

PERASO

WIRELESS
UNLEASHED™

UNLEASH THE POWER OF 5G mmWAVE

AUGUST 2022

DISCLAIMER

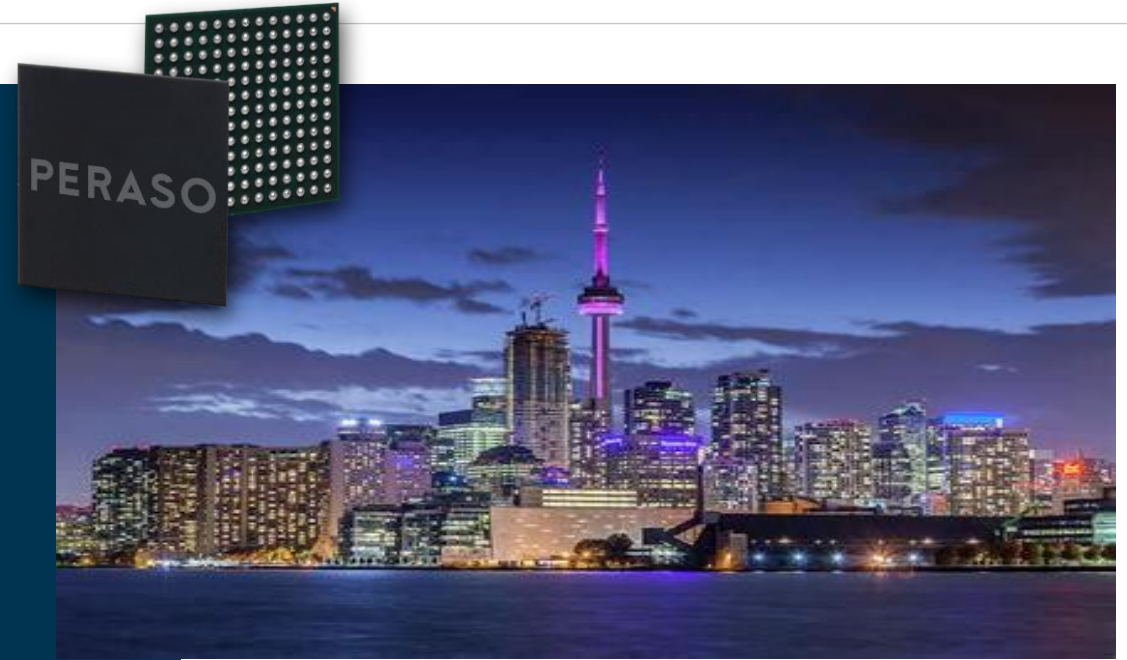
This presentation is for information purposes only. Certain information contained herein has been derived from sources prepared by third parties. While such information is believed to be reliable for the purposes used herein, we makes no representation or warrant with respect to the accuracy of such information. Trademarks and trade names referred to in this presentation are the property of their respective owners. We do not intend our use or display of other companies' trademarks or trade names to imply a relationship with, or endorsement or sponsorship of us by, any other companies.

This presentation contains forward-looking statements. All statements other than statements of historical facts contained in this presentation, including statements regarding the completion of business combination, the future results of operations, business strategy, timing, capabilities, and likelihood of success of combined company, and plans and objectives of its potential management for future operations, are forward-looking statements. Forward-looking statements also include statements regarding the expected benefits of the proposed business combination. These statements involve known and unknown risks, uncertainties and other important factors that may cause our actual results, performance or achievements to be materially different from any future results, performance or achievements expressed or implied by the forward-looking statements. Because forward-looking statements are inherently subject to risks and uncertainties, some of which cannot be predicted or quantified and some of which are beyond our control, you should not rely on these forward-looking statements as predictions of future events. The events and circumstances reflected in our forward-looking statements may not be achieved or occur and actual results could differ materially from those projected in the forward-looking statements. Moreover, we operate in an evolving environment. New risk factors and uncertainties may emerge from time-to-time, and it is not possible for management to predict all risk factors and uncertainties. Except as required by applicable law, neither company plans to publicly update or revise any forward-looking statements contained herein, whether as a result of any new information, future events, changed circumstances or otherwise. Other important assumptions and factors that could cause actual results to differ materially from forward-looking statements, including discussions of significant risk factors, may appear in Peraso's public filings with the SEC, which are accessible at www.sec.gov, and which you are advised to consult.

This presentation does not constitute an offer to sell, or the solicitation of an offer to buy, any securities, nor shall there be any sale of securities in any states or jurisdictions in which such offer, solicitation or sale would be unlawful.

Company Overview

- **12 years of pioneering experience** in mmWave RF/Antenna design
- **Field Proven** high-performance **mmWave phased array** - Advanced **Beamforming**
- Fully integrated solutions; **mmWave antennas, RF phased array transceivers**, on-the-fly **calibration** and adaptable **beam steering**
- Capturing **design wins** today in both existing and new mmWave hardware
- **Multiple Tier-1** design wins

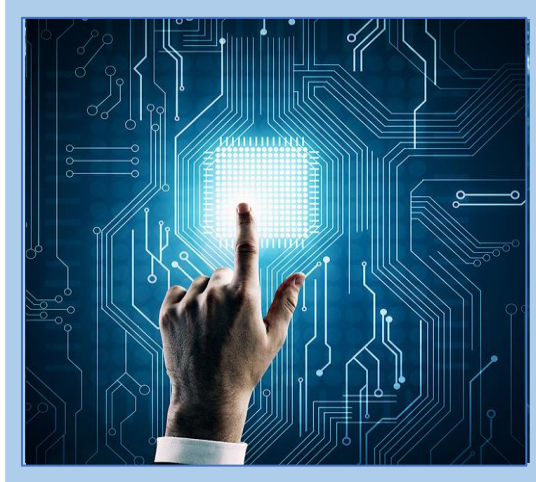


Ticker: *PRSO* (NASDAQ)
Headquarters: *San Jose, CA*
Founded: *2008*
Employees: *80* (as of June 30, 2022)
Patents: *150*

Technology Backed by Strong IP & Patent Portfolio

mmWave RF in Silicon

High-performance, highly integrated mmWave RF circuits and systems in silicon

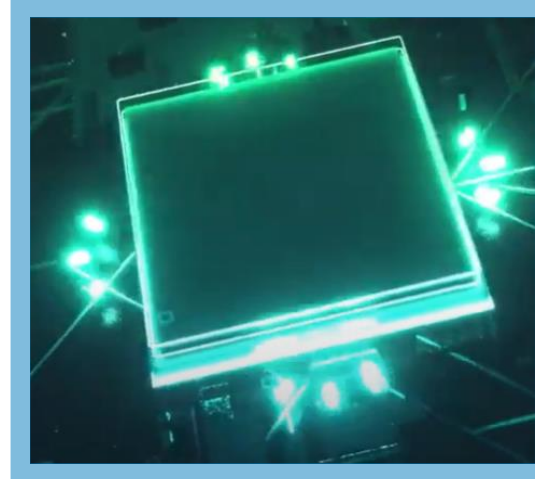


Essential Claims

Participated in mmWave standard development and have essential claim patents

mmWave Antennas

mmWave phased array antennas, advanced beamforming and beam steering algorithms



Most Comprehensive Software Support

Full software stack enables a host of new applications, such as point to multipoint and wireless USB

Established and Sustainable Advantages



Performance

Customers shipping equipment providing 10X the range of their competition



Experience

Proven execution in mmWave RF circuits where potential competitors have failed



Customer Relationships

Deep engagement with customers provides visibility to long term roadmaps



Switching Costs

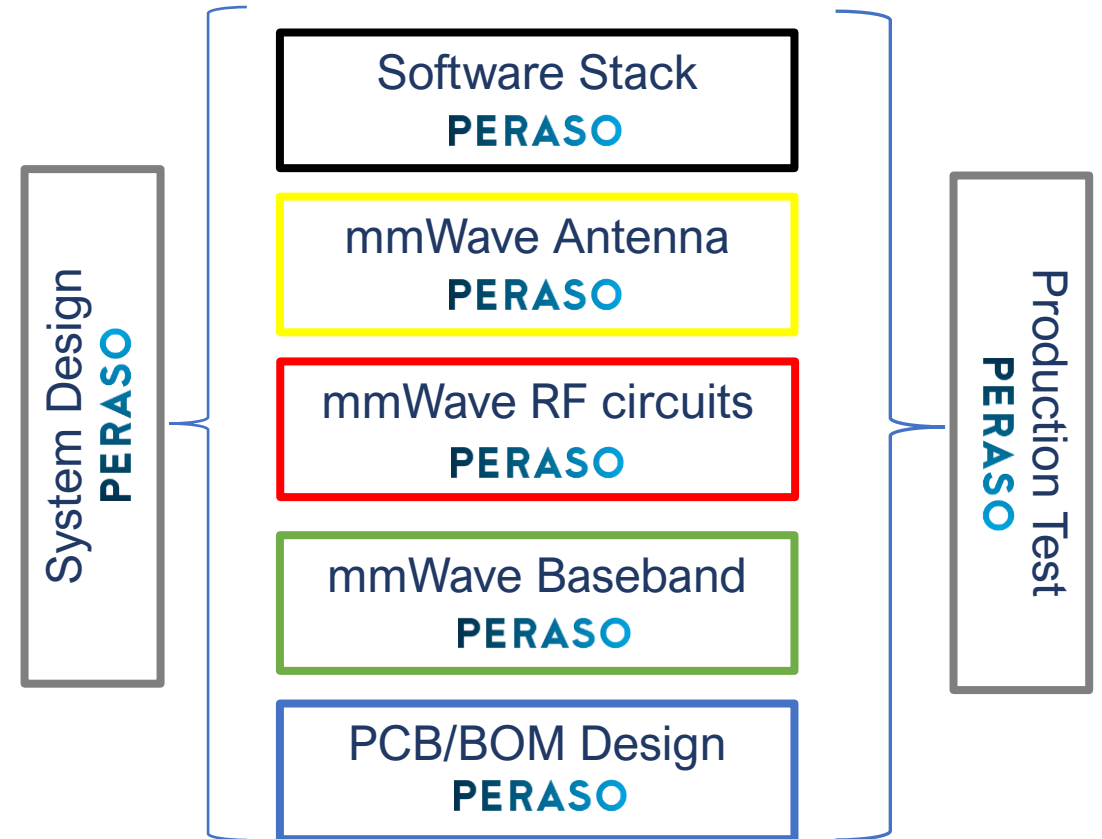
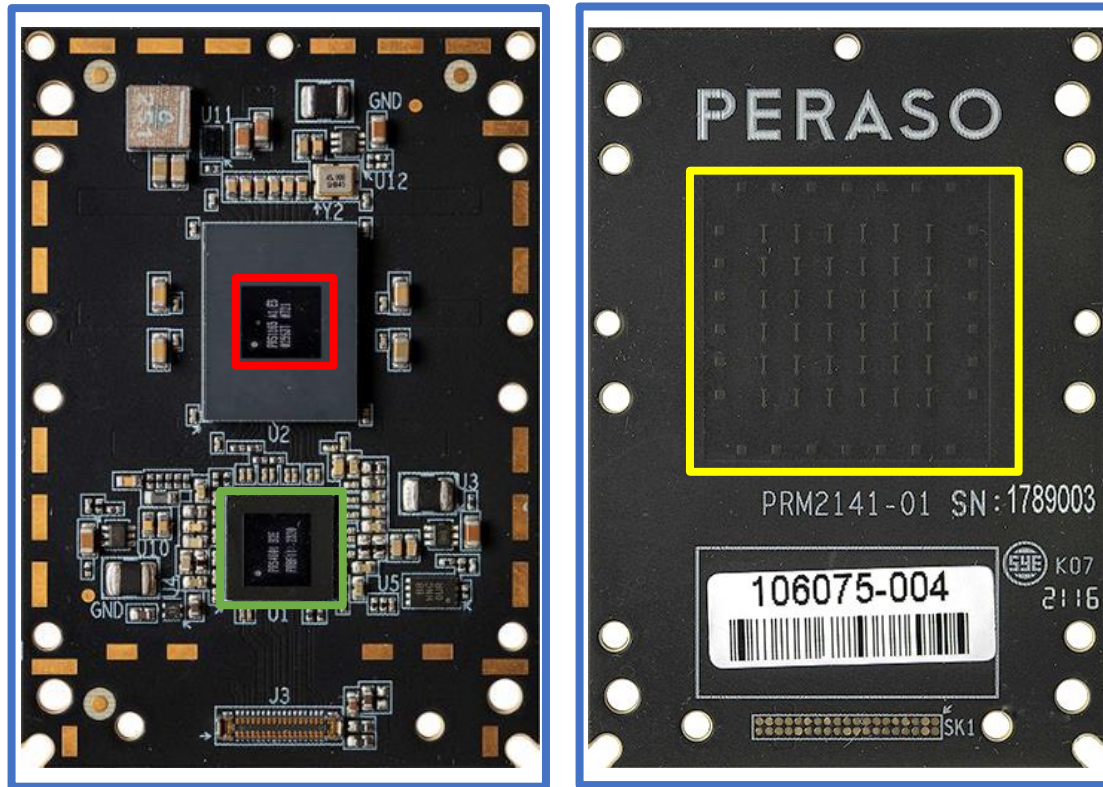
Platform of mmWave RF circuits coupled with proprietary software platform creates long-term customer commitment



Cost Advantages

Volume production of mmWave RF circuits leads to opportunity for further cost reductions

Vertical Integration >> Premier Module Solutions



Vertical Integration offers competitive cost structure, reduced time-to-market

Roadmap Unlocks High-Growth TAMs

Today

Roadmap

mmWave Fixed Wireless Access

TAM: **\$335M**
Performance: 3 Gbps
Range: 100m – 2 km
Market KPI: 100Mbps download, 32 clients



TAM: **\$635M**
Performance: 15Gbps
Range: 100m – 5km
Market KPI: 1Gbps download, 64 clients

VR Connectivity

TAM: **\$150M**
Performance: 3 Gbps
Range: 10m
Market KPI: 500 Mbps, 5ms



TAM: **\$250M**
Performance: 15 Gbps
Range: 20m
Market KPI: 10Gbps, 20m, 5ms

5G End User Equipment

TAM: **\$127M**
Devices: customer premise equipment (CPE)

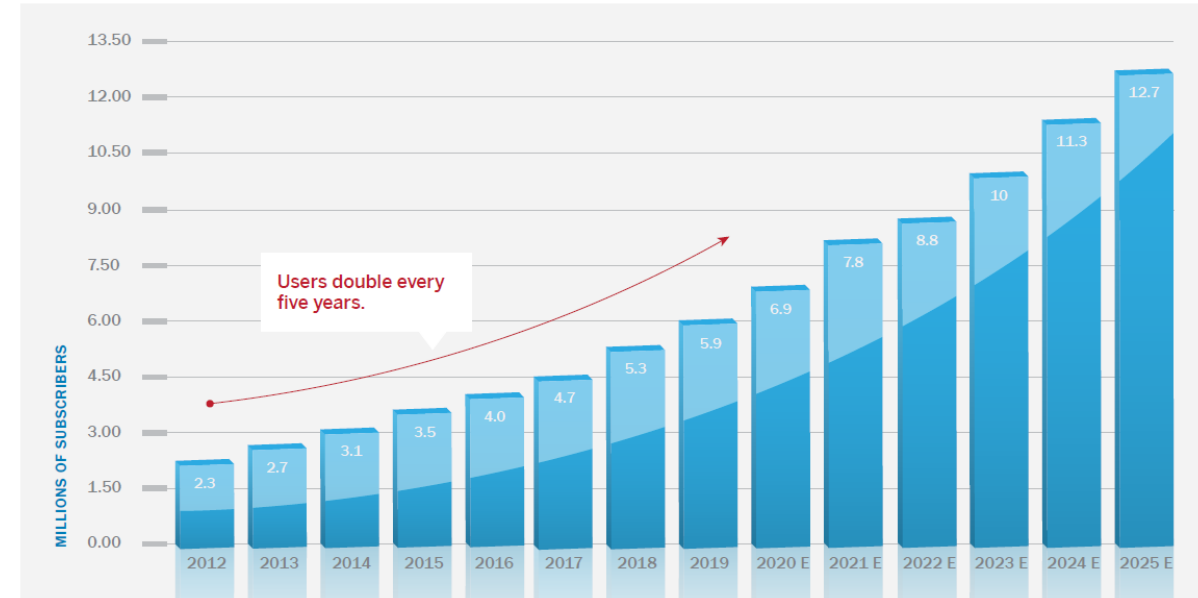


TAM: **\$1.5B**
Devices: CPE, laptops, hotspots

Wireless ISPs (WISP) Experiencing High Growth

- 6.7M wireless ISP (WISP) subscribers in U.S., expected to grow to 12.7M subscribers in 2025
 - Carmel Group predicts 100% growth every 5 years
- Significant WISP financing activity
 - WeLink announces \$185M financing (Jan. 2021)
 - Starry (NYSE:STRY) de-SPAC enters market at \$1.66B valuation (Mar. 2022)
 - Tarana raises \$170M, breaking \$1B valuation (Mar. 2022)
- U.S. government providing significant support for universal broadband access
 - RDOF allocating \$20.4B for build out of broadband networks for rural communities

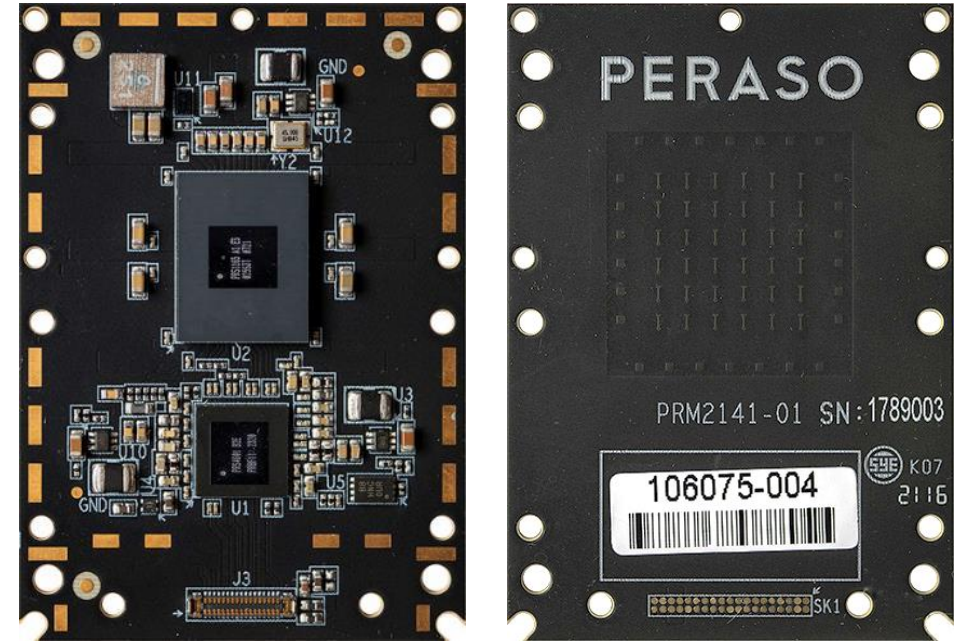
Wireless ISP Subscribers (U.S.)



(E) Estimated/Projected.
Source: The Carmel Group
Numbers and estimates by The Carmel Group are for U.S. operators serving residential subscribers and non-residential subs.
Copyright 2021. All Rights Reserved. Unauthorized distribution, publication, or other uses are strictly prohibited.

Established Leader in mmWave FWA Silicon

- 1Q'22 introduction of PERSPECTUS FWA module establishes Peraso as premier supplier of mmWave silicon to WISP ecosystem
 - Support of Point-to-Multipoint (PtMP) has significantly improved Peraso TAM (vs PtP)
 - Significant reduction in customer time-to-market
 - Up to 10x the range in point-to-point links
- 6 existing FWA customer engagements
 - Received purchase orders totaling \$6.4M in mid-2022 – fulfilled from late 3Q'22-1H'23
 - Pipeline expected to grow for balance of 2022

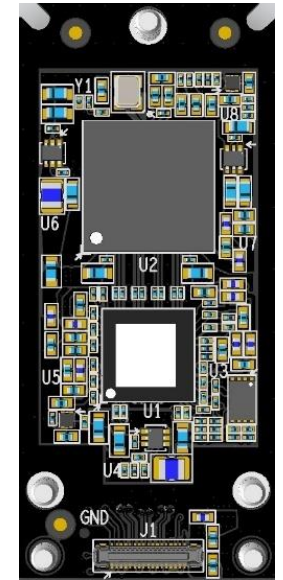


Wireless Internet Service Provider Ecosystem



VR Wireless Connectivity Opportunity

- mmWave is an ideal technology to support wireless VR headsets
 - High data rate (3 Gbps), low latency (< 5ms), low interference
- Latest ABI VR predicts ~6M VR headsets in 2025
 - Translates to 2025 TAM of \$250M for Peraso
- Prediction of VR in a broad variety of markets, including gaming, real estate, healthcare, transportation, etc.



VR HMD Shipments by Form Factor
World Markets: 2020 to 2027

Form Factor	Shipments	2020	2021	2022	2023	2024	2025	2026	2027
Standalone	(000s)	2,633.72	8,427.91	14,748.84	23,598.15	35,397.23	46,016.39	63,502.62	79,378.28
Mobile	(000s)	1,420.74	1,202.62	1,055.03	1,145.02	1,500.79	2,078.04	2,430.99	3,025.08
Tethered	(000s)	2,574.67	2,960.87	3,493.83	4,297.41	5,070.94	5,933.00	7,000.95	7,701.04
Total	(000s)	6,629.14	12,591.41	19,297.70	29,040.58	41,968.96	54,027.44	72,934.56	90,104.39

Source: ABI Research

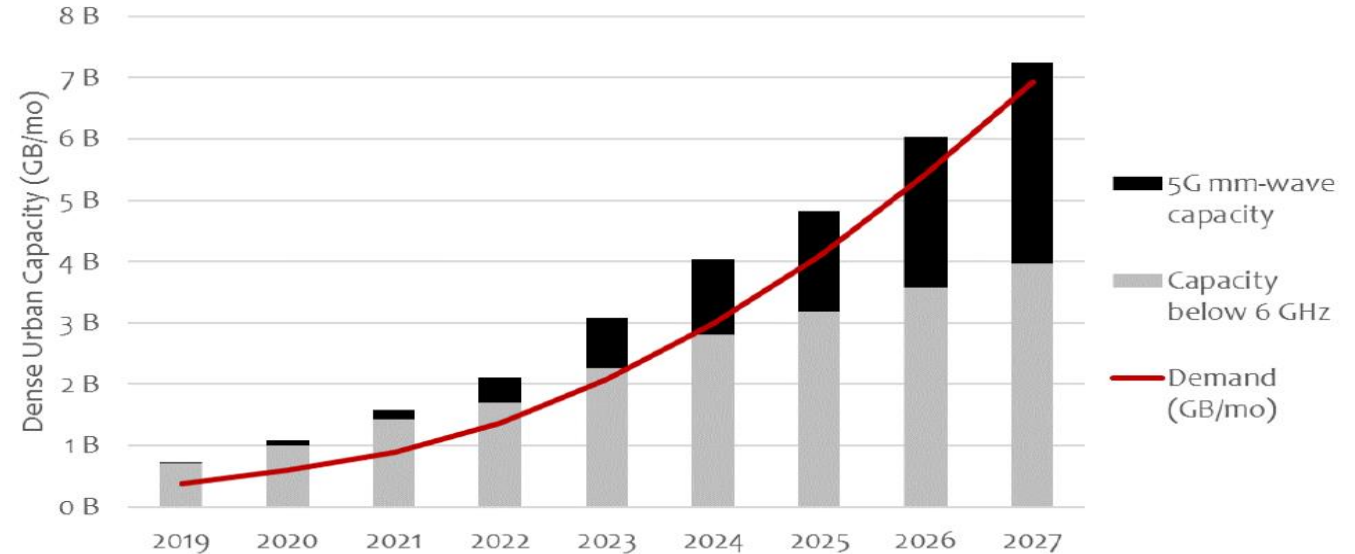


5G Wireless Demand Outpacing Network Capacity



- Wireless network demand is growing exponentially; video a primary driver
- Current cellular networks are quickly saturated – mmWave is the future of wireless networks
- Early 6G research utilizing mmWave and terahertz frequencies

Demand Capacity for Data in U.S. Networks



Source: Mobile Experts: 5G Business Case April 2022

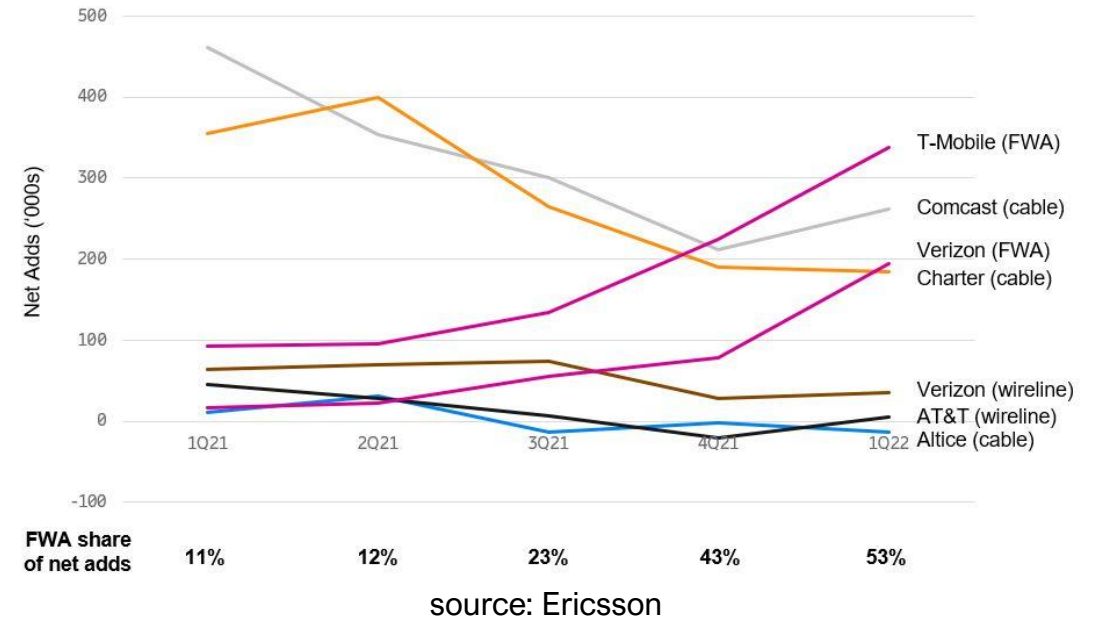
mmWave is Global Technology and Solution

- More than 75% of service providers in over 100 countries offer FWA
- 5G mmWave deployments: **NTT Docomo, KDDI, Softbank & Rakuten**
- Major China carriers have commenced formal collaboration to advance mmWave solutions in Chinese telecom market

FWA is Bright Spot in Carrier 5G Rollouts

- Fixed wireless access emerging as battleground for Verizon, T-Mobile U.S....and cable companies
 - Combination of C-band and mmWave potentially exceed gigabit connectivity
 - Verizon expects 4-5M fixed wireless customers by 2025, including mmWave (source: Verizon)
 - mmWave also provides significant upload capacity
- FWA capturing growing share of broadband market
 - Verizon/T-Mobile combined reported 552k new FWA customers in 2Q'22

FWA 'net adds' by Top U.S. Broadband Providers

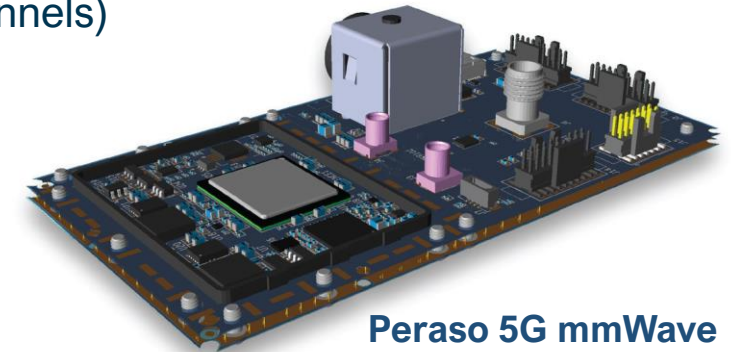


Global Carriers Utilizing mmWave Technology



World's Most Integrated 5G mmWave Beamformer IC

- Introduced world's most highly integrated 5G mmWave beamformer
 - Support for frequency band from 24 GHz – 43 GHz
 - Dual-stream MIMO support with two 16-channel beamforming arrays (32 total channels)
- Demos of evaluation module in 3Q; sampling available to select customers
- Dual-band architecture positions Peraso for expansive 5G end-device market
 - Target TAM opportunity is estimated at \$1.5B in 2025, including CPE, hotspots, laptops and tablets



Peraso 5G mmWave Evaluation Module

5G mmWave Mobile Device Shipments, by device type

	2019	2020	2021	2022	2023	2024	2025	2026	2027
Handheld Devices	162,800	21,500,000	71,100,000	107,422,400	160,778,150	217,099,563	257,615,126	272,239,982	282,025,584
Tablet	2,200	254,400	1,078,656	1,682,703	2,118,337	2,553,558	2,975,878	3,190,141	3,445,352
CPE			300,000	715,000	1,175,000	1,552,000	1,965,000	2,590,000	2,840,000
PC modem + Hotspots	55,000	2,300,000	4,975,000	9,122,250	17,812,055	27,769,902	37,722,203	38,454,145	41,145,935
IoT			34,400	41,280	51,600	74,820	112,230	168,345	252,518
TOTAL	220,000	24,054,400	77,488,056	118,983,633	181,935,142	249,049,843	300,390,437	316,642,613	329,709,389

source: Mobile Experts, 5G Millimeter Wave 2022:March 2022

PERASO

WIRELESS
UNLEASHED™

FINANCIALS

Non-GAAP Actual and Model

<i>\$ in millions</i>	Peraso Inc. (1)			Model (2)	
	YTD 2022	2Q 2022	FY2021	Medium Term	Long-Term
				2 - 3 years	3+ years
Revenue	\$7.7	\$4.3	\$5.7	70%+ Growth	30%+ Growth
Gross Margin % (3)	47.6%	43.0%	42.4%	50%	55%+
Operating Loss (3)	(\$9.8)	(\$4.7)	(\$9.9)	5% - 20%	20%+
Net Loss (3)	(\$9.9)	(\$4.8)	(\$12.8)		
Cash Flow	Cash Burn	Cash Burn	Cash Burn	Cash Generating	Cash Generating

Notes:

- (1) Reflects operating results of Peraso Technologies for 2021; 2021 includes results of MoSys, Inc. for period Dec 17-31, 2021; 2022 reflects combined company
- (2) Represents forward-looking, financial objectives and does not constitute estimates of future performance, financial or otherwise. There is no assurance that Peraso will ever achieve any of these objectives and Company undertakes no obligation to update. See note on slide 2 regarding forward looking statements and reference to risk factors in Peraso's SEC filings
- (3) Non-GAAP measures - exclude stock-based compensation expense, amortization of intangibles, business combination transaction costs, change in FV of warrant liability; see reconciliations for specific amounts excluded

Non-GAAP Quarterly Income Statements

<i>(\$ in millions)</i>	Q4'2021	FY 2021	Q1'2022	Q2'2022	YTD 2022
Product	1.9	4.9	3.2	4.1	7.3
License and other	-	0.8	0.2	0.2	0.4
Total Revenue	\$ 1.9	\$ 5.7	\$ 3.4	\$ 4.3	\$ 7.7
COGS	1.3	3.3	1.6	2.4	4.0
Gross profit	0.6	2.4	1.8	1.9	3.7
Gross margin %	30.4%	42.4%	53.3%	43.0%	47.6%
Operating expense					
R&D	2.4	8.6	4.8	4.6	9.4
SG&A	1.3	3.7	2.1	2.0	4.1
Total operating expense	3.7	12.3	6.9	6.6	13.5
Operating loss	(3.1)	(9.9)	(5.1)	(4.7)	(9.8)
Other expense, net	(0.8)	(2.9)	-	(0.1)	(0.1)
Net Loss	\$ (3.9)	\$ (12.8)	\$ (5.1)	\$ (4.8)	\$ (9.9)

Non-GAAP to GAAP Reconciliation

<i>(\$ in millions)</i>	Q4'2021	FY 2021	Q1'2022	Q2'2022	YTD 2022
Non-GAAP operating loss	\$ (3.1)	\$ (9.9)	\$ (5.1)	\$ (4.7)	\$ (9.8)
Adjustments:					
Stock-based compensation	(1.0)	(4.5)	(1.2)	(1.7)	(2.9)
Business combination transaction costs	(0.5)	(1.6)	-	-	-
Amortization of intangibles	(0.1)	(0.1)	(0.5)	(0.5)	(1.0)
GAAP operating loss	\$ (4.7)	\$ (16.1)	\$ (6.8)	\$ (6.9)	\$ (13.7)
Non-GAAP net loss	\$ (3.9)	\$ (12.8)	\$ (5.1)	\$ (4.8)	\$ (9.9)
Adjustments:					
Stock-based compensation	(1.0)	(4.5)	(1.2)	(1.7)	(2.9)
Business combination transaction costs	(0.5)	(1.6)	-	-	-
Amortization of intangibles	(0.1)	(0.1)	(0.5)	(0.5)	(1.0)
Change in fair value of warrant liability	8.0	8.1	-	-	-
GAAP net income (loss)	\$ 2.5	\$ (10.9)	\$ (6.8)	\$ (7.0)	\$ (13.8)

Non-GAAP to GAAP Gross Profit Reconciliation

<i>(\$ in millions)</i>	Q1'2022	GM %	Q2'2022	GM%	YTD 2022	GM%
GAAP gross profit	\$ 1.5	42.8%	\$ 1.5	34.7%	\$ 3.0	38.3%
Adjustments:						
Amortization of intangibles	0.3	10.5%	0.4	8.3%	0.7	9.3%
Non-GAAP gross profit	\$ 1.8	53.3%	\$ 1.9	43.0%	\$ 3.7	47.6%

Balance Sheet and Capitalization

Balance Sheet	Q2 - Jun 30, 2022 (\$ in millions)	Capitalization	Q2 - Jun 30, 2022 (shares in millions)
Cash & Investments	\$6.0	TSO (2)	21.8
Total Assets (1)	\$37.0	Warrants	0.1
Debt	-	Options & RSUs	2.9
Total Liabilities	\$5.9	Fully Diluted (3)	24.8
Stockholders' Equity	\$31.1		

Notes

- (1) Includes \$17.3 of goodwill and intangible assets, net recorded in connection with the business combination between Peraso and MoSys
- (2) Includes: i) exchangeable shares with the same rights as common shares, which were issued by our Canadian subsidiary to certain Canadian stockholders of Peraso Technologies in connection with business combination between Peraso and MoSys, and ii) 1.8 million shares subject to escrow and earn-out (achievement of \$8.57 share price over three years).
- (3) Excludes 1.6 million shares available for future awards under equity incentive plan

SUMMARY

- **Increase** in 5G wireless demand has strained the existing wireless spectrum
- Use of **mmWave in 5G networks** is inevitable. Existing 'beachfront' property is disappearing
- Peraso is a **leader** in mmWave technology with a clear and defensible competitive advantage
- Peraso is a **pure play** investment opportunity in the mmWave semiconductor space



Peraso Inc.

Delivering High Speed 5G Wireless

THANK YOU

Peraso Contact:

Jim Sullivan

Chief Financial Officer

P: 408-418-7582

E: jsullivan@perasoinc.com

Investor Relations Contact:

Shelton Group

Leanne K. Sievers | Brett Perry

P: 949-224-3874 | 214-272-0070

E: sheltonir@sheltongroup.com