

# 8cx Gen 2 5G Compute Platform



## Productivity from anywhere.

The Qualcomm® Snapdragon™ 8cx Gen 2 5G compute platform combines the best of the smartphone with performance and efficiency for premium ultra-thin laptops with an Always On, Always Connected PC\* experience. Snapdragon 8cx Gen 2 delivers superior performance and multi-day battery life\*\*, with 5G and Wi-Fi 6 connectivity speeds. Combined with advanced camera and audio, AI accelerated experiences, and enterprise-grade security, you can connect, create, and communicate from virtually anywhere.



## Extreme performance and battery life



The Snapdragon 8cx Gen 2 5G compute platform with a powerful Qualcomm® Adreno™ GPU is engineered to provide superior performance and battery life that can last for up to 25+ continuous hours\*\*, which is up to 2X as long as a traditional laptop. Snapdragon 8cx Gen 2 delivers incredible battery life and up to 50% greater total system performance than the competition, so your laptop lasts longer and gets things done faster.



## Always On, Always Connected\* with 4G LTE, 5G, and Wi-Fi 6

Unleash multi-gigabit connectivity speeds with the Snapdragon X55 Modem-RF system, supporting 5G (sub-6 GHz and mmWave), 4G LTE, and Wi-Fi 6. Stay more securely connected, seamlessly switching between trusted Wi-Fi and cellular networks depending on location, and get accurate navigation and location-based services with location awareness. High speed connected computing for fast and efficient productivity and entertainment virtually anywhere.



## Powerful graphics, advanced camera and audio

The Snapdragon 8cx Gen 2 5G compute platform supports immersive graphics performance and hardware acceleration for enhanced video conferencing. Create, capture, edit, and stream in up to brilliant, 4K HDR and 32 MP camera. The integrated Qualcomm Aqstic™ echo cancellation and noise suppression (ECNS) audio technology is designed to deliver high-fidelity sound for an immersive video conferencing experience with dual 4K external monitor support for multi-tasking productivity.



## AI acceleration for advanced applications and experience

The dedicated Qualcomm® AI Engine takes advantage of the highly integrated Snapdragon 8cx Gen 2 architecture to deliver next-gen capabilities for intelligent camera, voice UI, security, and more to turn your PC into a hub of mobile productivity and entertainment.



## Enterprise-grade security

Snapdragon 8cx Gen 2 provides built-in security protections to make passwords and log-ons protected and easy with full Windows 10 and Windows 11 support, facial and fingerprint ID, and platform support for Windows Hypervisor and Secured-core PC. Cellular connectivity eliminates the need for relying on unsecure public Wi-Fi networks while allowing untethered, remote connections.

\* Requires network connection and compatible network.

\*\* Battery life varies significantly with settings, usage, and other factors

All comparisons made based on Qualcomm Snapdragon 8cx Gen 2 reference laptop vs. Intel Core i5 L16G7-based system. Results will vary depending on OEM implementation and other factors. Qualcomm Snapdragon, Qualcomm Adreno, Qualcomm Aqstic, and Qualcomm AI Engine are products of Qualcomm Technologies, Inc. and/or its subsidiaries.



## Specifications & Features

### CPU

- Cores: Qualcomm® Kryo™ 495 Octa-core CPU
- Architecture: 64-bit
- Process Technology: 7nm

### Memory & Storage

- Memory Type: LPDDR4x, 8 channels
- Memory speed: Up to 2133 MHz
- Storage: NVMe SSD, UFS 3.0

### Visual Subsystem

- Qualcomm® Adreno™ GPU
- API Support: DX12

### Video

- Video Playback: Up to 4K HDR @ 120fps
- Codec Support: H.265 (HEVC), H.264 (AVC), VP9
- Video Software: Rec. 2020 color gamut video capture, Up to 10-bits per color video capture

### Display

- Max On-Device Display: 4K Ultra HD
- Max External Display: Two 4K Displays over DP-MST

### Camera

- Image Signal Processor: Qualcomm Spectra™ 390 image signal processor, Dual 14-bit ISPs
- Dual Camera: Up to 16 MP
- Single Camera: Up to 32 MP
- Video Capture (30 FPS): 4K HDR video capture, 4K Ultra HD video capture
- Slow Motion Video Capture: 720p @ 480 FPS

### Audio

- Qualcomm TrueWireless™ Technology, Qualcomm® Broadcast Audio technology, Qualcomm Aqstic™ audio technology
- Qualcomm® aptX™ audio technology: Qualcomm® aptX™, Qualcomm® aptX™ HD

### Qualcomm® AI Engine

- Qualcomm® Hexagon™ 690 Processor
- Qualcomm® Sensing Hub technology

### 5G Modem-RF System Connectivity

- Qualcomm® Snapdragon™ X55 Modem-RF System
- Supported Technology: 5G NR
- Support for sub-6 GHz and mmWave
- 5G Peak Download Speed: 7 Gbps
- 5G Peak Upload Speed: 3 Gbps
- 5G Modes: FDD, TDD, SA (standalone), NSA (non-standalone)
- 5G mmWave specs: 800 MHz bandwidth, 8 carriers, 2x2 MIMO
- 5G sub-6 GHz specs: 200 MHz bandwidth, 4x4 MIMO
- 5G RF: 100 MHz envelope tracking, Adaptive antenna tuning

### 4G Modem Connectivity

- Qualcomm® Snapdragon™ X24 LTE modem
- Downlink LTE Category: LTE Category 20
- LTE Downlink Features: Downlink LTE Streams: Maximum 20 spatial streams
- Downlink Carrier Aggregation: 7x20 MHz carrier aggregation
- Downlink LTE MIMO: Up to 4x4 MIMO on five carriers, Full-Dimension MIMO (FD-MIMO)
- Downlink QAM: Up to 256-QAM
- Uplink Technology: Qualcomm® Snapdragon™ Upload+, Uplink Data Compression (UDC)
- Uplink Carrier Aggregation: 3x20 MHz carrier aggregation
- Uplink LTE Streams: Up to 2x 106Mbps LTE streams
- Uplink QAM: Up to 256-QAM
- LTE Peak Download Speed: 2 Gbps
- LTE Peak Upload Speed: 316 Mbps
- Cellular Technology: WCDMA (DB-DC-HSDPA, DC-HSUPA), TD-SCDMA, CDMA 1x, EV-DO, GSM/EDGE
- LTE Technology: LTE FDD, LTE TDD including CBRS support, LAA, LTE Broadcast

### OS Support

- Supports Windows 10 and Windows 11

### OS FEATURES

- Improved crypto-security
- Remote management and location awareness for enterprise efficiency

### Wi-Fi & Bluetooth Connectivity

- Wi-Fi Standards: 802.11ax (Wi-Fi 6), 802.11ad, 802.11ac Wave 2, 802.11a/b/g, 802.11n
- Wi-Fi Spectral Bands: 2.4 GHz, 5 GHz, 60 GHz
- MIMO Configuration: 2x2 (2-stream)
- Bluetooth Standards: Bluetooth 5.1

### Location

- Satellite Systems Support: Beidou, Galileo, GLONASS, GPS, QZSS, SBAS
- Location Support: Qualcomm® Location
- Global Emergency Services Support: Assisted GPS, OTDOA (LTE-based positioning)

### Charging

- Qualcomm® Quick Charge™ 4+ technology