

Investor Presentation

February 2024



Cautionary Statements

Use of Non-GAAP Adjusted Financial Measures

This presentation provides financial measures that exclude amortization of acquired intangible assets, acquisition-related expenses, inventory step-up and contingent consideration revaluation, stock-based compensation expenses, revaluation of operating lease liabilities and remeasurement of intercompany loans, amortization of debt discount and issuance costs and tax effect of non-GAAP adjustment, as applicable, and are therefore not calculated in accordance with generally accepted accounting principles (GAAP). Management believes that these non-GAAP financial measures provide meaningful supplemental information regarding Nova's performance because they reflect our operational results and enhance management's and investors' ability to evaluate Nova's performance before charges or benefits considered by management to be outside Nova's ongoing operating results. The presentation of this non-GAAP financial information is not intended to be considered in isolation or as a substitute for the financial information prepared and presented in accordance with GAAP. Management believes that it is in the best interest of its investors to provide financial information that will facilitate comparison of both historical and future results and allow greater transparency to supplemental information used by management in its financial and operational decision making. A reconciliation of each GAAP to non-GAAP financial measure discussed in this presentation is contained in the accompanying financial tables.

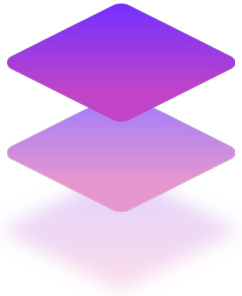
Forward-Looking Statements

This presentation contains forward-looking statements within the meaning of safe harbor provisions of the Private Securities Litigation Reform Act of 1995 relating to future events or our future performance, such as statements regarding, but not limited to, anticipated growth opportunities and projections about our business and its future revenues, expenses and profitability. Forward-looking statements involve known and unknown risks, uncertainties and other factors that may cause our actual results, levels of activity, performance or achievements to differ materially from any future results, levels of activity, performance or achievements expressed or implied in those forward-looking statements. .

Factors that may affect our results, performance, circumstances or achievements include, but are not limited to, the following: political, economic and military instability in Israel, including related to the recent attack by Hamas and other terrorist organizations from the Gaza Strip and Israel's war against them; increased information technology security threats and sophisticated computer crime; foreign political and economic risks including supply-chain difficulties; regulations that could restrict our operations such as economic sanctions and export restrictions; changes in U.S. trade policies; indirect effects of the Russia – Ukraine conflict; market instability including inflation and recessionary pressures; risks related to doing business with China; catastrophic events such as the outbreak of COVID-19; inability to protect our intellectual property; open source technology exposure; failure to compete effectively or to respond to rapid technological changes; consolidation in our industry; difficulty in predicting the length and strength of any downturn or expansion period of the market we target; factors that adversely affect the pricing and demand for our product lines; dependency on a small number of large customers; dependency on a single manufacturing facility per product line; dependency on a limited number of suppliers; difficulty in integrating current or future acquisitions; lengthy sales cycle and customer delays in orders; risks related to our convertible notes; currency fluctuations; and quarterly fluctuations in our operating results. We cannot guarantee future results, levels of activity, performance or achievements. The matters discussed in this presentation also involve risks and uncertainties summarized under the heading "Risk Factors" in Nova's Annual Report on Form 20-F for the year ended December 31, 2022, filed with the Securities and Exchange Commission on February 28, 2023. These factors are updated from time to time through the filing of reports and registration statements with the Securities and Exchange Commission. Nova Ltd. does not assume any obligation to update the forward-looking information contained in this presentation..

Nova is a leading innovator and a key provider of **metrology** solutions for advanced **process control** used in semiconductor manufacturing





A TRUSTED PARTNER

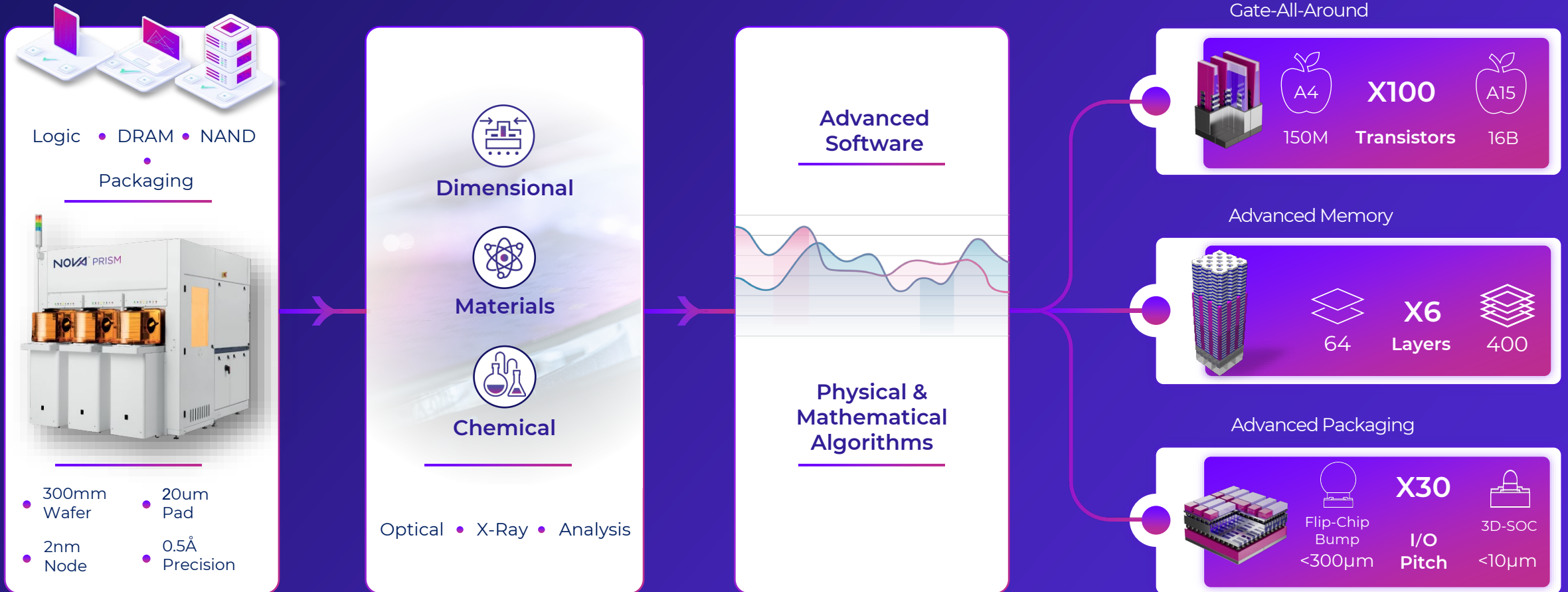
We measure ourselves by our ability to transcend expectations and boundaries

We partner with our customers to craft innovative process control solutions enhanced with unique value



Revealing the Invisible

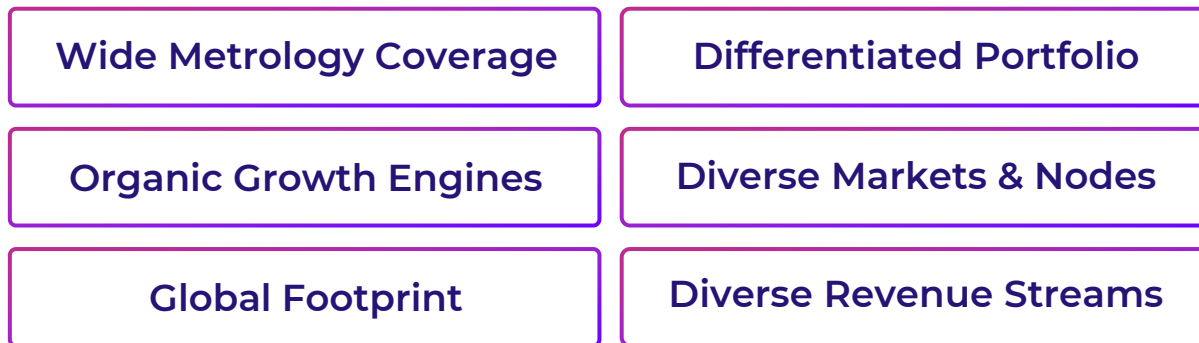
Actionable Insight, Critical Foresight



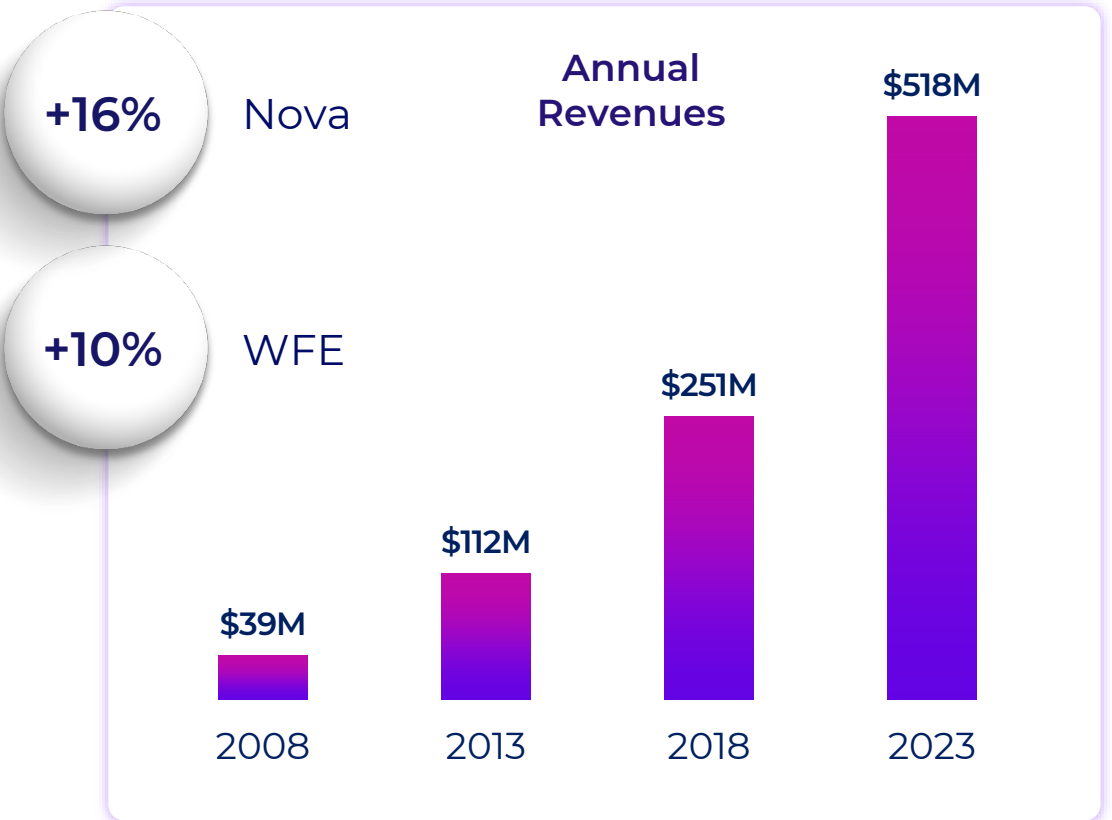
Solid Track Record

Outperforming the Market by >50%

- Proven execution
- Outperforming the industry
- Doubling revenues every 5 years
- Resilient business model



5 Year CAGR



Quarterly Performance



Company Guidance

Q1 2024

Revenue

\$134M-\$140M

EPS

\$1.00-\$1.12 (GAAP)
\$1.21-\$1.33 (non-GAAP)

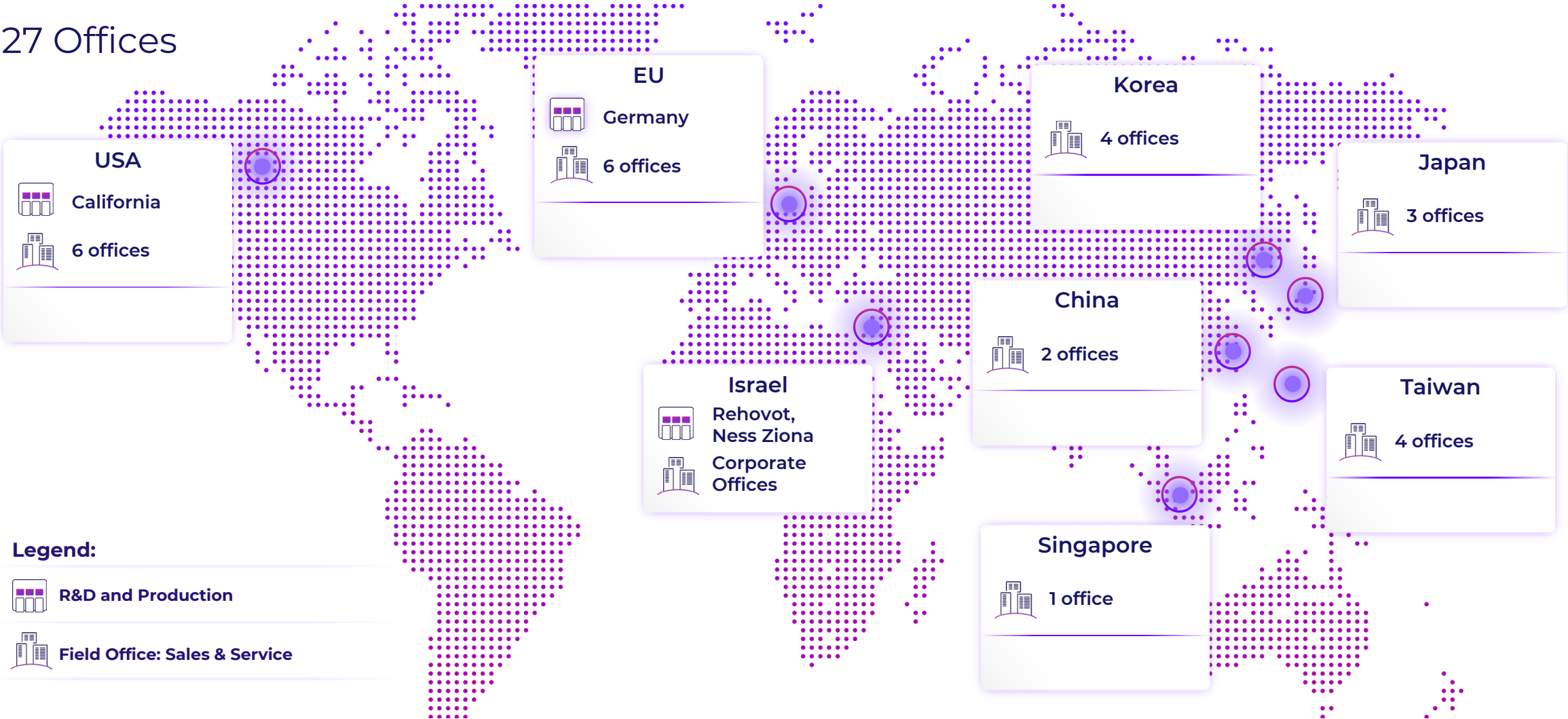
Q4 23 Highlights

- Record Earnings Per Share
- Proliferation of materials and chemical solutions across Frontend and Backend
- Expanding adoption of optical metrology with multiple DRAM wins for HBM

Global Footprint, Diversified Exposure

3 R&D and Production Centers

27 Offices



Legend:

 **R&D and Production**

 **Field Office: Sales & Service**

AI Drives Secular Growth

Semiconductor Revenue Forecast – \$1T by 2030

Automotive

20%
5Y CAGR

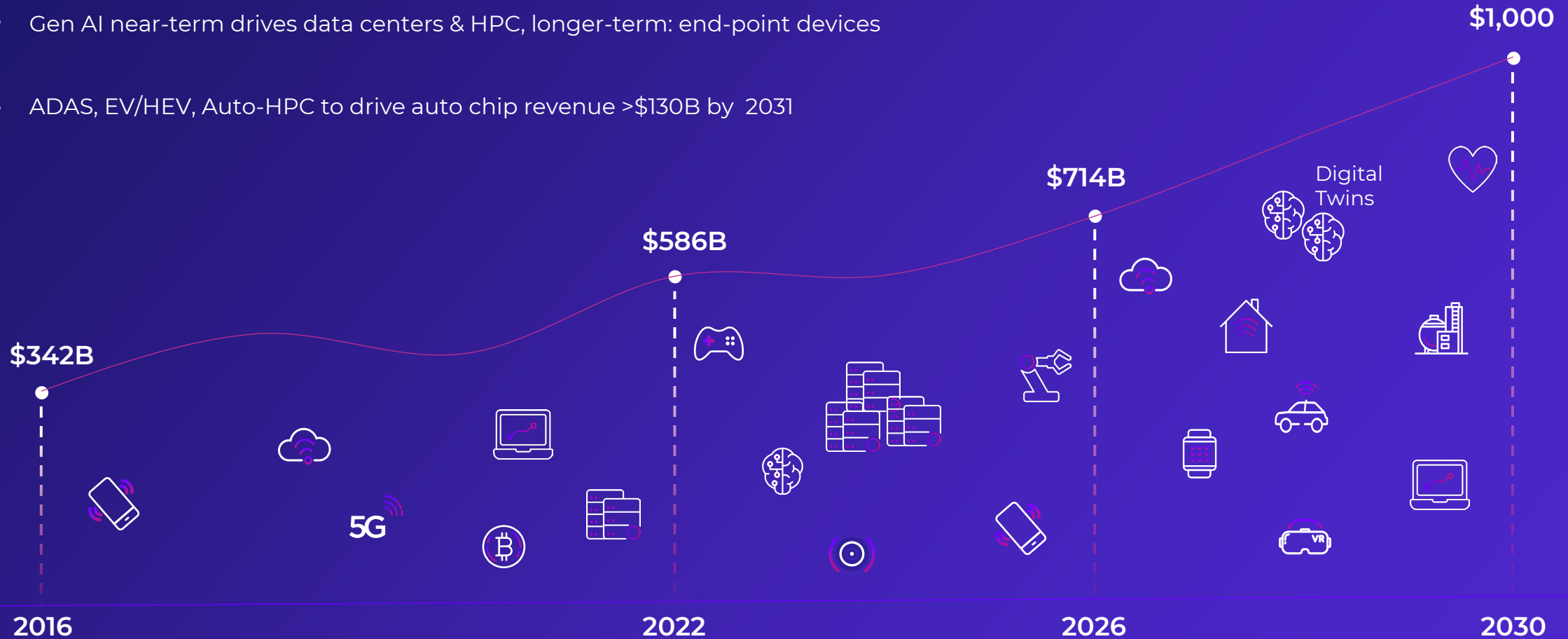
AI Semi

27%
5Y CAGR

Industry

+10%
7Y CAGR

- Gen AI near-term drives data centers & HPC, longer-term: end-point devices
- ADAS, EV/HEV, Auto-HPC to drive auto chip revenue >\$130B by 2031



Geopolitics Drive Capacity and Technology Advancements

\$200B in Funding and Incentives by 2030

100 Fabrication Projects

USA

\$ \$80B
🏭 23

EU

\$ \$50B
🏭 19

Korea

\$ \$20B
🏭 7

Japan

\$ \$20B
🏭 12

China

\$ \$30B
🏭 32

Taiwan

\$ \$15B
🏭 10

Legend:



Government Funding/ incentives



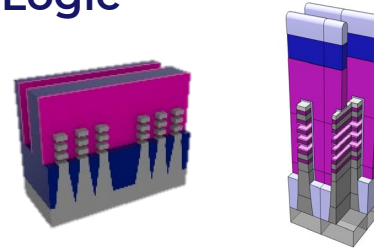
New Fab facilities / construction in 2024

Next-Gen Dimensions Driven Opportunities

Scale and Complexity Drive Metrology Intensity

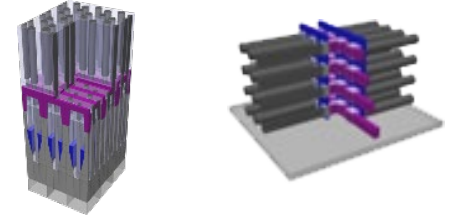
- Scaled Devices, Multiple Design Steps
- Moving toward 3D architectures
- >X2 interconnect layers

Logic



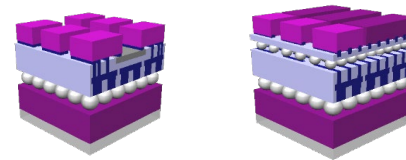
- GAA individual Nanosheets (thickness, indent)
- Buried structures

DRAM



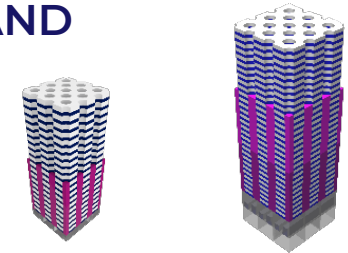
- High-Aspect Ratio Bottom gate parameters
- Tight contact holes

Advanced Packaging



- Buried structures
- Topography & Profile

NAND



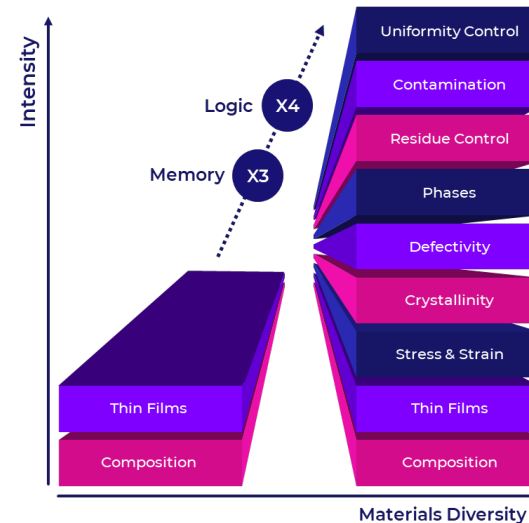
- High-Aspect Ratio Bottom parameters in multi tier
- Full profile

Next-Gen Materials Driven Opportunities

Materials Diversity Drives Broader Metrology Scope

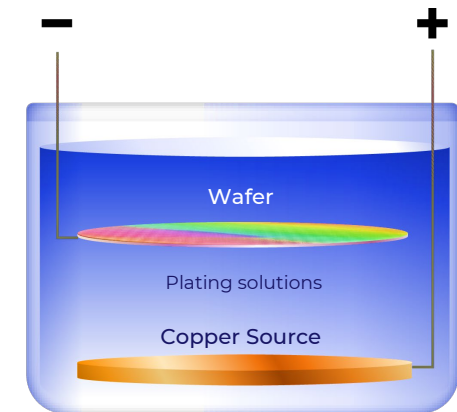
- From 12 to 67 elements
- New materials, new chemistries
- Composition, purity, stability
- Sustainability and waste management

On-Wafer



- Uniformity & Residues
- Dielectric composition & thickness control
- Stress & strain on multiple nanosheets
- Doping control
- TSV filling

In-Bath



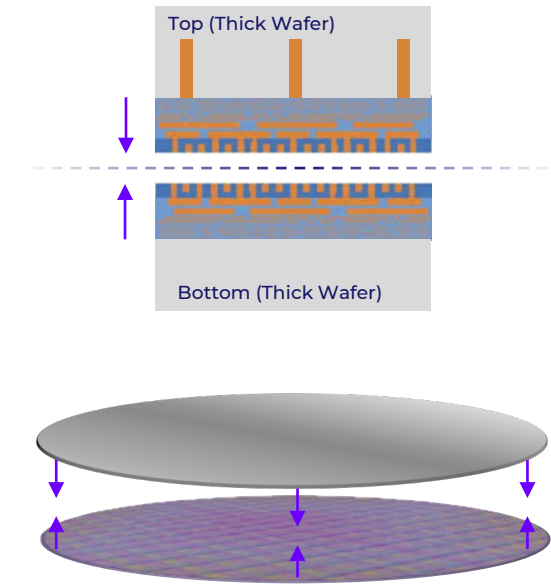
- Optimal plating
- Highly saturated bath management
- By-Products
- Contaminants and photoresist leach

Heterogenous Integration Driven Opportunities

Continued Scaling Requires New Integrations

- Wide Adoption: Advanced Logic, HBM, 3D NAND, 3D DRAM & advanced packaging
- CMP process control critical for successful hybrid bonding
- Backside power delivery and HBM drive TSV dimensions reduction

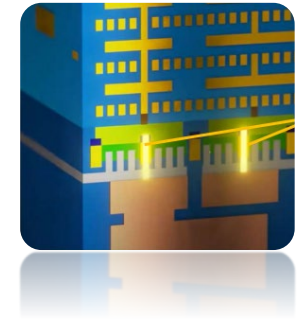
Hybrid Bonding



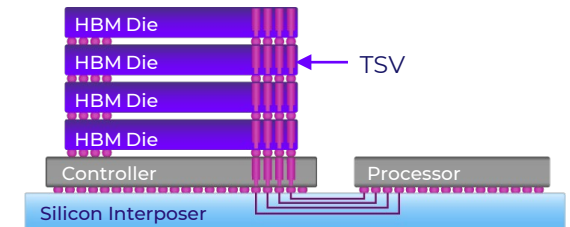
- Wafer edge profile
- Backside Thinning
- Cu dishing
- Through Silicon Via

Through Silicon Via

Logic: Backside Power Delivery



DRAM: High Bandwidth Memory

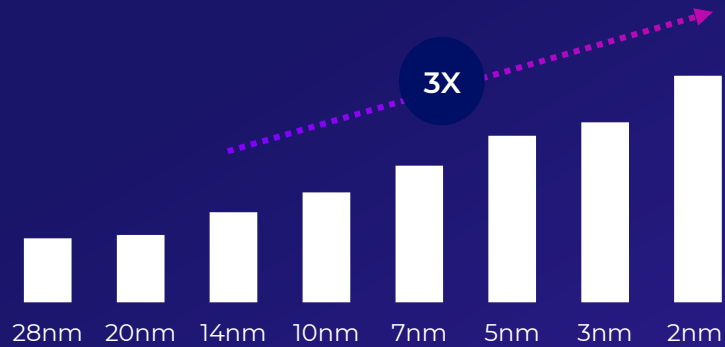


- TSV Dimensions: profile, depth & asymmetry
- TSV reveal
- TSV PR Patterning

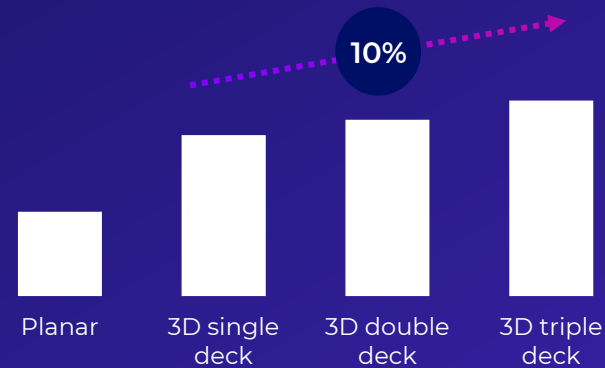
Increasing Complexity

Driving Higher Metrology Intensity

Process Steps by Node - Logic



Process Steps by Node - NAND

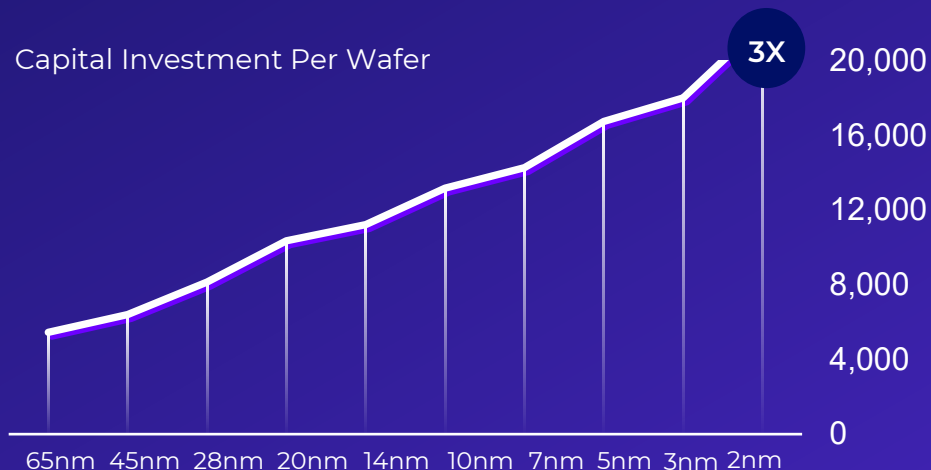


Increasing complexity:
Logic process steps **3X**
since 28nm node

WFE cost of a large
3nm fab:

~ \$20B, 2X of a 28nm fab

Capital Investment Per Wafer



Diversified Growth Engines

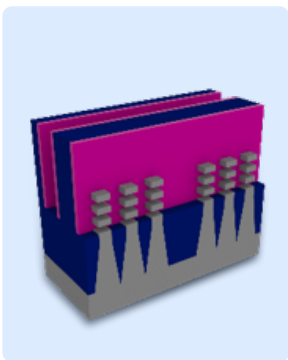
Increasing Share while Expanding TAM



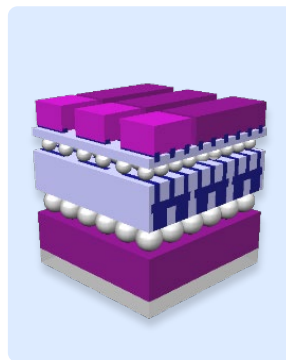
Expanding TAM

by Addressing Multiple Markets

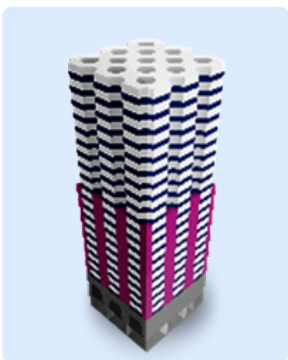
Advanced
Logic



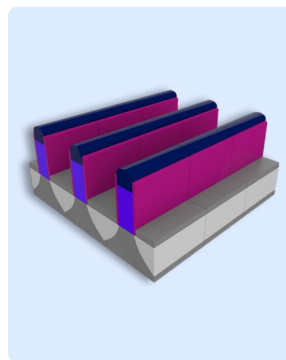
Advanced
Packaging



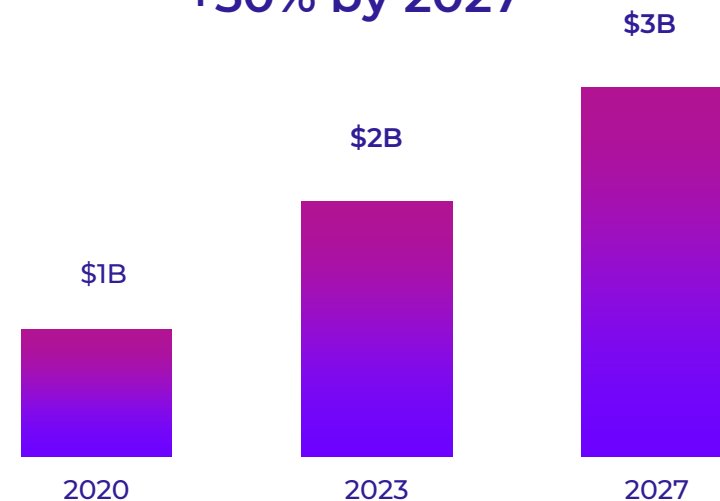
Advanced
Memory



Legacy
Nodes &
specialty
devices

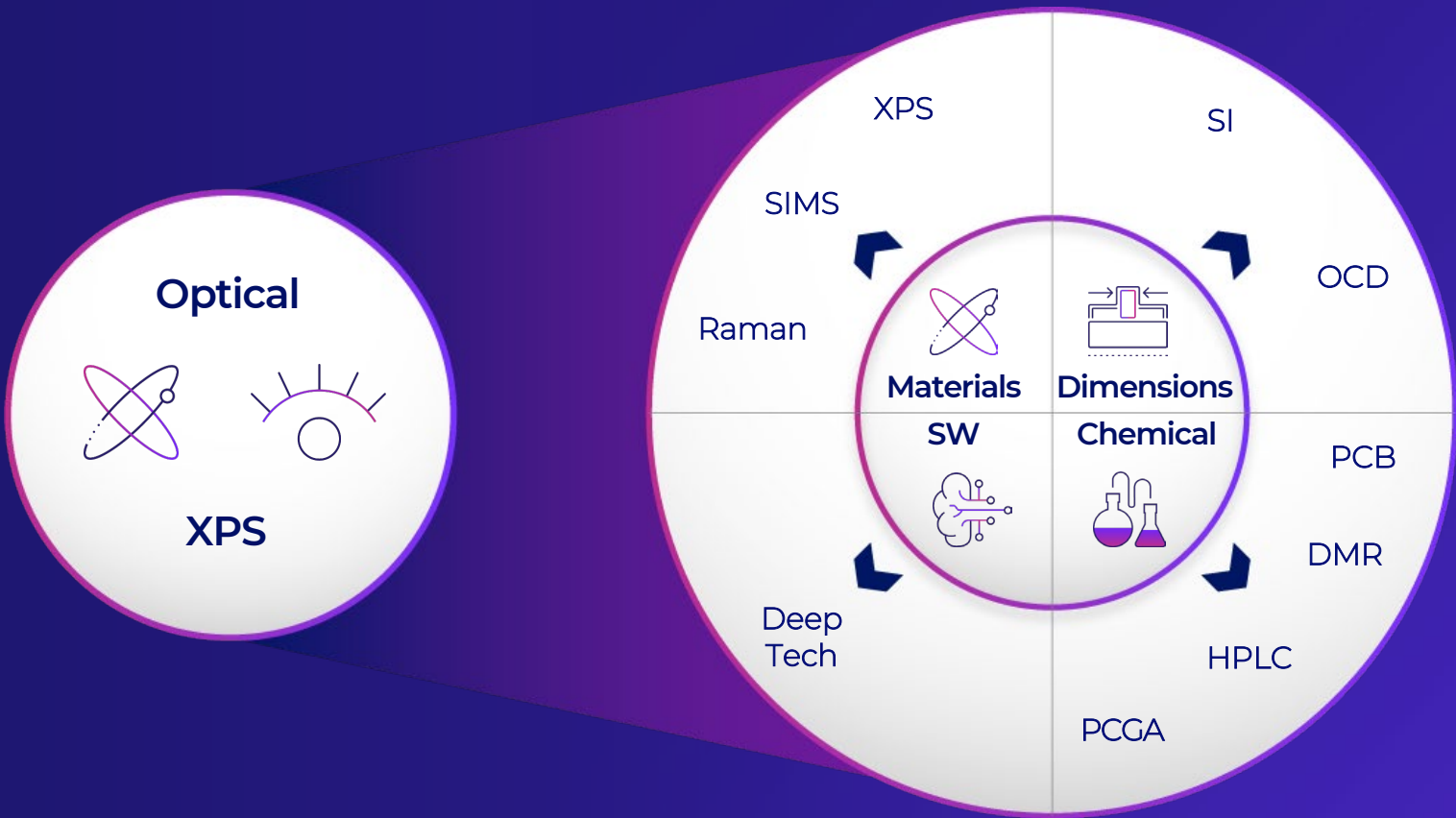


Nova TAM
+50% by 2027

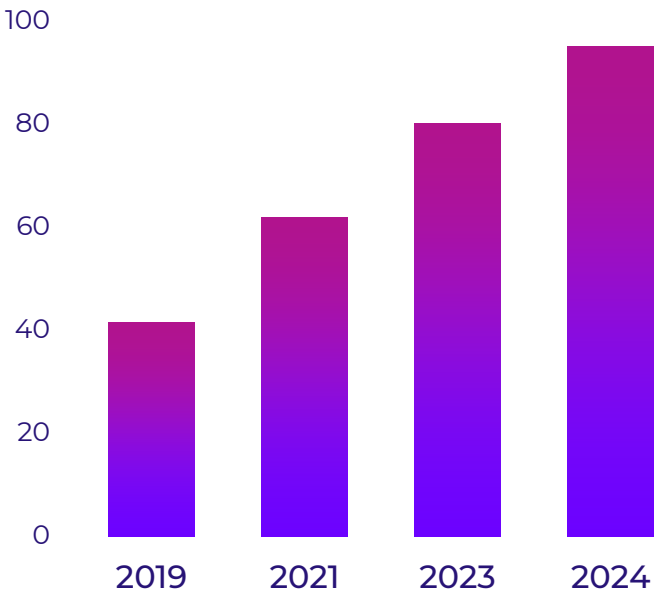


Diversifying

Product Offering



R&D Investment
(Net, \$M)



Non-GAAP Financials. 2024- Forecast

Core Technology

Spectral Reflectometry (SR)

X-Ray Photoelectron Spectroscopy (XPS) & X-Ray Fluorescence (XRF)

HPLC, CVS, Titration, Optical Spectroscopy

Physical Modeling

Fleet Management

Constantly Pushing Boundaries

Disruptive Technology

Spectral Interferometry (SI)

Multi-Channel Integrated Metrology

Generative AI

Raman Spectroscopy

Secondary Ion Mass Spectrometry (SIMS)

Direct Metal Replenishment

Rich Metrology Portfolio

Dimensional Metrology

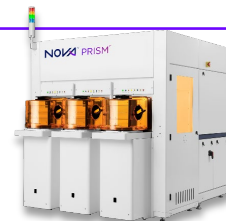
Critical Dimensions



Nova i570®
Integrated Metrology



Nova MMSR
Standalone Metrology



Nova Prism
Standalone Metrology

Materials Metrology

Material Properties



Nova VeraFlex®
XPS, XRF



Nova Elipson®
Raman Spectroscopy



Nova Metrion®
SIMS

Chemical Metrology

Chemical Analytics



Nova AncoScene®
Front End

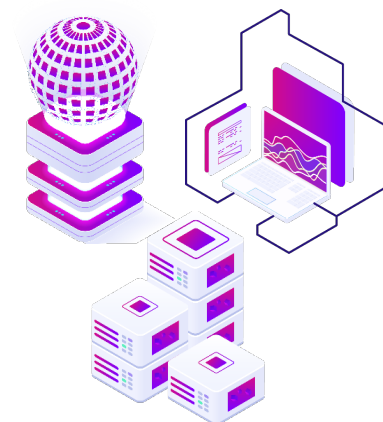


Nova Ancolyzer®
Wafer Level Packaging



Nova DMR®
Direct Metal Replenishment

Software



- Physical & Mathematical Modeling
- Big Data Analytics

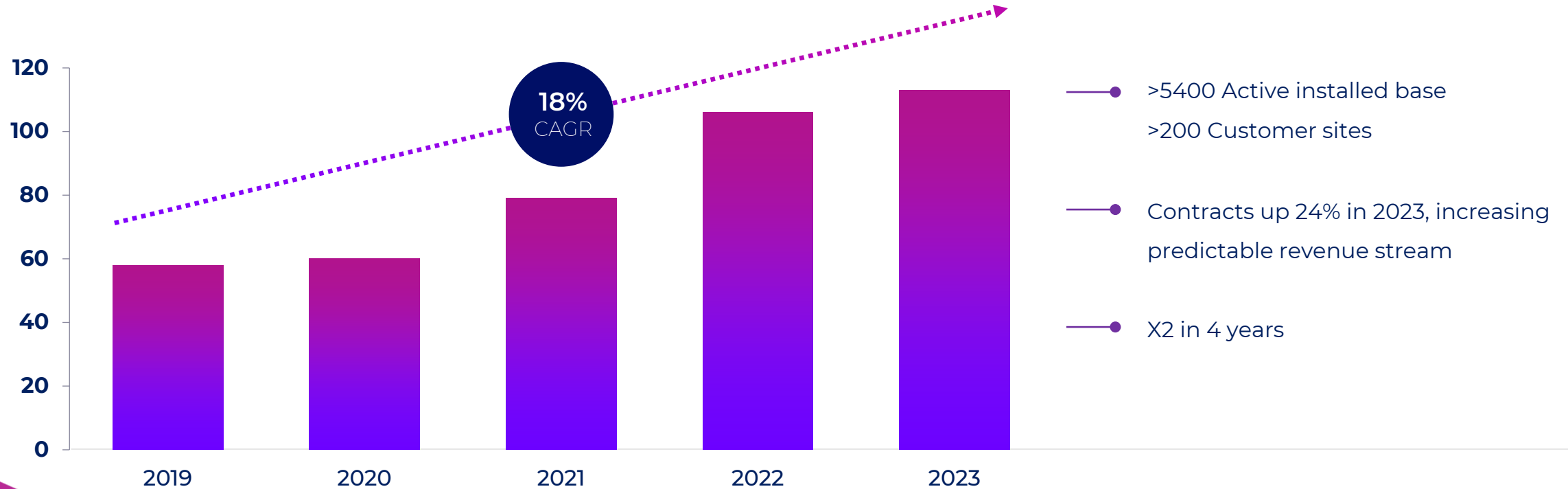
Leveraging Technology Differentiation

	Dimensional			Materials			Chemical		
	Integrated Optical CD	Stand alone Optical CD	Prism	VeraFlex® (XPS+SRF)	Elipson® (Inline Raman)	Metrion® (Inline SIMS)	AncoScene® Front-End	Ancolyzer® Wafer level packaging	DMR® Direct Metal Replenishment
									
Gate-All-Around	●	●	●	●	●	●	●		
Advanced Memory	●	●	●	●	●	●	●	●	
Hybrid Bonding	●		●	●				●	
High Bandwidth Memory	●		●	●			●	●	
Legacy Nodes/ Specialty Devices	●	●		●	●		●	●	●
Wafer Level Packaging	●	●	●	●				●	●

● Qualified by customers to measure related applications

Service Revenue Engine

Targeting Double-Digit Annual Growth



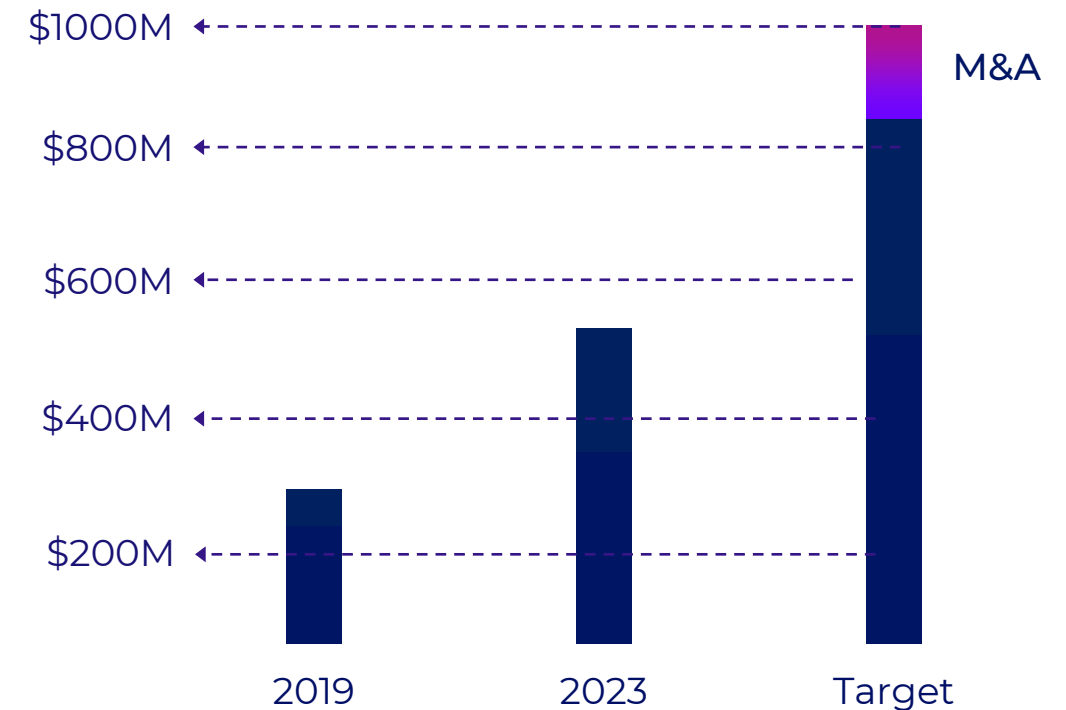
Non-GAAP Financials

Nova \$1B Plan

Continuous Outperformance

- New Technologies Proliferation
- Chemical Analysis Growth
- Materials Metrology Leadership
- Diversified Markets
- Further M&A

~\$640M Cash Reserves
Supporting Long-Term Growth



Financial Target Model

Organic

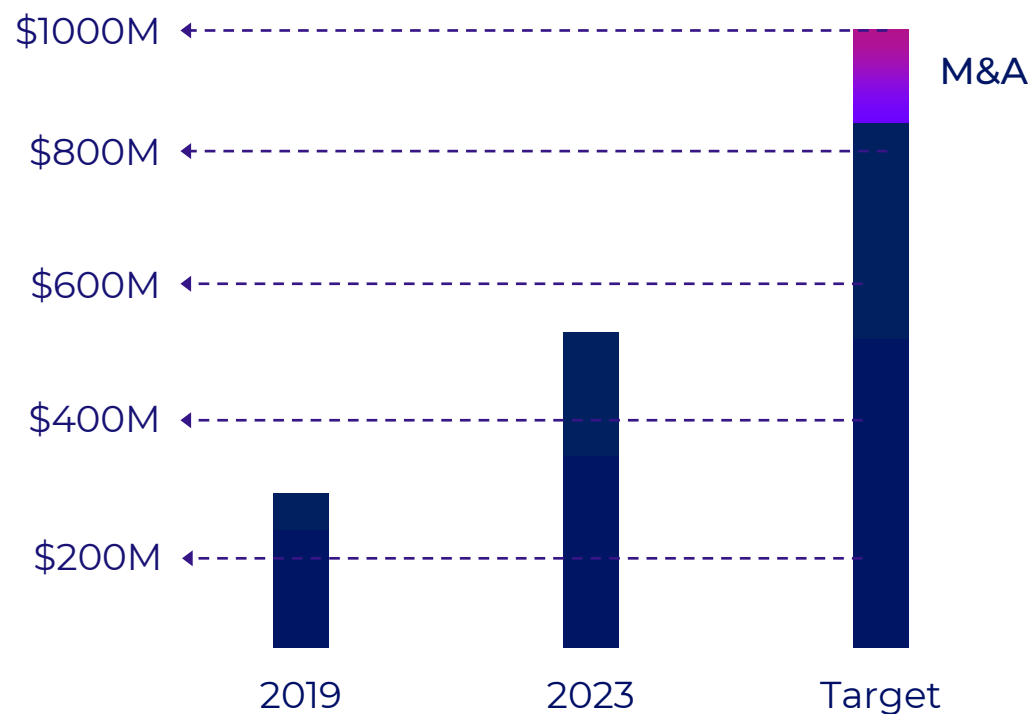
Revenue	R&D Investment	Tax
\$1B	15%-18%	14%
Gross Margin	SG&A	Share Count
57%-59%	13%-15%	32M

Operating Margin

27%-31%

Earnings

>7\$



Inorganic Approach

Search Guidelines



Early Access

Lab to Fab Technology



Materials

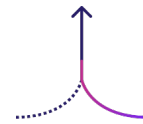
Leadership



Adjacent

Process Control Markets

Screening Elements



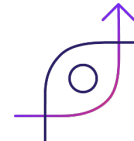
Top Line Synergy



Complementary
Technology



Operational
Leverage
(Accretion)



Diversification
Within Core
Capabilities



Transformational

Preparing For Next Cycle Opportunities

Increasing Manufacturing Capacity



+50%
by 2025

Vs. 2022 capacity

Tech Evaluations at Customer Sites



20
Evaluations in Process

R&D Plans On Track



16%
of Annual Revenue - Last 3 Years

Our ESG Vision

To become an active influencer in creating a more sustainable and equitable future.

We believe in a pragmatic approach to interlace ESG practices across daily operations, including culture, products, business, supply chain, customers, R&D and manufacturing.

Our four Pillars

Our ESG strategy is built around four pillars- each with long-term goals and areas of focus. Annual planning and investments will align with these pillars



Governance

As our compass



People First

The individual as a whole & our community as our home



Innovation

As our mission



Environment

As our obligation

Nova's Priority ESG topics



Governance

- Governance compliance
- Data Privacy & cyber security
- Ethical business practices
- Product safety and quality
- Supply Chain and Procurement Management



Social

- Talent Attraction & Retention
- Diversity, Equity and Inclusion
- Human capital development
- Occupational health and safety



Environment

- Environmental management –
- Energy, water, waste
- Carbon footprint and GHG emissions

Key Takeaways

Positioned for Continuous Growth



Process complexity, new markets and geopolitics drive investments

Increasing need for advanced metrology solutions



Unique, disruptive technology portfolio

Stronger position, penetrating new segments. expanding TAM



Solid operational model

Supports clear strategy for growth



Proven performance towards 1B\$

Outperforming the Industry



Clear ESG Vision and priorities

Implemented across the organization

Financial Long-Term Target Model

Sales

1B\$

Gross Margin

57%-59%

Operating Margin

27%-31%

Non-GAAP Financials

Thank You
