

Technical Specifications



Overview

The Netradyne Driver•i® D-810 is a fleet safety and intelligence platform integrating advanced AI and edge computing for situational awareness. The system supports up to eight modular HD video inputs with continuous recording. Key features include proactive risk event detection, real-time in-vehicle alerts, and automated driver coaching algorithms, generating objective performance data and driver scores.

Key Features

Unmatched 360° Awareness

Supports up to 8 high-definition cameras, including our smallest ever driver and road facing dash camera for complete, configurable coverage that eliminates blind spots.

Superior Video Quality, Day or Night

Full HD and HDR sensors capture sharp, detailed footage in all lighting conditions. Built-in infrared (IR) LEDs ensure clear night vision on driver-facing cameras.

Real-Time AI Risk Detection

Driver•i analyzes 100% of drive time, delivering up to 99%* alert accuracy. Instantly detects risky driving behaviors such as speeding, tailgating, and distraction, providing actionable insights when they matter most.

Seamless Connectivity & Smart Sensors

LTE, Wi-Fi, and Bluetooth for reliable, flexible connectivity. Integrated IMU, temperature, and light sensors enhance event accuracy and system intelligence.

Coaching & Positive Reinforcement

Provides near real-time audio feedback to drivers eliminating the need for human review. Recognizes safe driving habits to foster a proactive safety culture.

360 Al Advanced Safety

Upcoming auxiliary camera intelligence with features like Blind Spot Monitoring, Pedestrian Detection, Road Boundary Warning, and Rear Collision Warning for maximum risk mitigation.

Processor & Electrical

GPU	NVIDIA® Jetson Orin™ 6-Core Arm® Cortex 64-bit CPU
CPU	NVIDIA® Ampere 1024-Core architecture GPU with 32 Tensor Cores

Memory & Storage

RAM	8 GB
Internal Storage	200 Hours of Video Recording**

Rev. 2025-May 14.



Video Capabilities

Video Encoding Up to 1080p @ 30fps

Video Format MP4 with H.265 Encoding

On-board Sensors

6-Axis IMU Temperature Sensor Ambient Light Sensor

(Accelerometer + Gyroscope)

Wireless Connectivity & I/O

LTE Connectivity	4G-LTE
Supported Bands	2, 3, 12, 66, 71
SIM	Embedded SIM (eSIM)
Wi-fi	802.11 b/g/n/ac
Bluetooth	4.0
GNSS Receiver	Active GNSS Supporting GPS, GALILEO, BEIDOU, and IRNSS L5

Processor & Electrical

Input Voltage	8 V – 32 V DC
Input Current (Full Operation)	3.6 A @ 12 V
Max Power Consumption	45 W
Signal Input – High Voltage (Pos)	32 V
Signal Input – Low Voltage (Neg)	0 V

Active Mode Power Consumption

Peak Current (A)	2.6 A @ 12 V	
RMS Current (A)	1.5 A @ 12 V	
Peak Power (W)	31 W	
RMS Power (W)	18 W	

Periodic Wake-Up Mode Power Consumption

Peak Current (A)	1.76 A @ 12 V
RMS Current (A)	1.3 A @ 12 V
Peak Power (W)	21 W
RMS Power (W)	15.6 W

Shutdown Mode Power Consumption

Current (A)	8 mA @ 12 V
Power (W)	96 mW
Average Power Consumption	8 mAh

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Physical Characteristics

Dimensions	174 x 110 x 62 mm (6.85 × 4.33 × 2.44 in)
Weight	625 grams (1.38 lbs)
Color	Black
Case Material	Metal
Power Cable Length	3.3 meters
Power Cable Thickness	5.6 mm (0.22 in)

Environmental

Operating Temperature	-15° C to 55° C (5°F to 131°F)
Vibration	Conforms to ISO 16750-3:2007E
Operating Acceleration	57.9 m/s ² (5.79g)

Mechanical Shock

Pulse Type	Half sinusoidal
Accelerator	50gm
Pulse Duration	6 ms
Number of Shocks Per Axis	20 Nos (10 Positive and 10 Negative)

DR-20 - Dual Camera Specifications







Camera View	Road-Facing	Driver-facing
Pixel Size	2.8um X 2.8um	3µm х 3µm
Dynamic Range	120 dB	72 dB
Field of View	74° (H) 57° (V) 90° (D)	145° (H) 80° (V) 168° (D)
Construction	6G - Visible	6G + IR850 Filter
Responsivity	~5 V/lux sec	3.3 V/lux sec
Lens Ssize	1/2.9"	1/2.7"
F-Stop (focal length)	F1.6	F2.0

57.5 x 35.8 x 45 mm (2.26 x 1.41 x 1.77 in)

Rev. 2025-May 14.

Dimensions

netradyne driver•i

Included Accessories:



DR-20

Ultra-compact high-definition dash camera that captures synchronized, high-definition video from two lenses, minimizing windshield obstruction while providing comprehensive in-vehicle coverage.

Wired Alert Button

A driver-accessible remote button with an integrated speaker that allows for easy manual triggering of alerts. The integrated speaker provides clear in-vehicle audio coaching and notifications.

Cellular & GPS Module

This external module equips the D-810 device with reliable cellular and Global Positioning System (GPS) connectivity, enabling real-time location tracking, data transmission, and remote access.

Auxiliary Camera Requirements

Video systems	AHD / NTSC / PAL	
Resolution	720 / 1080P	
Input Voltage	12V	
Pin Connector	GX12 4-Pin	

Additional Accessories & Services

In Vehicle Display

This optional accessory provides crucial views from auxiliary cameras, automatically switching to full-screen when reversing or signalling. Available in 7 and 9 inches.

DMS Sensor

Award winning, dedicated sensor to deliver enhanced nighttime visibility plus the ability to see through sunglasses to detect drowsiness of the driver in real-time.

Vehicle Data Service

Add-on service that connects Driver•i to the vehicle engine control module (ECM) to provide real-time vehicle status, driver assistance, and driver management alerts.

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^{*}Al alert accuracy based on internal validation. Actual performance may vary by fleet and environment.

^{**}Actual hours may vary based on settings and conditions.