WESCAM’s MX-20 and MX-20D. 
Fully Digital. High Definition. 
Ultra Long-Range Multi-Sensor, Multi-Spectral Imaging and Targeting Systems

MX-20 Ideal for: 
High-Altitude; Long-Range MPA and Persistent Surveillance

MX-20 Airborne Installations: 
Fixed-Wing, Rotary-Wing, UAV, Aerostat

MX-20D Ideal for: 
High-Altitude; Covert Intelligence, Surveillance & Reconnaissance, Armed Reconnaissance, CSAR, Target Designation

MX-20D Airborne Installations: 
Fixed-Wing, Rotary-Wing, Aerostat

FEATURES & BENEFITS: MX-20 / MX-20D

True HD Cameras
- Superior imaging resolution from EO and IR cameras
- 2 mega-pixel EO zoom and spotter cameras
- True HD Digital Imaging
  - Fully digital – easily converts to analog to ease legacy integrations
  - No image degradation due to compression

Enhanced Local Area Processing (ELAP)
Real-time image enhancement for EO Day, EO Night & IR
- Increases stand-off range
- Improves feature detection & recognition
- High performance haze penetration

Solid-State IMU-Inside technology - 5 axis stabilization
- All sensors share highest level of stabilization
- No calibration required for LRU swapout
- Auto align to aircraft
- Nav grade IMU
  - Enhanced target location accuracy

Multi-Format
- Meets the needs of new & legacy platforms through multiple digital & analog output formats
- Concurrent digital & analog outputs

Multiple Laser Payloads
- Long Range Target Illumination, Pointing and Range-Finding

Short Wave IR Imaging
- Enhanced haze penetration & target contrast
- Laser spot imaging

Laser Target Designator (MX-20D)
- Compact, efficient and reliable diode-pumped laser
- Provides exceptional range through a small divergence high quality beam
- IMU Inside technology & exceptional EO/IR sensor range achieves unparalleled designating ranges
- Designator electronics package is incorporated into the turret payload

MX-GE0 Gen.3 Software Suite
- Achieves highest target location accuracy
- AVGT marries Video and GEO-Tracking to provide robust target tracking
- Discrete motion scanning for wide-area terrain visualization

MX-Series Commonality
The extensive interfacing capability of the MX-20 Family supports a wide range of installations spanning simple, single operator configurations through to complex, multi-operational systems. The software commonality and powerful built-in functionality within the MX-Series product family provides:
- Common operator interfaces and LRU’s
  - ease & familiarity of use
  - simplified interchangeability
  - efficiencies in support & technology enhancements

System Offerings:
MX-20
Base offering with 1080p HD resolution
MX-20D
1080p HD resolution and Designating capability

Product Enhancements:
- HD IR (MX-20 & MX-20D)
- Navigation Grade IMU (MX-20)
- SWIR Spotter TV

See our products in action on YouTube
Search:
- MX-20 Product Video
- MX-Series Product Video

wescam.com
### PAYLOAD SPECIFICATIONS

### MX-20
Select up to 7 Sensors

#### Sensor Options for Thermal Imager

- **Sensor #1a -**
  - **Type:** 3-5μm staring array
  - **Resolution:** 640 x 512
  - **Fields of View:** 18.2°, 3.7°, 0.73°, 0.24°
    - 720p & 1080p

- **Sensor #1b -**
  - **Type:** 3-5μm staring array
  - **Resolution:** 1280 x 1024
  - **Fields of View:** 31.5°, 6.4°, 1.3°, 0.86°
    - 720p & 1080p

#### Sensor Options for Daylight Spotter

- **Sensor #2 -**
  - **Type:** 2 Megapixel Color HD
  - **Fields of View:** 2.8° to 40.5° - 1080p
    - 720p, 1080i, 525i & 625i digital options

- **Sensor #3 -**
  - **Type:** 2 Megapixel Color HD or Mono HD
  - **Fields of View:** 0.92°, 0.46°, 0.29°, 0.17° - 1080p
    - 720p, 1080i, 525i & 625i digital options

- **Sensor #4b -**
  - **Type:** Diode - (ANSI Class 4)
  - **Wavelength:** 860nm
  - **Modes:** Continuous, Pulsed
  - **Beam Divergence:** Wide, Narrow or Ultra Narrow
  - **Sensor #5 -**
  - **Type:** Laser Illuminator (LI):
  - **Wavelength:** Selectable, 450-1000nm
  - **Fields of View:** 0.73°, 0.37°, 0.23°, 0.14° - 720p & 1080p

- **Sensor #6 -**
  - **Type:** Diode Pumped Nd/Yag
  - **Wavelength:** 1064nm/1570nm Selectable
  - **Modes:** Continuous, Pulsed
  - **Beam Divergence:** Wide, Narrow or Ultra Narrow

- **Sensor #7 -**
  - **Type:** Erbium glass (ANSI Class I), Eyesafe
  - **Wavelength:** 1540nm
  - **Pulse Rate:** 12 pulses/min.
  - **Range:** 30km
  - **Range Resolution:** ±5m

#### Notes:
- All FOV’s are for Digital outputs. Consult factory for FOV’s for Analog Outputs.

### MX-20D
Select up to 6 Sensors

#### Sensor Options for Thermal Imager

- **Sensor #1a -**
  - **Type:** 3-5μm staring array
  - **Resolution:** 640 x 512
  - **Fields of View:** 18.2°, 3.7°, 0.73°, 0.24°
    - 720p & 1080p

- **Sensor #1b -**
  - **Type:** 3-5μm staring array
  - **Resolution:** 1280 x 1024
  - **Fields of View:** 31.5°, 6.4°, 1.3°, 0.86°
    - 720p & 1080p

#### Sensor Options for Daylight Spotter

- **Sensor #2 -**
  - **Type:** 2 Megapixel Color HD
  - **Fields of View:** 1.8° to 27.7° - 720p & 1080p
    - 720p, 1080i, 525i & 625i digital options

- **Sensor #3 -**
  - **Type:** 2 Megapixel Color HD or Mono HD
  - **Fields of View:** 0.92°, 0.46°, 0.29°, 0.17° - 1080p
    - 720p, 1080i, 525i & 625i digital options

- **Sensor #4b -**
  - **Type:** Diode - (ANSI Class 4)
  - **Wavelength:** 860nm
  - **Modes:** Continuous, Pulsed
  - **Beam Divergence:** Wide, Narrow or Ultra Narrow

- **Sensor #5 -**
  - **Type:** Laser Illuminator (LI):
  - **Wavelength:** Selectable, 450-1000nm
  - **Fields of View:** 0.73°, 0.37°, 0.23°, 0.14° - 720p & 1080p

- **Sensor #6 -**
  - **Type:** Diode Pumped Nd/Yag
  - **Wavelength:** 1064nm/1570nm Selectable
  - **Modes:** Continuous, Pulsed
  - **Beam Divergence:** Wide, Narrow or Ultra Narrow

- **Sensor #7 -**
  - **Type:** Erbium glass (ANSI Class I), Eyesafe
  - **Wavelength:** 1540nm
  - **Pulse Rate:** 12 pulses/min.
  - **Range:** 30km
  - **Range Resolution:** ±5m

#### Notes:
- All FOV’s are for Digital outputs. Consult factory for FOV’s for Analog Outputs.

### SYSTEM SPECIFICATIONS

#### MX-20 & MX-20D

- **MX-20 Turrets**
  - MX-20: ≤ 200lbs (all sensors), 21.0”(D) x 26.25”(H)
  - MX-20D: ≤ 210lbs (all sensors), 21.0”(D) x 26.25”(H)

- **Power**
  - MIL-STD-704E, 320W (Avg.); 1000W (Max.)

- **Digital Master Control Unit**
  - <20 lb
  - 7.5”(W) x 12.13”(H) x 16.7”(D)
  - 50W (Avg.); 100W (Max.)

- **Autotracker**

- **Hand Controller Unit (HCU)**
  - 2 lbs, 4.25”(W) x 8.97”(L) x 3”(D)
  - 3.5W (Avg.); 5W (Max.)

- **Cables**
  - Consult factory for available variants

- **Environmental**
  - MIL-STD-461, MIL-STD-810

#### TURRET SPECIFICATIONS

- **Line-of-sight Stabilization**
  - Typically <4 radians. Consult factory for performance under specific vibration conditions

- **Stabilization and Steering**
  - (3) Axis Inner (pitch/yaw/roll)
  - (2) Axis Outer (azimuth/elevation)

- **Vibration Isolation**
  - (6) Axis Passive (x/y/z/pitch/roll/yaw)

- **AZ/EL Slew Rate**
  - 0-1rad/s

- **LOS Pan Range**
  - Continuous 360°

- **LOS Tilt Range**
  - +90° to -120°

#### STANDARD INTERFACES

- 5 Simultaneous EO/IR Digital and Analog
- Video channels: 1080p configurable for 720p, 1080i, 525i & 625i digital options
- MX-Hand Controller

#### OPTIONS AVAILABLE

- **MCU Interfaces:**
  - Moving Map Interface
  - Serial Remote Control
  - Radar Interface
  - MIL STD 1553B
  - GPS Time Sync
  - INS Data
  - Searchlight
  - Microwave
  - Metadata

- **Operator Interfaces:**
  - Operator Control Unit & Joystick
  - Moving Map system
  - GEO-Pointing

- **Microwave Equipment:**
  - MX-POD, Digital Transmitter
  - Diversity Rx

---

Equipment described herein may require Canadian and/or U.S. Government authorization for export purposes. Diversion contrary to Canadian and/or U.S. law is prohibited.

1 Consult factory for specific environmental and target conditions
2 Subject to change without notice.
3 WESCAM has a policy of continuous product improvement. Specifications are therefore subject to change without notice.

Inquiries: 1 800 668 4355 sales.wescam@l-3com.com