

realwear.

Free your hands in the most challenging of environments with RealWear Navigator® Z1.

Superpower frontline teams in hazardous environments with AI enabled, hands free solutions.

Built to tackle operational challenges, mitigate safety risks, and reduce the emerging knowledge gap from retiring experts. Experience hands-free communication and streamlined two way data sharing, that will revolutionize knowledge sharing for your frontline teams in hazardous environments.



Built for productivity



Stay connected wherever you are Faster connectivity with Wi-Fi 6/6E with an optional 5G solution.



View everything you need at a glance 720p HD display plus 128GB to store content locally.



Share what you see in incredible detail

48MP camera with advanced image stabilization.

Built for safety



Lightweight and comfortable for all-day use The lightest, toughest ATEX Zone 1 and CSA C1/D1 and mining-certified wearable computer.



Be heard in the loudest of environments

Noise cancellation enables voice operation in high ambient noise areas up to 100dBA.



Ruggedly built for demanding environments Stress tested, drop tested, and able to withstand extreme temperatures.

Built for the future



Run advanced tasks with Al-powered apps Al Core processor will continue to enable new use cases



Customize devices around the way you work Modular design and accessories provide additional functionality.



See the invisible with the Thermal Camera Module Optional unit to identify abnormal heat signatures.

Specifications

Core platform and functions	
Operating System	Android 12 (AOSP) + WearHF [®] hands-free interface
Chipset	Qualcomm [®] QCS6490
Memory	128 GB Internal Storage / 8 GB RAM
Included Applications	Document Navigator, Camera with Barcode Reader, Audio Recorder, Video Recorder, Webpage Viewer, Cloud Sync, Media Player, Calculator, Pedometer, Timer
Languages Supported	Chinese (Cantonese, Mandarin-Simplified and Traditional), Czech, Danish, Dutch, English (American, Australian, British, Indian), French, German, Indonesian, Italian, Japanese, Korean, Norwegian, Polish, Portuguese, Russian, Spanish, Thai, Turkish
Connectivity and sensors	
Bluetooth	Bluetooth Low Energy 5.2
Wi-Fi	Wi-Fi 6 (802.11ax) and Wi-Fi 6E (6 GHz)
GPS and Location	GPS, GLONASS, NavIC, BeiDou, Galileo, QZSS, and SBAS
IMU	9-DOF (3-axis accelerometer, magnetometer, and gyroscope), software enhanced stabilization
Battery	
Capacity	2550 mAh Li-Ion; removable and rechargeable (Outside of Zone 1)
Battery Life	Full shift with typical use
Physical characteristics	
Weight	383g
Ruggedization	Intrinsically Safe (ATEX Zone 1 and CSA C1/D1), 2 meter drop tested, IP66, MIL-STD-810H
Dedicated keys	Power key, application specific action key
Ports	3.5mm audio, 1 USB-C for data and charging
Boom arm	Adjusts six ways for all head sizes, left or right eye compatible, display flips out of way when not in use
Operating Temperature	-4° F to +131° F / -20° C to +55° C
Display	
Туре	24° field-of-view, 24-bit color LCoS, 0.35 inch diagonal, outdoor visible
Resolution	HD (1280x720)
Audio	
Microphones	4 digital microphones with active noise cancellation. Accurate noise cancellation up to 100dBA
Speaker	Internal 94dBA loudspeaker
Multimedia	
Camera	48 MP Sensor, PDAF with LED flashlight, modular (removable outside of Zone 1)
Video	Up to 1080p @ 60fps, >6X zoom in HD, video stabilization. codecs: VP8, VP9, H.264, H.265 HEVC
Accessories	
Included	Intrinsically Safe inline safety box charging cable, works with most RealWear Navigator accessories including mounting solutions, Intrinisically Safe hearing protection, replacement clips, and more. Single Battery Charger and Thermal Camera Module are planned future accessories. Not all accessories are rated for IS zones.