

XR Solution



Thundercomm is a professional end-to-end XR solution provider based on Qualcomm® Snapdragon™ dedicated XR platforms including 4100/5100/XR1/XR2 Gen1/XR2 Pro/AR2/XR2 Gen2. Our services include hardware design, software development, testing and manufacturing. The solution featuring high performance, high resolution, low latency, low distortion rate, and customized Android OS for VR/AR headset. With a powerful VR SDK which can support SLAM/6DOF and various interactive modes for VR/AR devices.

Solution Highlight

- Tailor & Optimized Android OS + Fastboot
- XR SDK based on OpenXR API
- Low latency stereo rendering < 19 ms
- 6DOF Hand/Head Tracking Algorithm
- Various Plug-in
- Launcher and Key Applications
- Reference design ready for referring and building the prototype and platform evaluation
- Vertical Field : AR, VR and MR Product

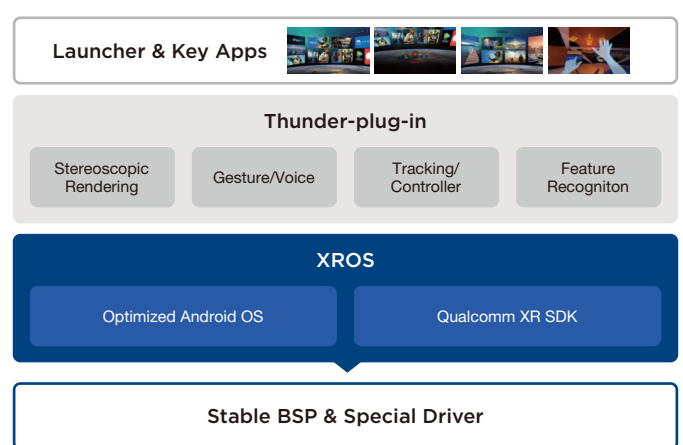
Reference Design



Computing

SoC	Qualcomm® Snapdragon™ XR2
Memory/Storage	8GB LPDDR5, 128GB UFS3.1
Display	
Optical	QTECH Pancake Module with 95~105° FOV
Resolution	2.1 inch 2 × 2280 × 2280 @90fps
Sensor	
6DoF	4 × 6DoF Camera
See Through	2 × RGB Camera
Eye Tracking	2 × IR camera (Optional)
IMU	Accelerometer, gyroscope, magnetometer
Audio	
Microphone	3 × digital microphone
Speaker	Stereo speaker
Connectivity	
Wi-Fi	2 × 2 Wi-Fi6/BT 5.2/USB Type-C
Fit	
Size/Weight	240 × 68 × 161mm, 460g (370g without binding and back power pack)

Solution Structure



Computing

SoC	Qualcomm® Snapdragon™ Wear 5100
Memory/Storage	2GB LPDDR3, 8GB eMMC5.1
Display	
Optical	Waveguide with 30° FOV
Resolution	2 × 1280 × 720 @60fps
Sensor	
RGB Camera	1 × RGB camera
IMU	Accelerometer, gyroscope, magnetometer
Audio	
Microphone	2 × digital microphone
Speaker	Stereo speaker
Connectivity	
Wi-Fi	1 × 1 Wi-Fi 2.4G/5G/BT 5.1/USB Type-C
Fit	
Size/Weight	206 × 168 × 57mm, 100g

Success Stories



YVR
D1 VR HMD



Lenovo ThinkReality
A3 AR Glasses



Vuzix
M400 AR Glasses



Rokid
AR Glasses



LLVison
Smart AR Glasses