras for stabilized imaging, infrared cameras for night vision, optical cameras for high-resolution visuals, and advanced LiDAR mapping hardware and software for precise 3D mapping and surveying.

Thank you



Contact us

Phone

01279 821200

Email

Sales@akhter.co.uk

Website

www.akhter.co.uk