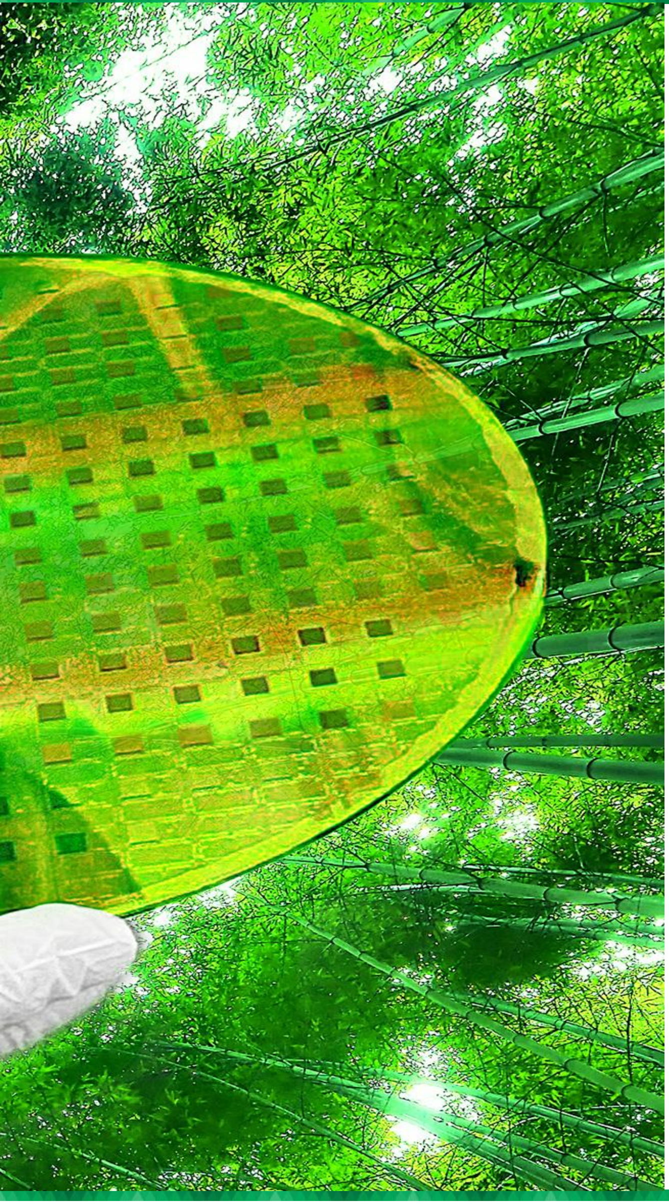


INVESTOR PRESENTATION

November 2023

Safe Harbor Statement

This presentation contains statements about management's future expectations, plans and prospects of our business that constitute forward-looking statements, which are found in various places throughout the presentation, including, but not limited to, statements relating to expectations of orders, net sales, product shipments, expenses, timing of purchases of assembly equipment by customers, gross margins, operating results and capital expenditures. The use of words such as “anticipate”, “estimate”, “expect”, “can”, “intend”, “believes”, “may”, “plan”, “predict”, “project”, “forecast”, “will”, “would”, and similar expressions are intended to identify forward looking statements, although not all forward-looking statements contain these identifying words. The financial guidance set forth under the heading “Outlook” contains such forward-looking statements. While these forward looking statements represent our judgments and expectations concerning the development of our business, a number of risks, uncertainties and other important factors could cause actual developments and results to differ materially from those contained in forward looking statements, including any inability to maintain continued demand for our products; failure of anticipated orders to materialize or postponement or cancellation of orders, generally without charges; the volatility in the demand for semiconductors and our products and services; the extent and duration of the COVID-19 pandemic and measures taken to contain the outbreak, and the associated adverse impacts on the global economy, financial markets, global supply chains and our operations as well as those of our customers and suppliers; failure to develop new and enhanced products and introduce them at competitive price levels; failure to adequately decrease costs and expenses as revenues decline; loss of significant customers, including through industry consolidation or the emergence of industry alliances; lengthening of the sales cycle; acts of terrorism and violence; disruption or failure of our information technology systems; consolidation activity and industry alliances in the semiconductor industry that may result in further increased customer concentration, inability to forecast demand and inventory levels for our products; the integrity of product pricing and protection of our intellectual property in foreign jurisdictions; risks, such as changes in trade regulations, conflict minerals regulations, currency fluctuations, political instability and war, associated with substantial foreign customers, suppliers and foreign manufacturing operations, particularly to the extent occurring in the Asia Pacific region where we have a substantial portion of our production facilities, potential instability in foreign capital markets; the risk of failure to successfully manage our diverse operations; any inability to attract and retain skilled personnel, including as a result of restrictions on immigration, travel or the availability of visas for skilled technology workers as a result of the COVID-19 pandemic; those additional risk factors set forth in Besi's annual report for the year ended December 31, 2022 and other key factors that could adversely affect our businesses and financial performance contained in our filings and reports, including our statutory consolidated statements. We expressly disclaim any obligation to update or alter our forward-looking statements whether as a result of new information, future events or otherwise.

Agenda

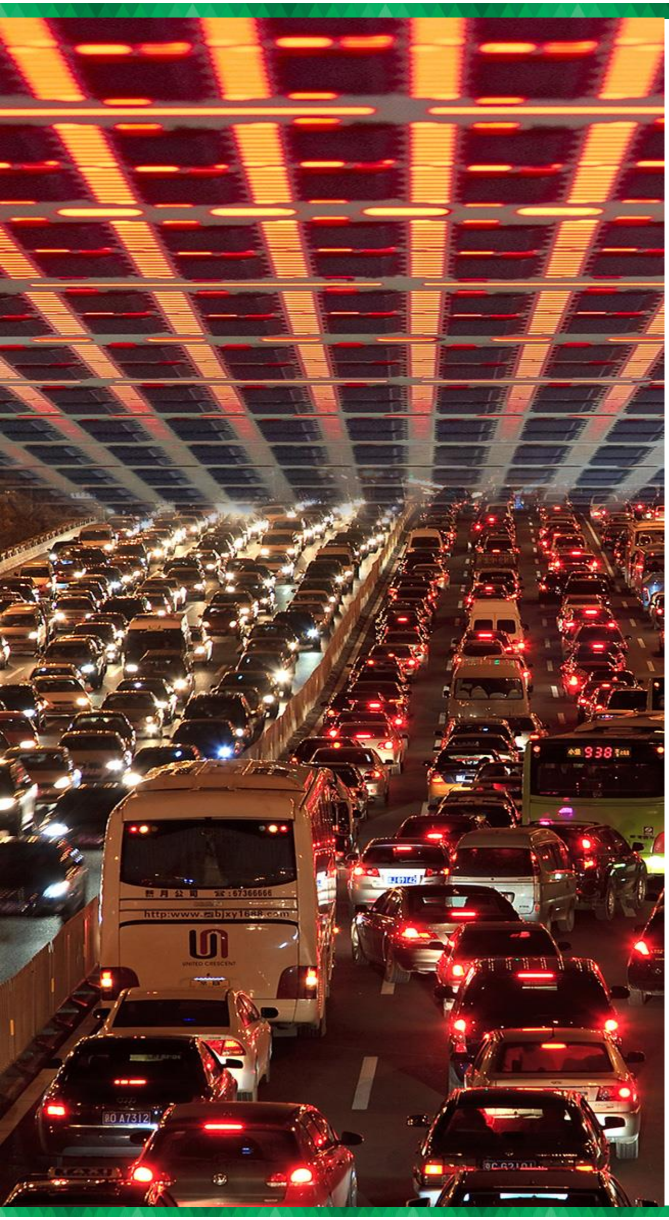
I. Company Overview

II. Market Overview

III. End-User Market Trends

IV. Strategy

V. Financial Update and Summary



I. COMPANY OVERVIEW

Besi Overview

Corporate Profile

- Leading assembly equipment supplier with #1 and #2 positions in key markets
  - ~30%+ addressable market share
- Broad portfolio: die attach, packaging and plating
- Strategic positioning in advanced substrate and wafer level packaging
- ~75% of systems used for advanced packaging applications
- Global operations in 7 countries; 1,973 employees. HQ in the Netherlands

Financial Highlights*

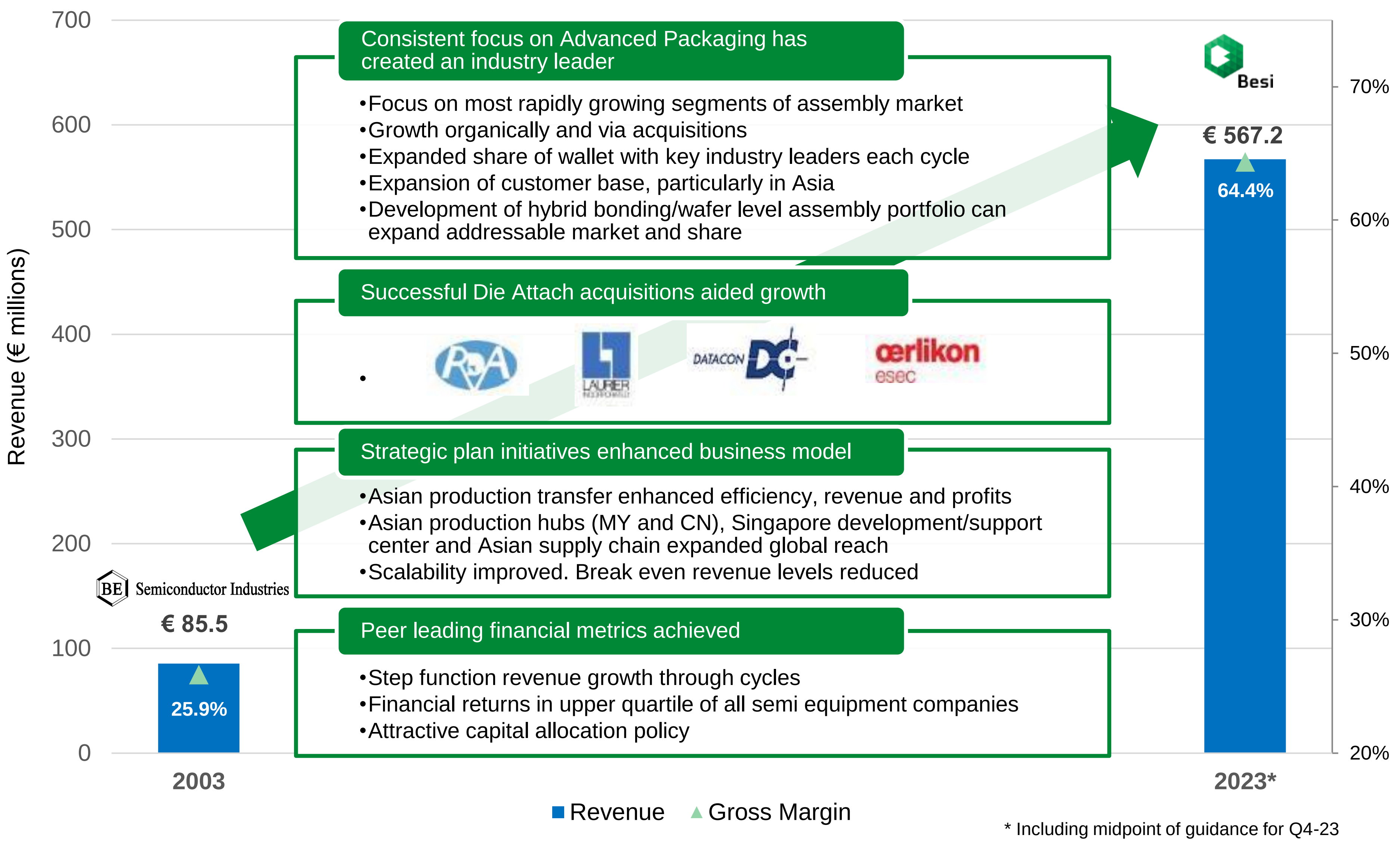
- LTM revenue and net income of € 556.9 million and € 162.3 million
- Cash/deposits: € 391.2 million
- Net cash/deposits: € 90.2 million
- € 1.8 billion dividends/share repurchases since 2011 including 2022 dividend

Investment Considerations

- Leading position in advanced packaging. Ever more critical part of semi value chain
- Peer leading financial metrics
- Multiple growth drivers: Digital and cloud infrastructure build, smart everything, AI, 5G, vehicle electrification and autonomous driving
- Hybrid bonding and wafer level assembly can significantly expand revenue and profit potential

* As of September 30, 2023

Company History



* Including midpoint of guidance for Q4-23

History of Superior Long-Term Value Creation

Capital Allocation

Attractive capital allocation program

€ 1.8 billion of dividends and share repurchases since 2011*

Represents ~30% of total revenue

Strategic/Financial

Disciplined execution has created leader in advanced packaging

Best in class financial metrics

Superior through cycle financial performance versus peers

Shareholder Return

Superior Total Returns:**
187% (3 year)
532% (5 year)

Consistent TSR outperformance versus peers

Upper quartile ranking for all semi-equipment companies

* Includes share repurchases through September 30, 2023
** Through September 30, 2023

Industry Leading Equipment Portfolio

Die Attach (79% of 2022 Revenue)

Multi-Module Attach

- 2200 evo
- 2200 evo plus
- 2200 evo hS
- 2200 evo advanced
- 2200 evo hf New

Epoxy / Soft Solder

- 2100 hS
- 2100 hS i
- 2100 sD *advanced i*
- 2100 hS ix
- 2009 SSI
- 2100 SSI New

Flip-chip

- 8800 CHAMEO *advanced / PLP*
- 8800 CHAMEO *ultra* New
- 8800 FC Quantum *adv / sigma*
- 8800 FC Quantum *hs*
- 2100 FC hS

Direct Lid Attach

- DLA
- TGB 2.0 New

Embedded Bridge Attach

- DBA New

Thermo Compression

- 8800 TC *advanced*
  (Chip to Substrate)
- 9800 TC *NEXT*
  (Chip to Wafer) New

Hybrid Bonding

- 8800 CHAMEO ultra plus
- 8800 CHAMEO ultra plus AC Q1-23

Packaging & Plating (21% of 2022 Revenue)

Leadframe Molding

AMS-i
- MEMS
- Sensors

AMS-X New
- HD Leadframe
- Power Devices

Substrate Molding

AMS-LM
- Substrate strip format
- Exposed die
- SIP packages New

Wafer & Panel Molding

FML
- Wafer molding
- Panel molding

Trim and Form

FCL-X/P
- Leadframe trim & form
- Sorting
- AGV handling
- IGBT handling

Singulation

FSL
- Substrate strip singulation
- Sorting
- Stepcut New

Plating

- Leadframe
- Power Modules New
- Film & Foil
- Chemical Deflash
- Wettable Flank New
- Flux cleaning New

Customer Ecosystem

Customers

IDMs

Bosch, fabrinet, hp, Infineon technologies, Lumileds, Micron, NXP, OSRAM, Qorvo, Renesas, Samsung, Skyworks, ST, TDK, Texas Instruments, tsmc

Subcontractors

ASE Group, Amkor Technology, Foxconn, Hua Tian, InnoLight (Innovation Lights Our Future), JCET, Sharp, LG Innotek, PTI, SPIL, TF 通富微电, TF · AMD, UTAC

OEMs

AMD, Broadcom, Dell, Delphi, Fujitsu, Lenovo, LG, MediaTek, Motorola Mobility, NVIDIA, Qualcomm, Samsung

End Products

- Diversified, blue chip customer base, top 10 = ~54% of 2022 revenue
- Leading IDMs and subcontractors. 55%/45% order split in 2022
- Also supply leading fabless companies: Qualcomm, AMD, Nvidia, Broadcom, MediaTek via subcontractors
- Long term relationships, some exceeding 50 years

From Processed Wafer to Assembled Chip

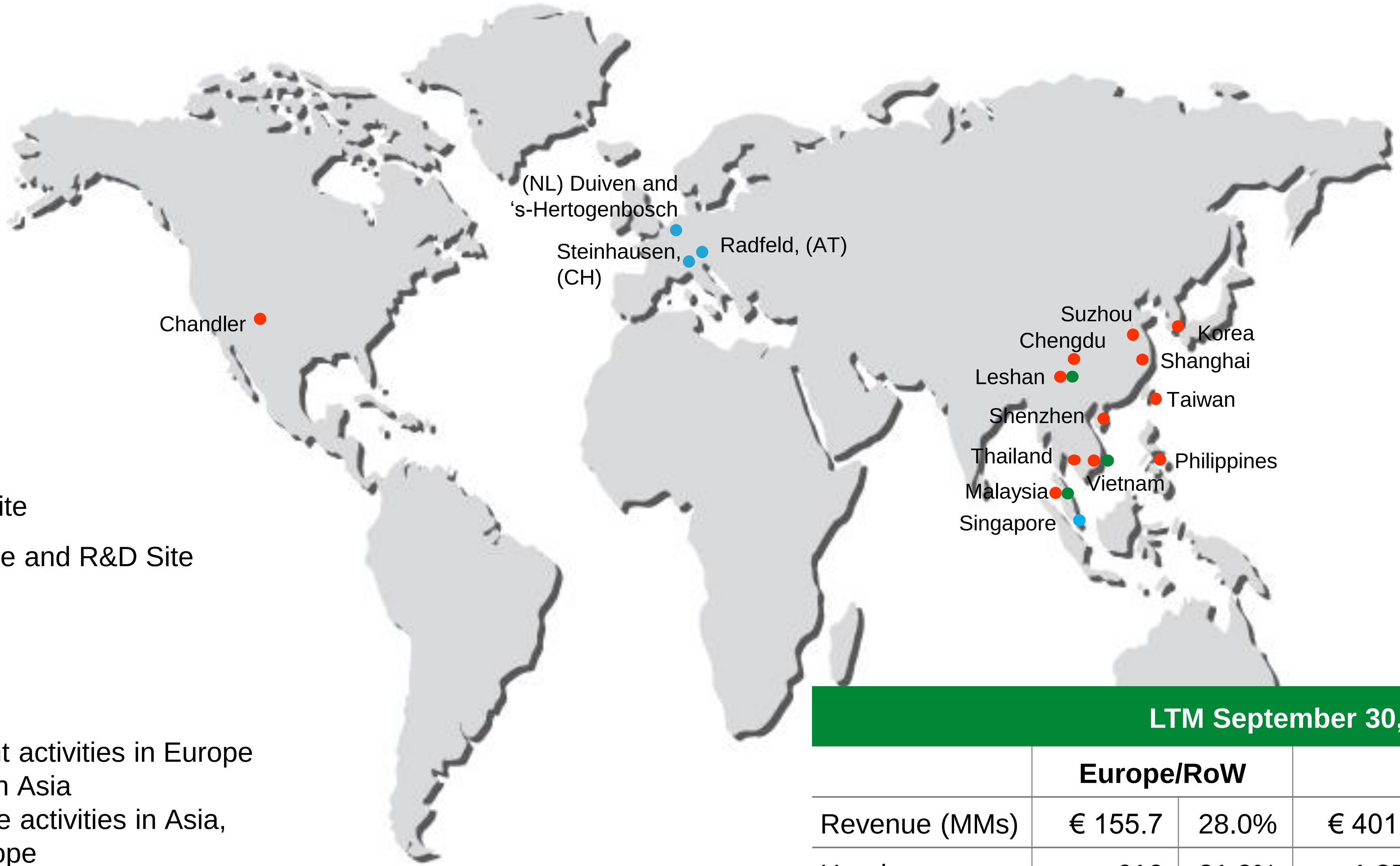
Semiconductor Manufacturing Equipment 2022: $111.4B*		
Front end: $97.7B (88%)	**Assembly: $5.5B (5%)**	Test: $8.2B (7%)

Assembly Process

Dicing	Die Attach	Wire Bond	Packaging	Plating	
	✓		✓	✓	**Leadframe** Wire Bond
	✓		✓		**Substrate** Wire bond
	✓		✓		**Substrate** Flip chip/TCB
	✓		✓		**Wafer Level** Hybrid, EMIB, TCB, Flip Chip, FOWLP

* Source: TechInsights, September 2023

Current Operational Profile



- Sales Office
- Production Site
- Sales, Service and R&D Site

- Development activities in Europe
- Production in Asia
- Sales/service activities in Asia, US and Europe

LTM September 30, 2023				
	Europe/RoW		Asia	
Revenue (MMs)	€ 155.7	28.0%	€ 401.2	72.0%
Headcount	616	31.0%	1,357	69.0%

Summary Financials

Year Ended December 31, (€ millions, ex share data)	**2020**	**2021**	**2022**	**YTD Q3-22**	**YTD Q3-23**
Revenue	433.6	749.3	**722.9**	585.1	**419.2**
% seq. change	*+22%*	*+73%*	***-3.5%***	*+1.3%*	***-28%***
Orders	472.1	939.1	**663.7**	483.2	**381.9**
Gross margin	*59.6%*	*59.6%*	***61.3%***	*61.1%*	**64.8%**
EBITDA	169.0	335.1	**317.1**	262.3	**166.4**
Pretax income	137.5	303.8	**294.1**	230.4	**142.3**
Net income	132.3	282.4	**240.6**	200.5	**122.2**
Net margin	*30.5%*	*37.7%*	***33.3%***	*34.3%*	***29.1%***
EPS (diluted)	1.67	3.39	**2.90**	2.53	**1.57**
EPS (basic)	1.82	3.70	**3.03**	2.40	**1.54**
Dividend per share	1.70	3.33	**2.85**		
Net cash & Deposits	198.7	370.4	**346.5**	342.5	**90.2**

Long-term, step function growth in cyclical business

- Increased revenue, profitability and market share per cycle

YTD-23 Revenue and Net Income -28.4% and -39.1% vs. YTD-22

- Industry downturn continues
- Particular weakness in computing applications

New industry upturn appears to have formed in Q3-23

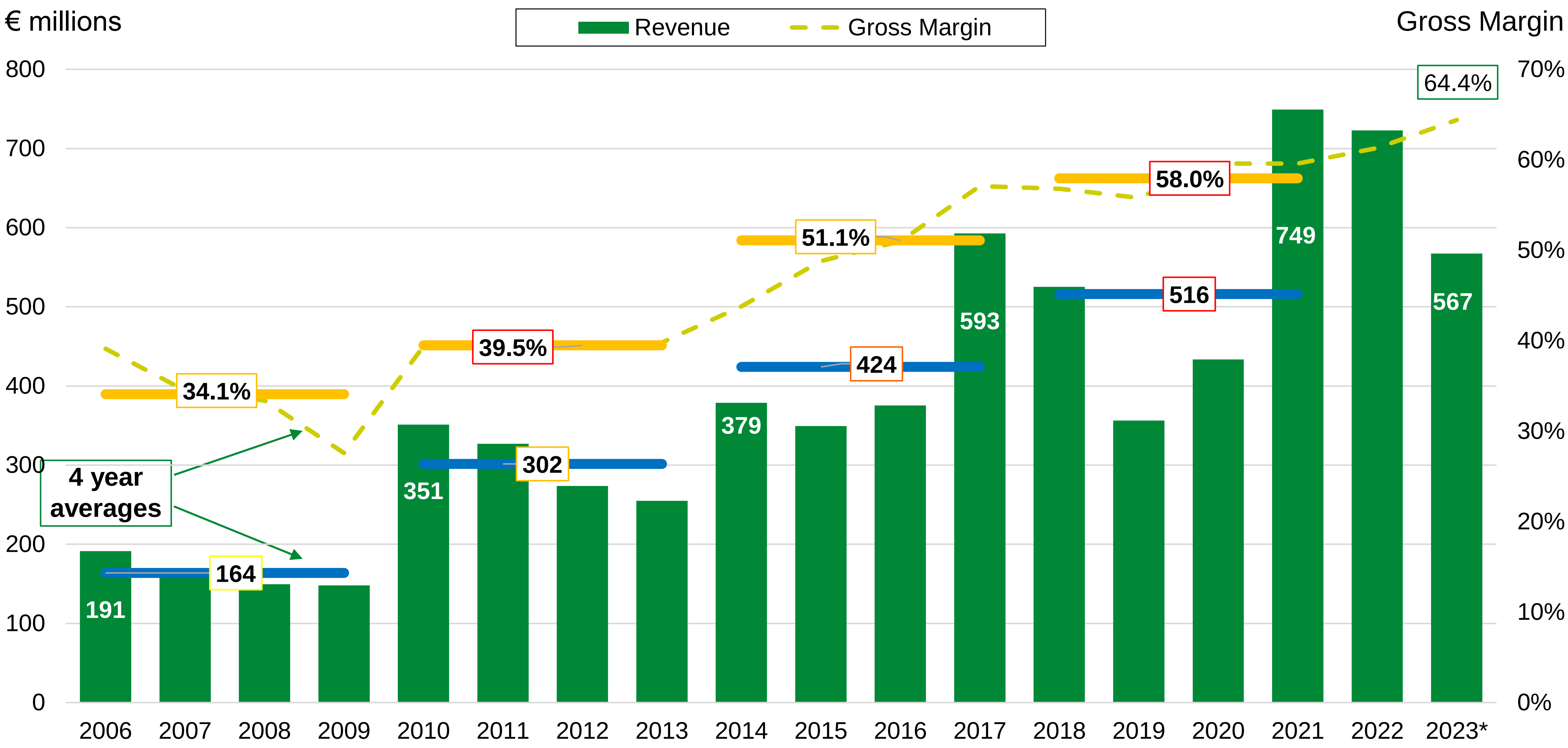
- Sequential orders up 13.1% vs. Q2-23
- Strength in hybrid bonding, photonics and 2.5 D applications

Strong margins and profitability

- Attractive gross and net margins maintained due to overhead alignment with market conditions, favorable product mix and net forex benefits

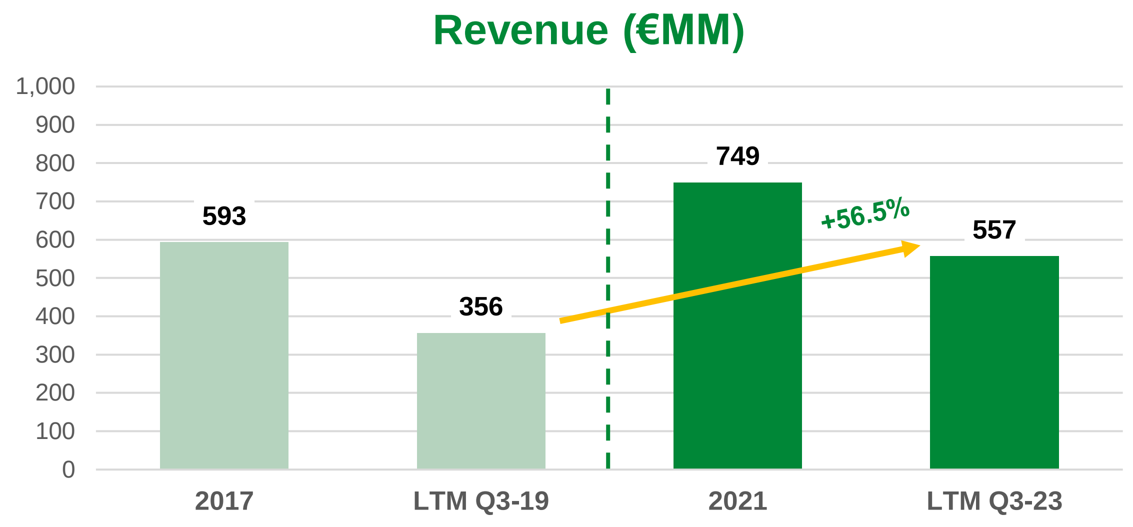
Strong cash generation supports shareholder friendly capital allocation policy

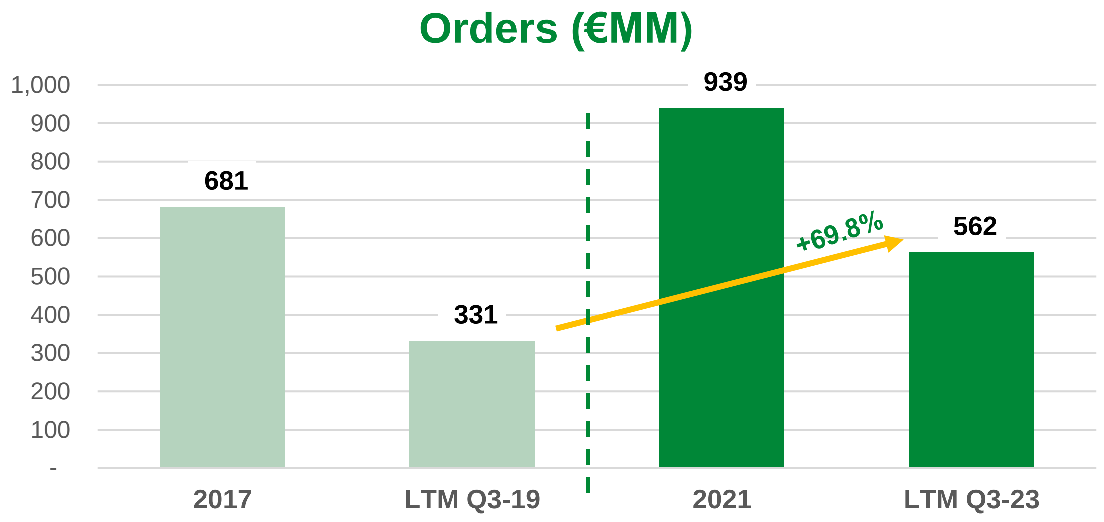
Through Cycle Revenue and Gross Margin Trends

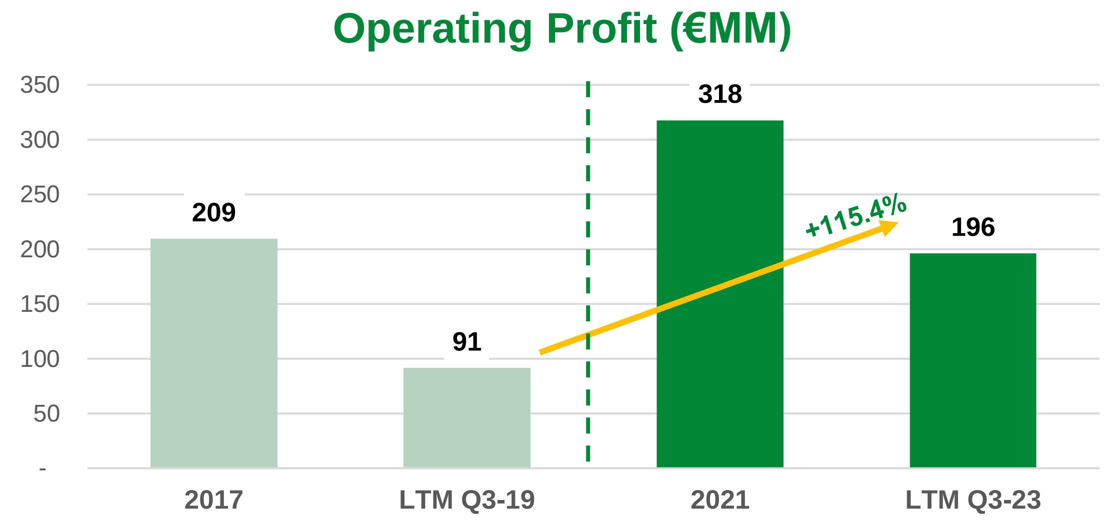


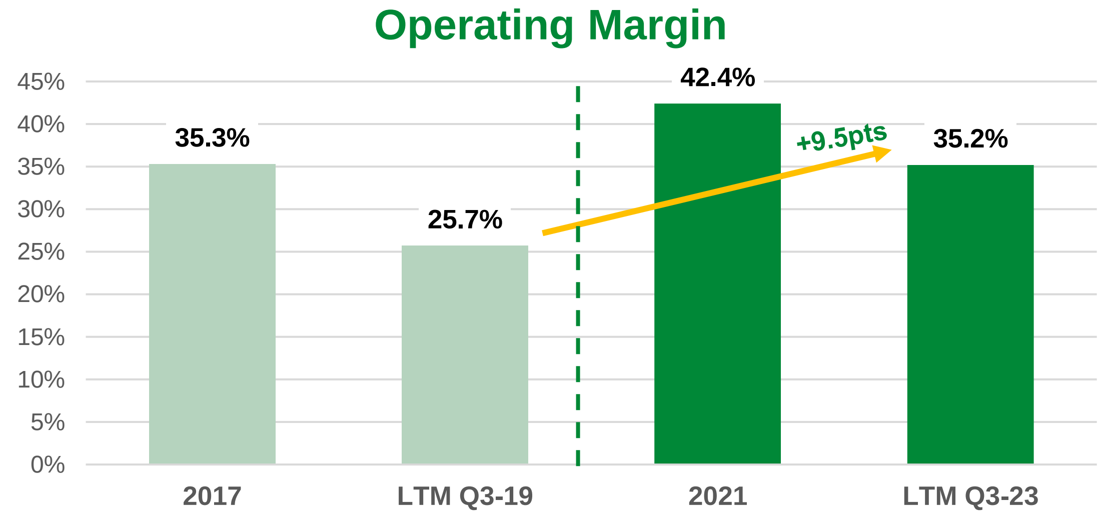
* Including midpoint of guidance for Q4-23

Besi Continues Significant Outperformance vs. Last Industry Downturn

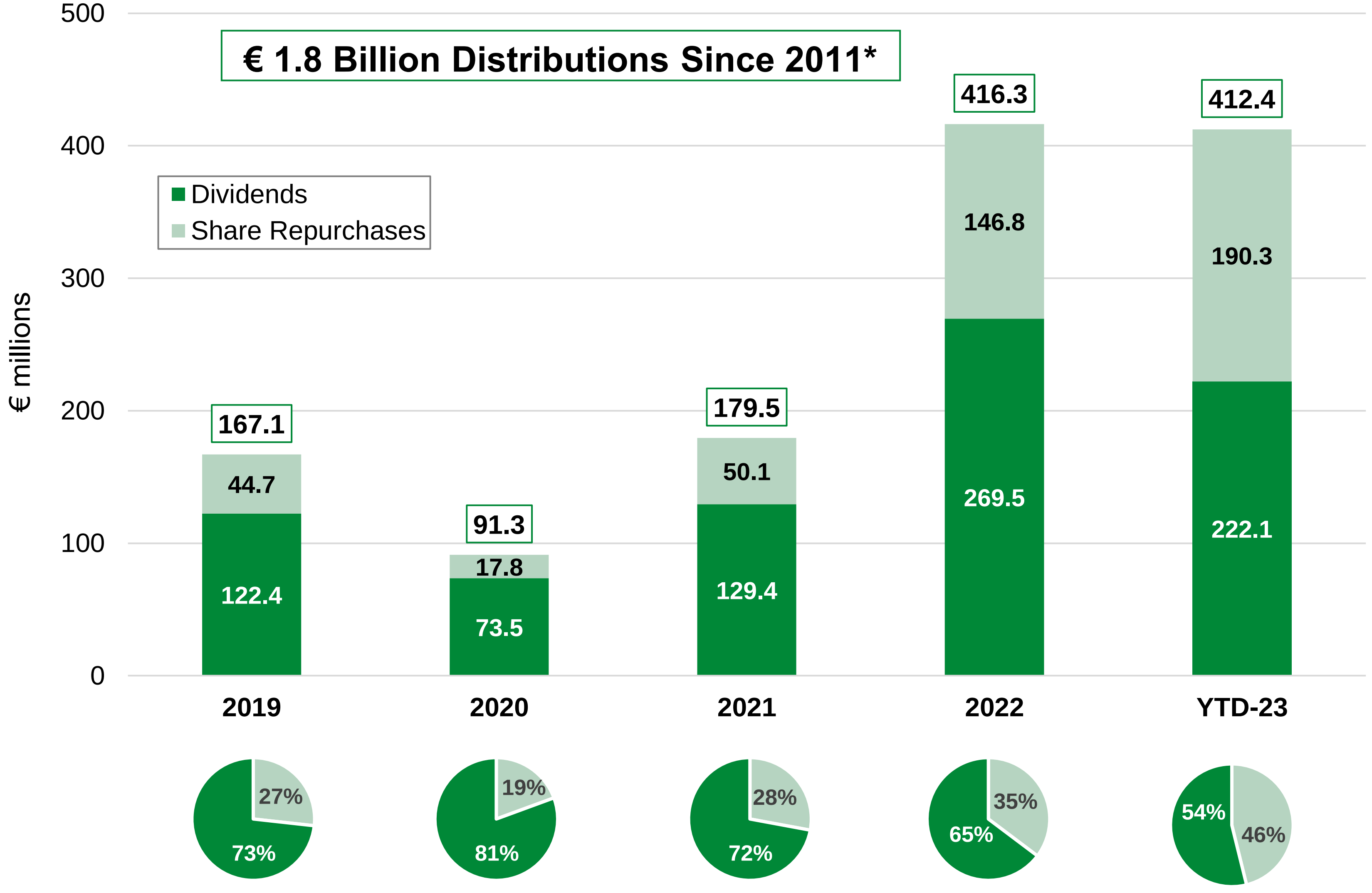








2023 Capital Allocation Exceeds Prior Year Levels. €1.8 Billion Distributed Since 2011



- **€ 412 million distributed YTD-23**
- **€ 300 million share buyback program:**
  - ~4.1 million shares purchased through Q3-23 for € 287 million at average price of € 69.13 per share
- Treasury shares: 4.9% of TSO
- Completed October 27, 2023
- **Next € 60 million share buyback program announced**
  - Effective November 1, 2023
  - Expected completion: October 2024

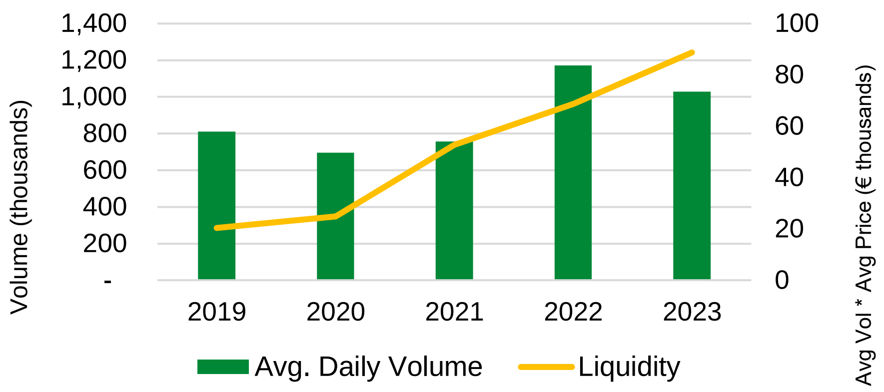
* Includes share repurchases through September 30, 2023

Besi Market Cap and Liquidity Has Expanded
Shareholdings Migrated from NL to US/UK over Past Years

Market Profile

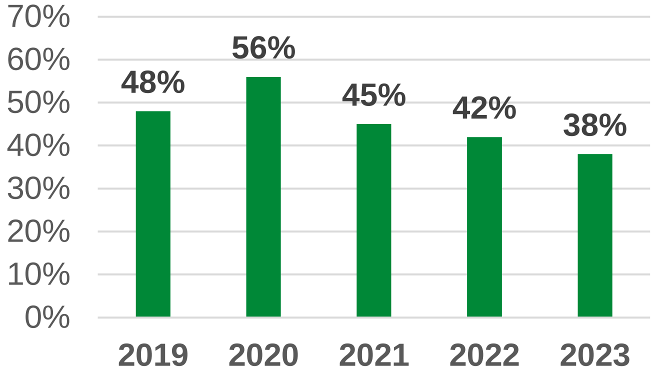
Symbol/ Index	• BESI • Euronext AEX
Market Cap*	• € 7.2 billion ($ 7.8 billion)
Dividend Policy	• Pay out 40-100% of net income per annum

Avg. Daily Volume and Liquidity*

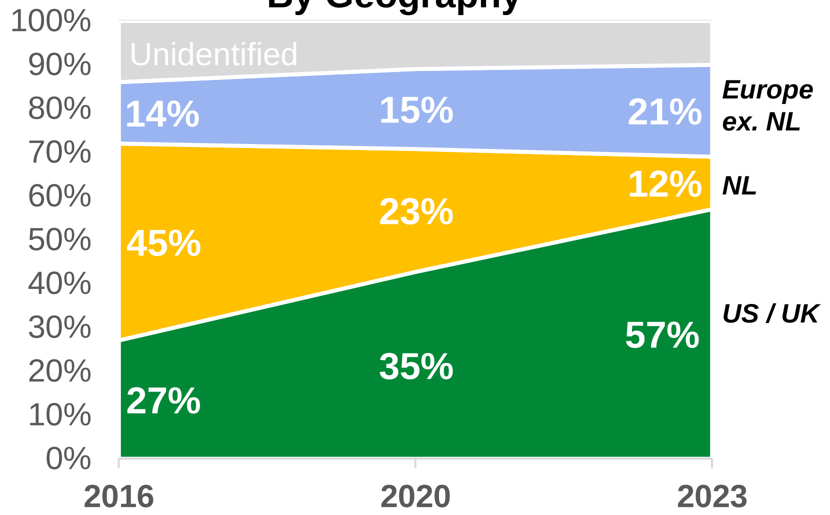


Share Ownership

Top 10 Shareholders**
(% of shares outstanding)



By Geography



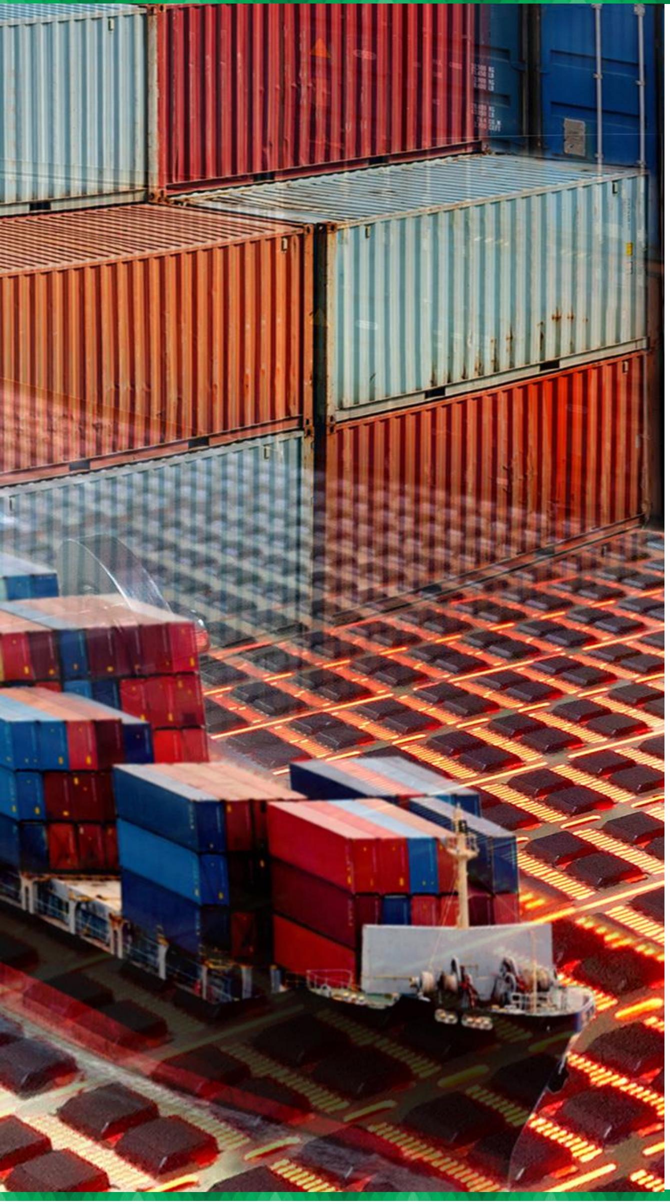
Share ownership is based on information per AGM of presented year

* As of September 30, 2023 ** Besi estimates

Business Model

Business Model

Revenue	€ 1 billion+++
Addressable Market Share	40%+
Gross Margin	60-64%
Operating Margin	30-45%
Headcount Split	80% Asia/20% Europe/NA
Scope 1 and 2 Emissions	62% reduction
Global Energy Needs	75% from renewable sources



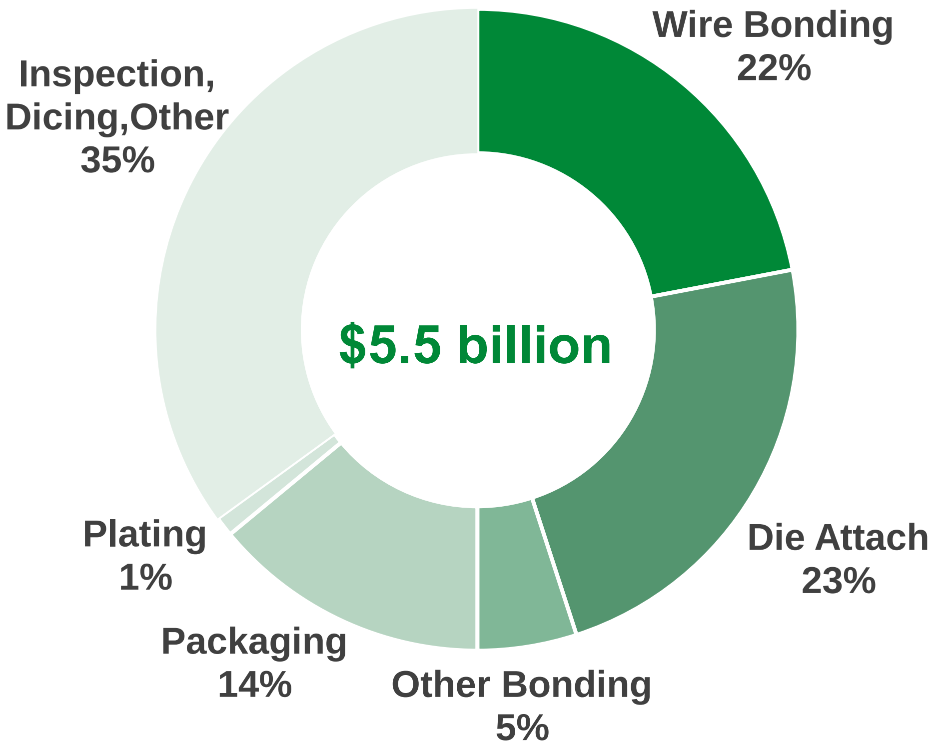
II. MARKET OVERVIEW

What Drives Besi’s Business?

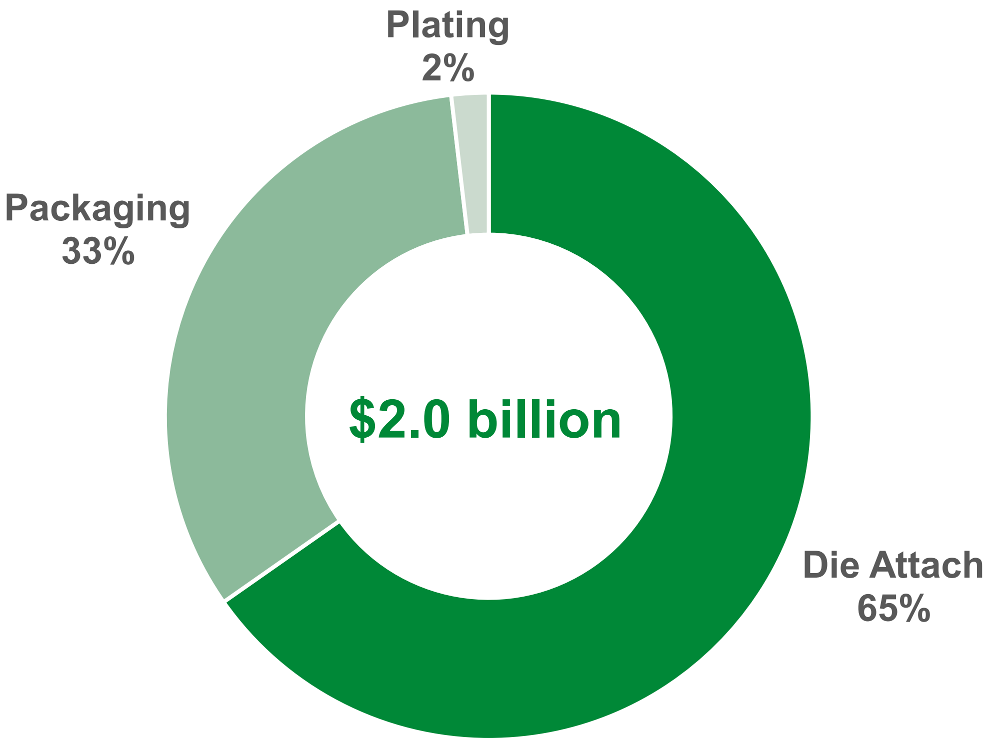
Macro GDP trends	Selection of IDM and supply chain partners	Timing of customer roadmaps
Meeting demanding technical specs	Performance in 24/7 production environments	Competitive cycle times and scalability

Assembly Equipment Market Composition

Assembly Equipment Market (2022)

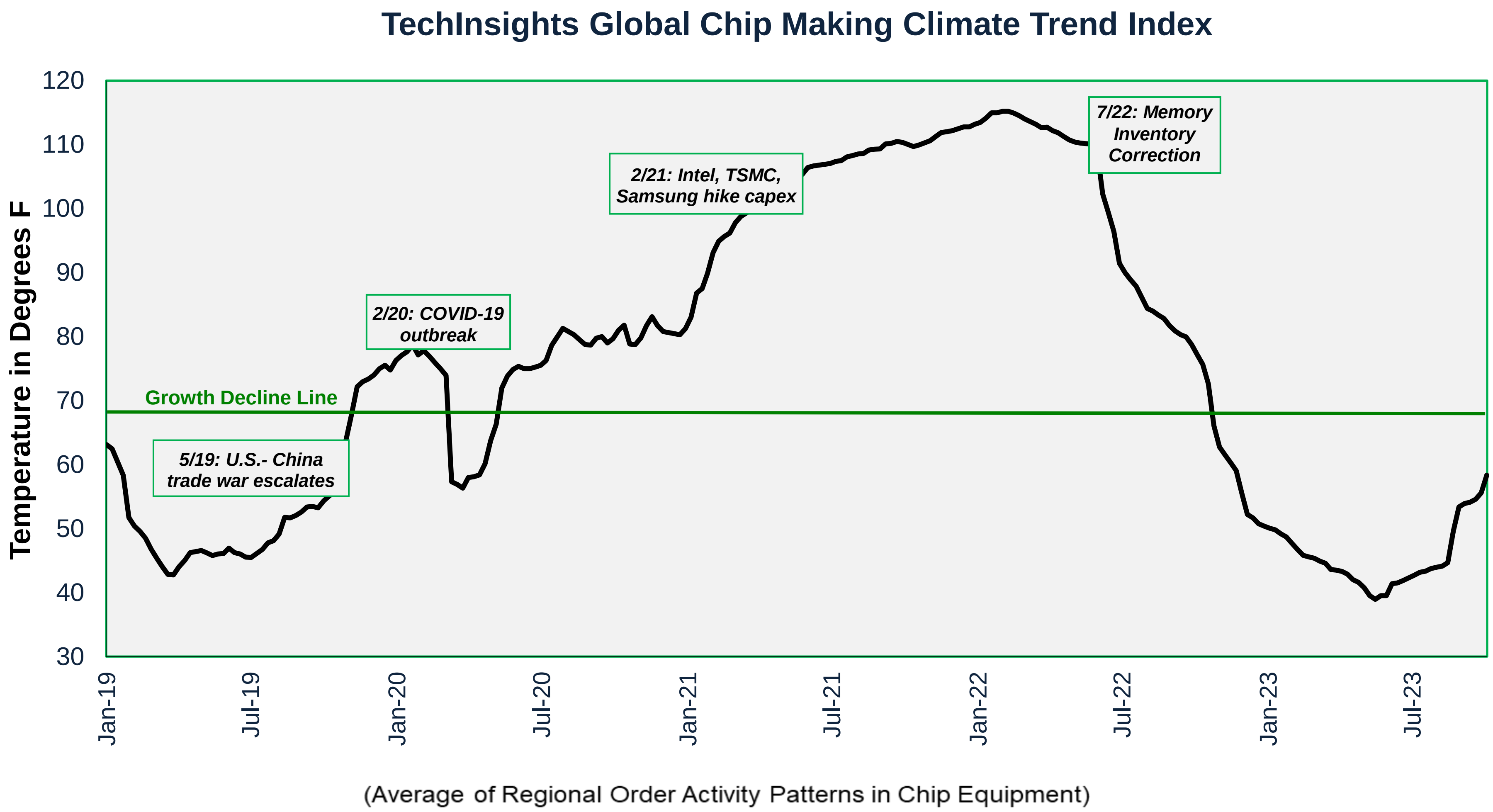


Besi Addressable Market (2022)



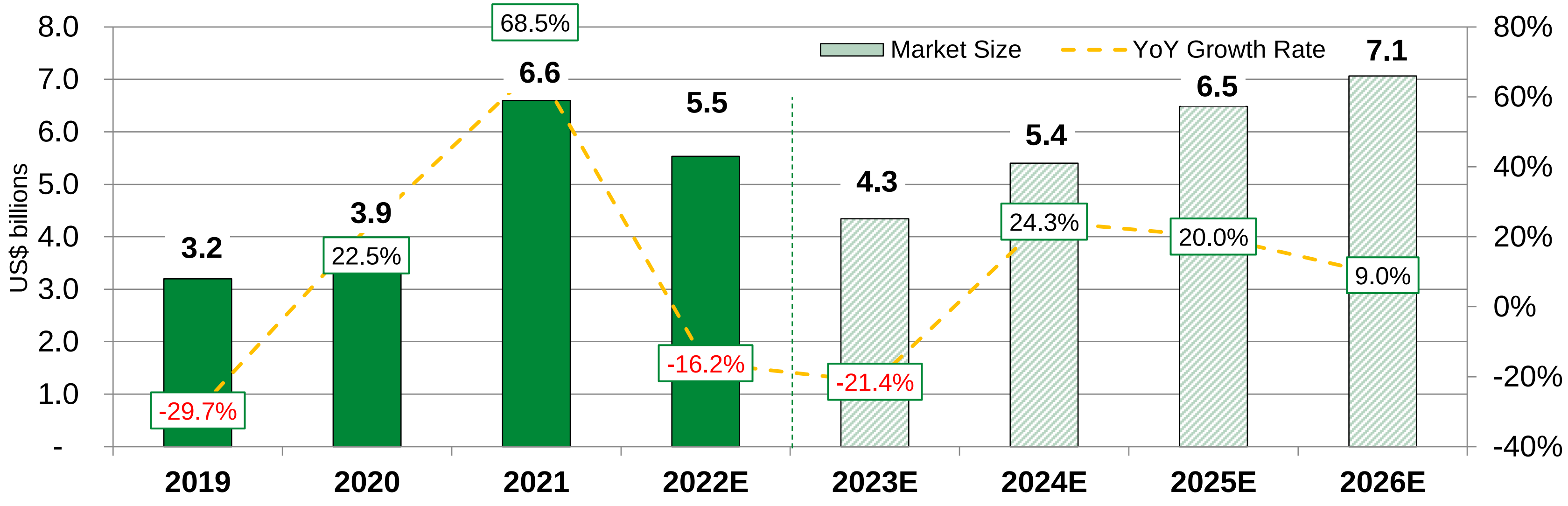
Source: TechInsights, September 2023

New Industry Upturn Forming Post Q2-23 Trough

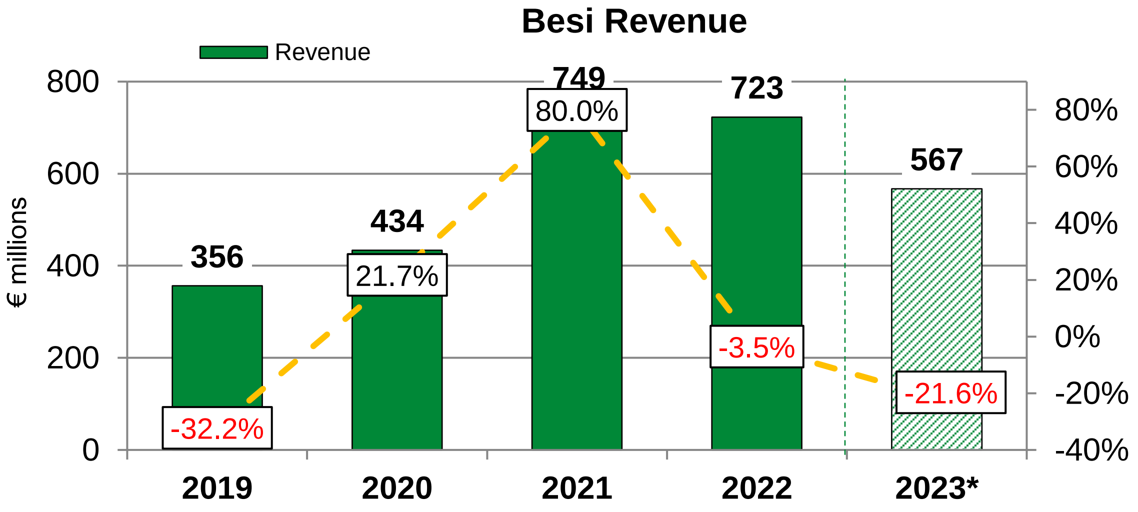


Source: TechInsights, October 2023

Assembly Market Rebound Forecast 2024-2025



Source: TechInsights, October 2023. Assembly equipment revenue excludes hybrid bonding contribution and service revenue.



* At midpoint of Q4-23 guidance

TechInsights forecasts 21.4% downturn in 2023

- Versus -23.4% last forecast
- ~34% decrease from 2021 peak

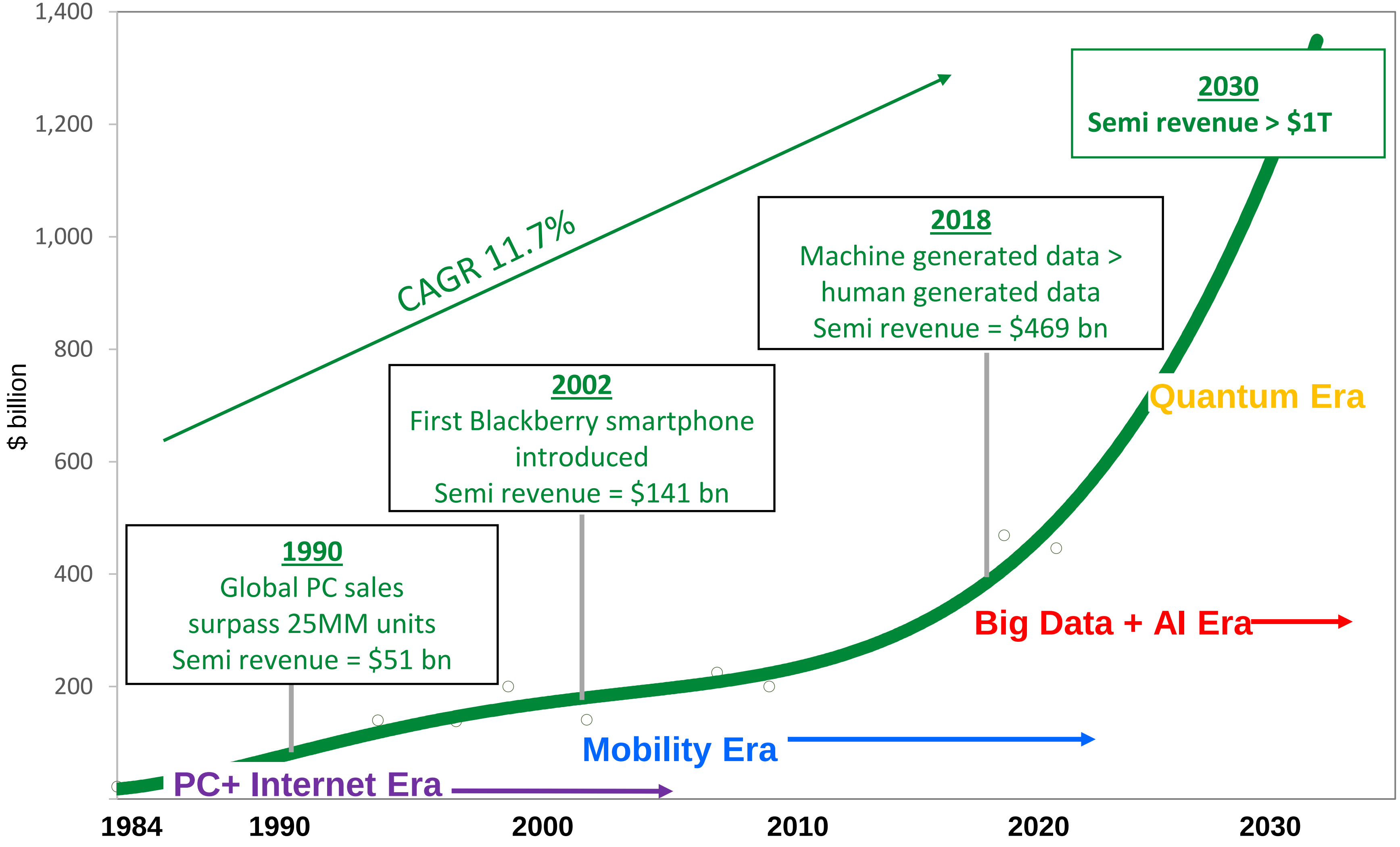
Strong rebound anticipated in 2024 and 2025

- Expected to reach $ 7.1 billion in 2026
  - +62% from 2023 levels

Secular fundamentals intact:

- AI, datacenter, HPC, 5G primary drivers
- Investment in new process technologies: hybrid bonding/CSP
- Onshoring new advanced packaging fabs

Long-Term Semiconductor Demand Growth Continues



- Market required ~50 years to reach $500 billion in sales
- Estimates call for > $1 trillion in sales within next 10 years

Data source: SEMI 2022

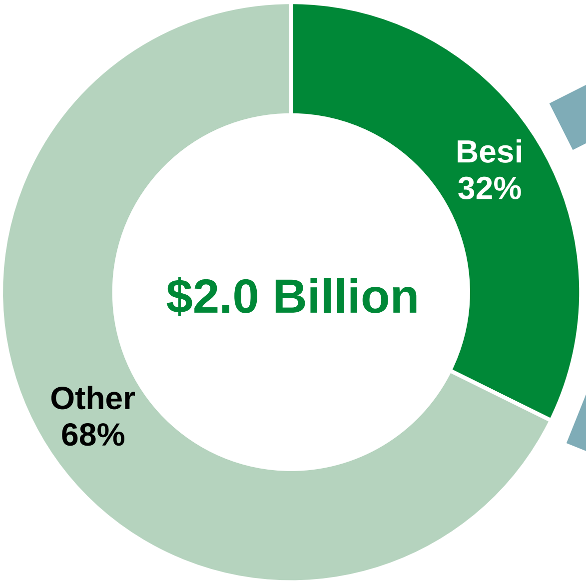
Besi Addressable Market Share Increasing Particularly in Key Die Attach Markets

	2016	2018	2020	2021	2022	∆ '22/'21	∆ '22/'16
Assembly Market ($MM)	3,587	4,542	3,916	6,597	**5,540**	-16.0%	+54.5%
Besi Market Share	9.9%	11.2%	10.5%	11.7%	**11.5%**	**-0.2pts**	**+1.6pts**
Addressable Market ($MM)	1,507	1,859	1,439	2,444	**1,966**	-19.6%	+30.5%
Besi Market Share	23.7%	27.3%	28.5%	31.7%	**32.3%**	**+0.6pts**	**+8.6pts**
Die Attach	30.4%	33.2%	35.4%	39.4%	**39.7%**	**+0.3pts**	**+9.3pts**
Packaging & Plating	13.6%	17.0%	15.3%	15.7%	**18.3%**	**+2.6pts**	**+4.7pts**
% of Besi Revenue	**2016**	**2018**	**2020**	**2021**	**2022**	**∆ '22/'21**	**∆ '22/'16**
Die Attach	75%	76%	82%	82%	**79%**	-3pts	**+4pts**
Packaging & Plating	25%	24%	18%	18%	**21%**	**+3pts**	-4pts

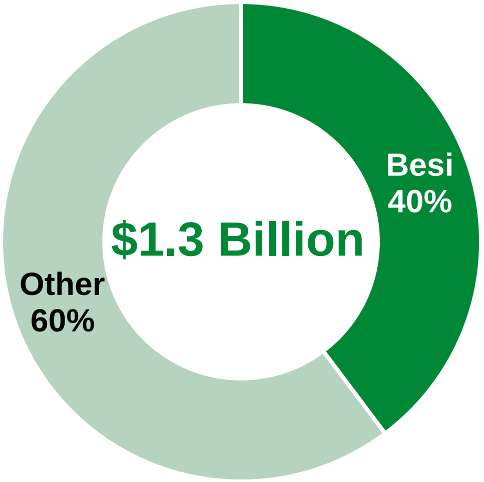
Source: TechInsights, July 2023

Leader in Addressable Market, Die Attach Market and Advanced Die Placement

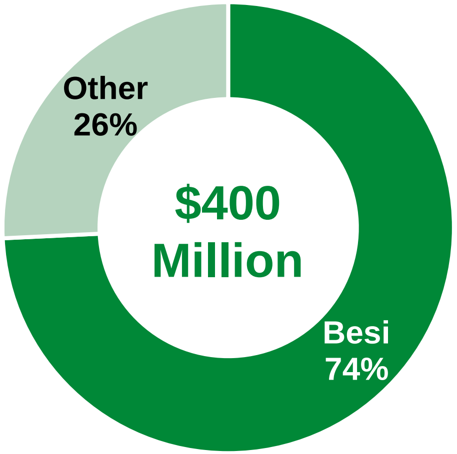
2022 Addressable Market*



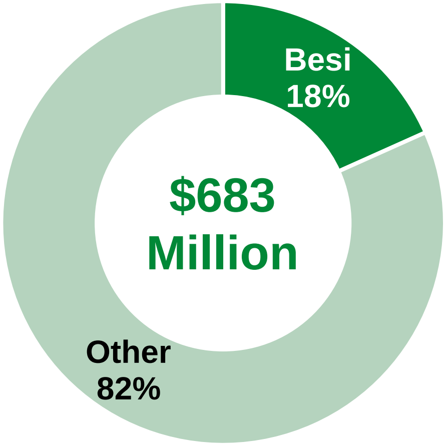
Die Attach
(79% of Revenue)



Advanced Die Placement**



Packaging & Plating
(21% of Revenue)

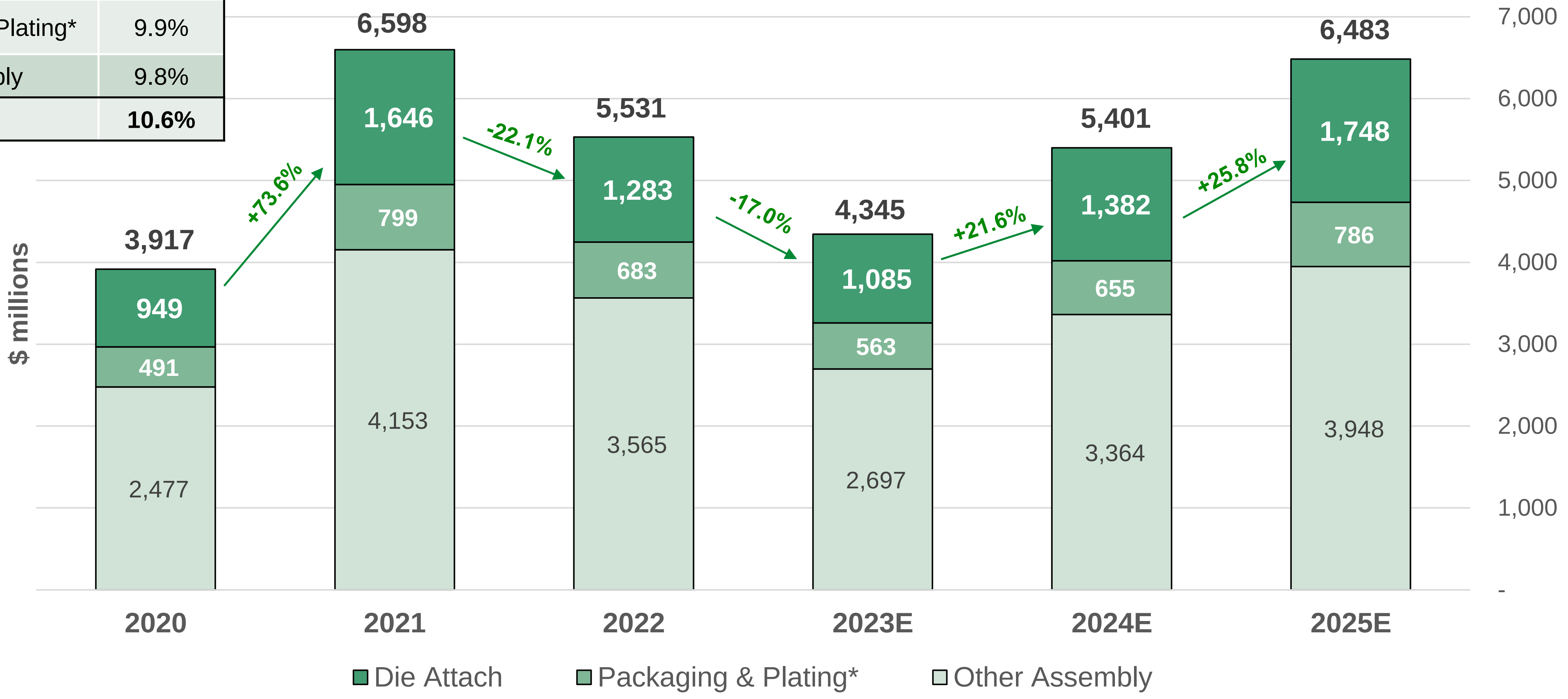


* Excludes wire bonding, dicing, and other.
** Advanced die placement defined as < 7 micron accuracy per TechInsights

Source: TechInsights, July 2023. Equipment only.

Growth Expected to Favor Besi's Product Portfolio, Particularly Die Attach

CAGR (2020-2025)	
Die Attach	**13.0%**
Packaging & Plating*	9.9%
Other Assembly	9.8%
Total	**10.6%**



Source: TechInsights, September 2023. Addressable market revenue excludes hybrid bonding contribution.
* Packaging & Plating includes only Besi's addressable segments. Non-addressable reported in other assembly market.

Advanced Packaging Critical to Next Generation Applications

Growth Drivers

Mobile Revolution

- Mobile internet
- Messaging
- Social media
- Shared economy
- Gaming
- Geo-location
- Audio/video
- Auto electronics

Digital Society

- Smart mfg, cities, mobility and homes
- Internet of Everything
- Artificial intelligence
- 5G mobile/wearable devices
- Hyperscale cloud infrastructure
- Driverless cars
- Data mining
- VR/AR
- Gaming & Infotainment

Enablers

Greater Miniaturization

Higher Accuracy

Greater Complexity

Besi

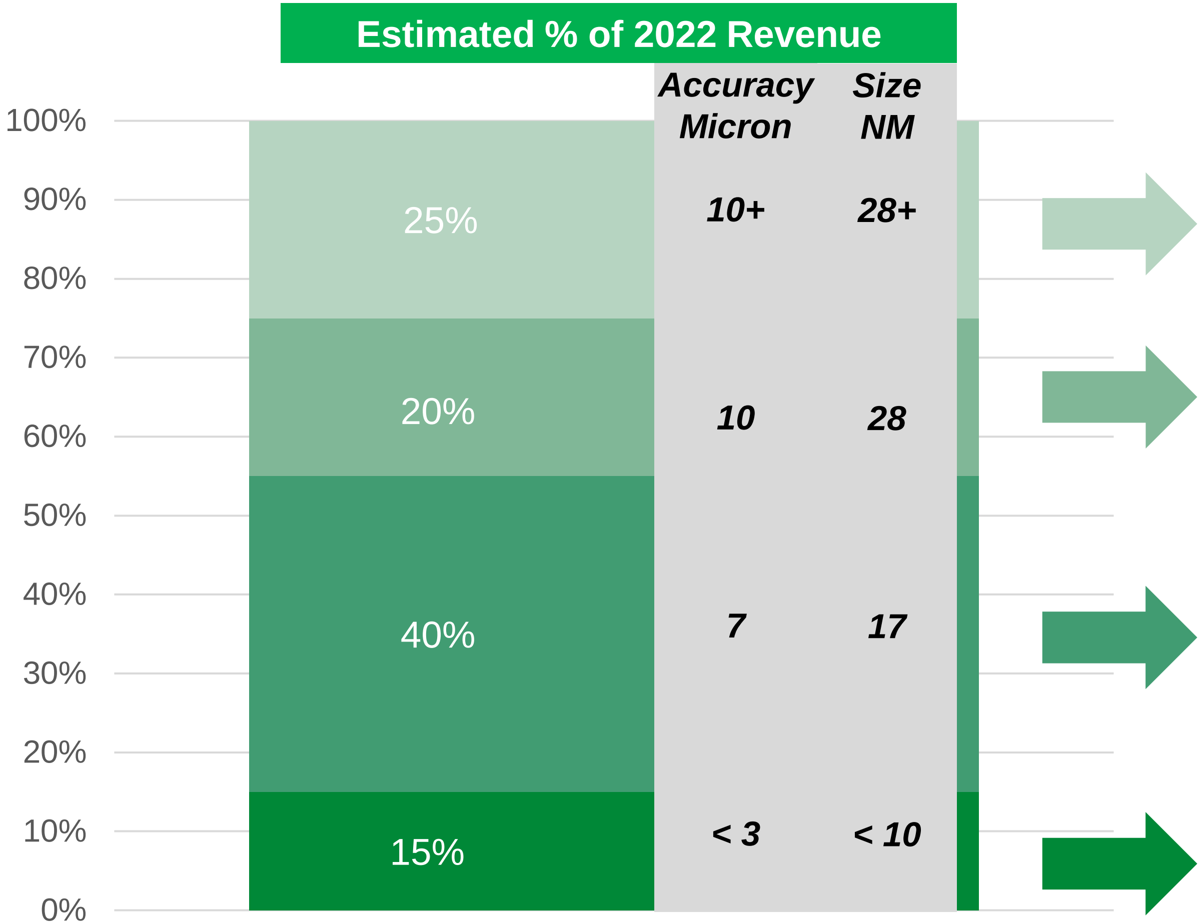
Die Bonding and Packaging Portfolio

Lower Power Consumption

Increased Density

Higher Performance

Besi Portfolio Well Positioned by Node Size and Accuracy



Typical Application	Besi Equipment
Automotive, SiP Power	*Die Attach Packaging Plating*
IOT General ICs	*Die Attach Packaging Plating*
Computer, PC, Mobile Cloud Computing	*Die Attach Packaging*
High Performance Computing Memory, Hybrid Bonding	*Die Attach Packaging*

- **75% of Besi equipment revenue defined as advanced packaging (<10 micron accuracy, <28 nano node size)**
- 55% equipment revenue < 7 micron accuracy and < 17 nanometer node size
- Most rapidly growing market segment

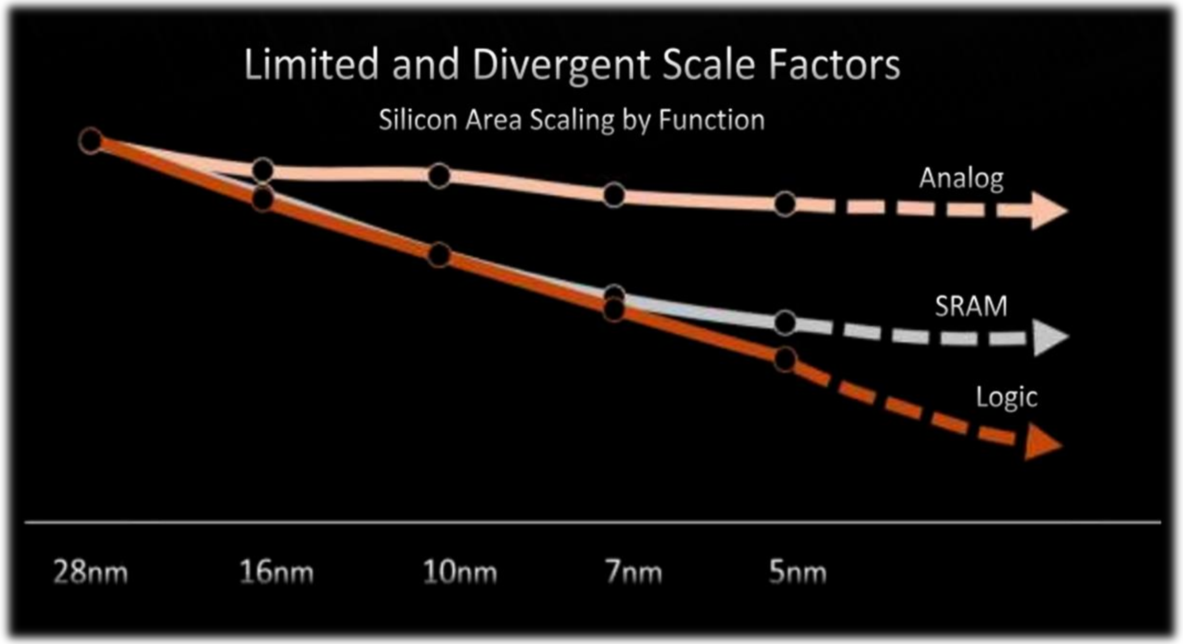
Slowing of Moore's Law Drives Adoption of Chiplet Architectures and New Assembly Solutions

Problem

- Moore's Law slowing
- Cost per transistor increasing
- Some circuits don't shrink as node sizes reduce
- Die size increasing beyond reticle limit

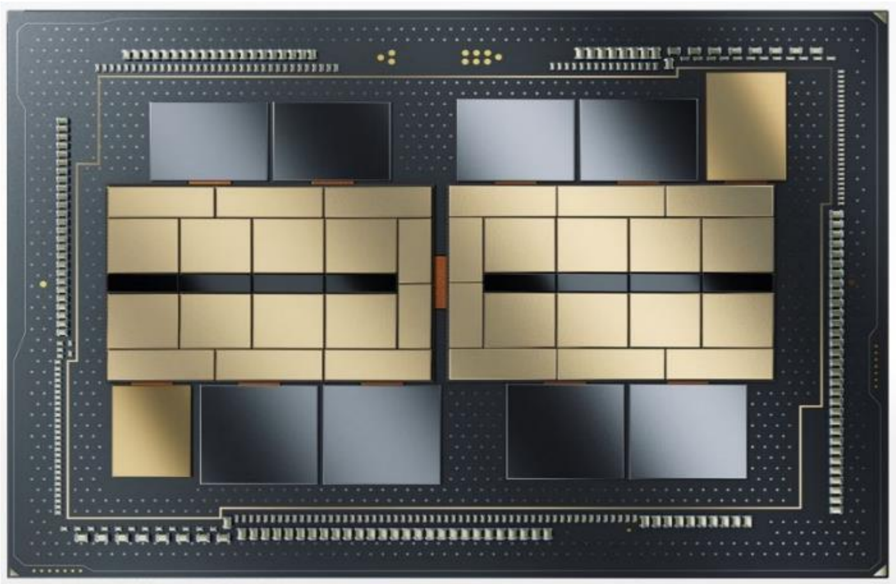
Solution

- Split SoC into multiple, smaller **chiplets**
- Optimize scale per function
- Connect chiplets within package utilizing advanced **chip-to-wafer die attach**



Source: ASML

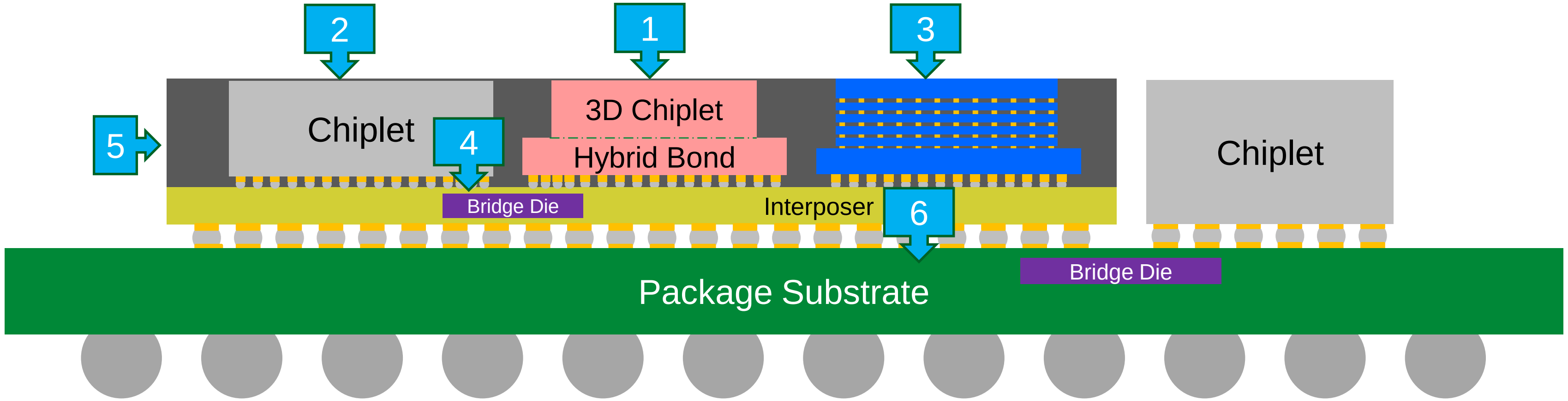
Intel's Ponte Vecchio: 47 Active Chiplets in One Package

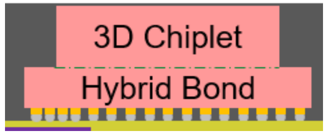
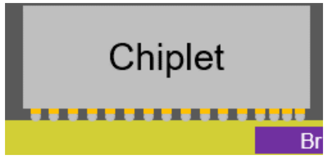
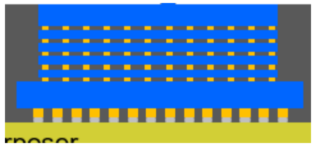
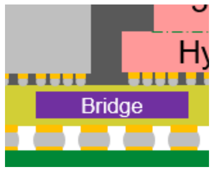
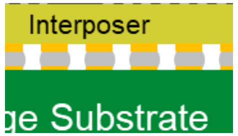


Source: Intel

New 3D Chiplet Structures Use Variety of Assembly Processes

Besi

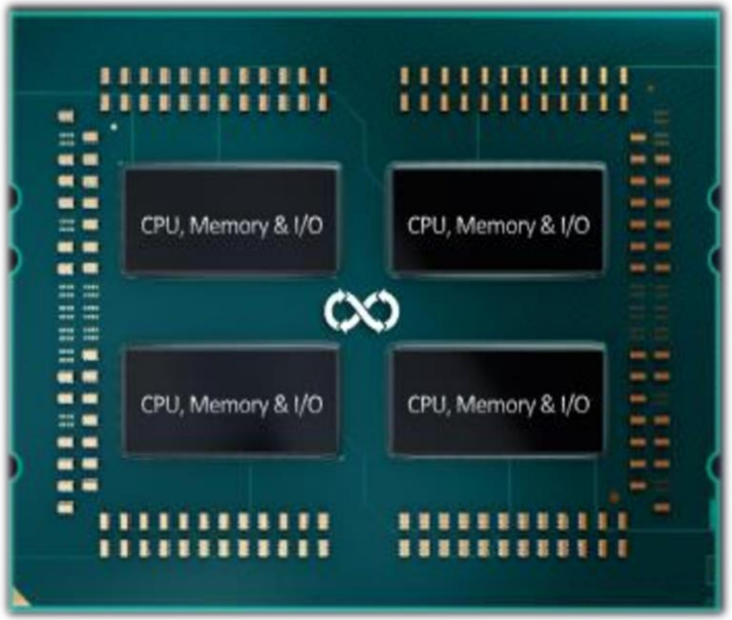


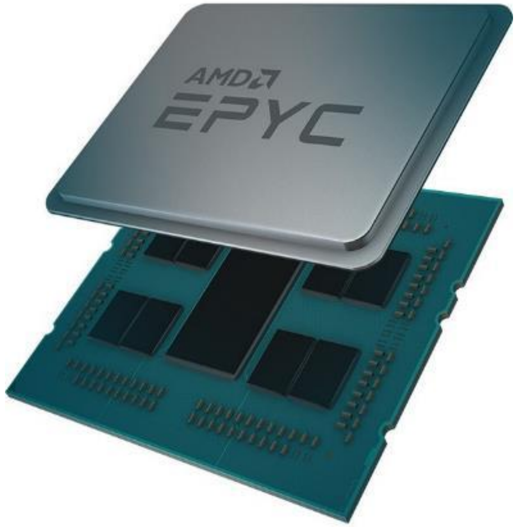
1	2	3	4	5	6
Hybrid Bonding	Chip to Wafer TCB	High Bandwidth Memory Stacking	Embedded Bridge Die Attach	Wafer Level Die Molding	HD Interposer to Substrate
					
8800 CHAMEO Ultra Plus	**9800 TC Next C2W**	**8800 CHAMEO Ultra Plus 8800 TC Advanced**	**8800 Chameo Ultra**	**FML**	**2200 evo**

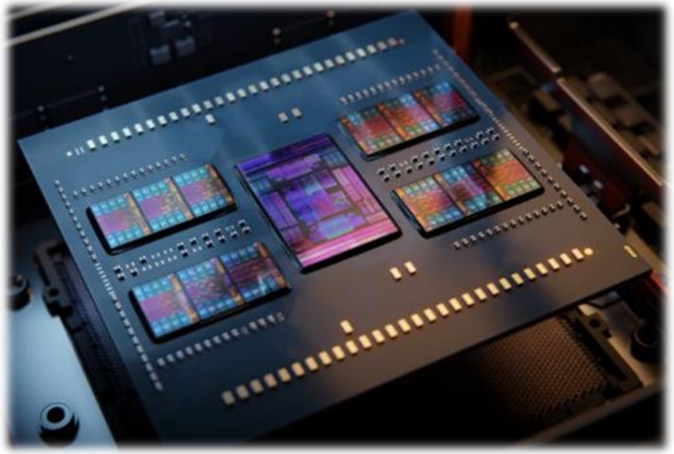
And Will Increase Process Steps/Capital Intensity

2017 → **2019** → **2023**

1st Gen EPYC	2nd Gen EPYC	4th Gen EPYC
4 flip-chip placement steps	**9 flip-chip placement steps**	**> 50 die placement steps** including hybrid and flip-chip







Source: AMD

Besi Process Solution:

8800 FC Quantum
ASP: $500k
UPH: ~9,000

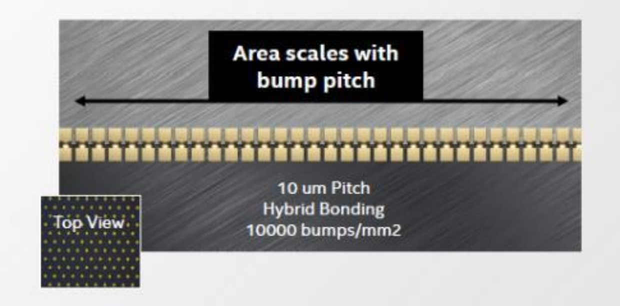
→

8800 Ultra Accurate C2W Hybrid Bonder:
ASP: $1.5MM-$2.5MM
UPH: ~1,500 → ~ 2,000

Hybrid Bonding Extends Moore's Law by Heterogeneous 3D System Scaling

Enables faster, more complex devices with submicron placement accuracy

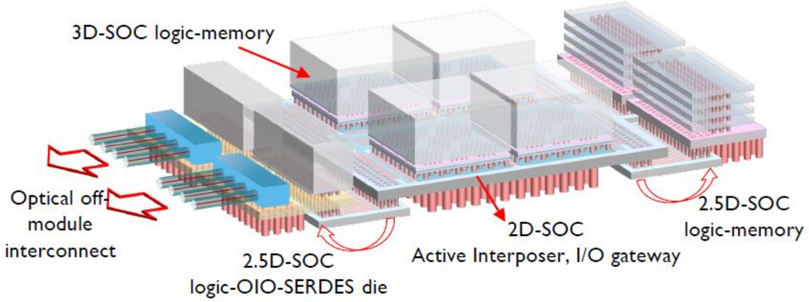
Direct Cu-Cu Interconnect in 3D



1000x increase in contact density

\+

Heterogeneous integration of chiplets



More transistors per package

Increased Performance

- Increased data transfer
- Higher bandwidth
- Higher speed

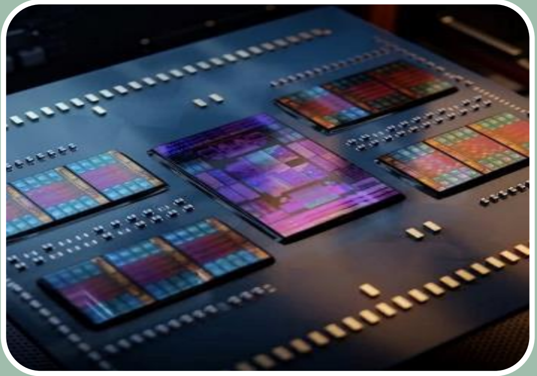
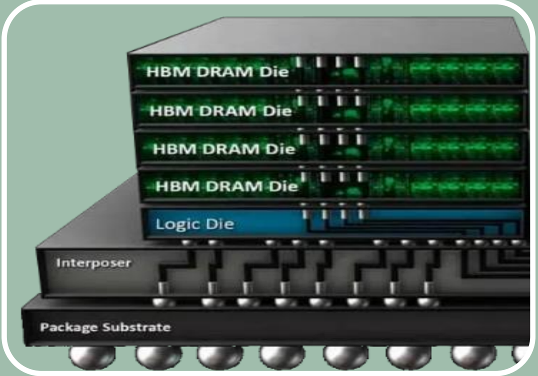
Lower Cost of Ownership

- Higher die yield
- Lower energy per bit
- Lower cost per contact
- Lower heat dissipation

Design Flexibility

- New 3D chiplets
- Fab node optimization
- Customized designs
- Highly configurable

Applications Driving Hybrid Bonding Growth

High Performance Compute	Advanced Memory	Mobile	Sensors & Photonics
			
Unified Compute/Memory Core on Core	**Advanced Memory Stacking**	**Application Processors mmWave RF**	**Integrated Silicon Photonics**
AI Gaming Datacenters	HBM4 DRAM	Smartphones	Image Sensors AR/VR Display

Hybrid Bonding Update

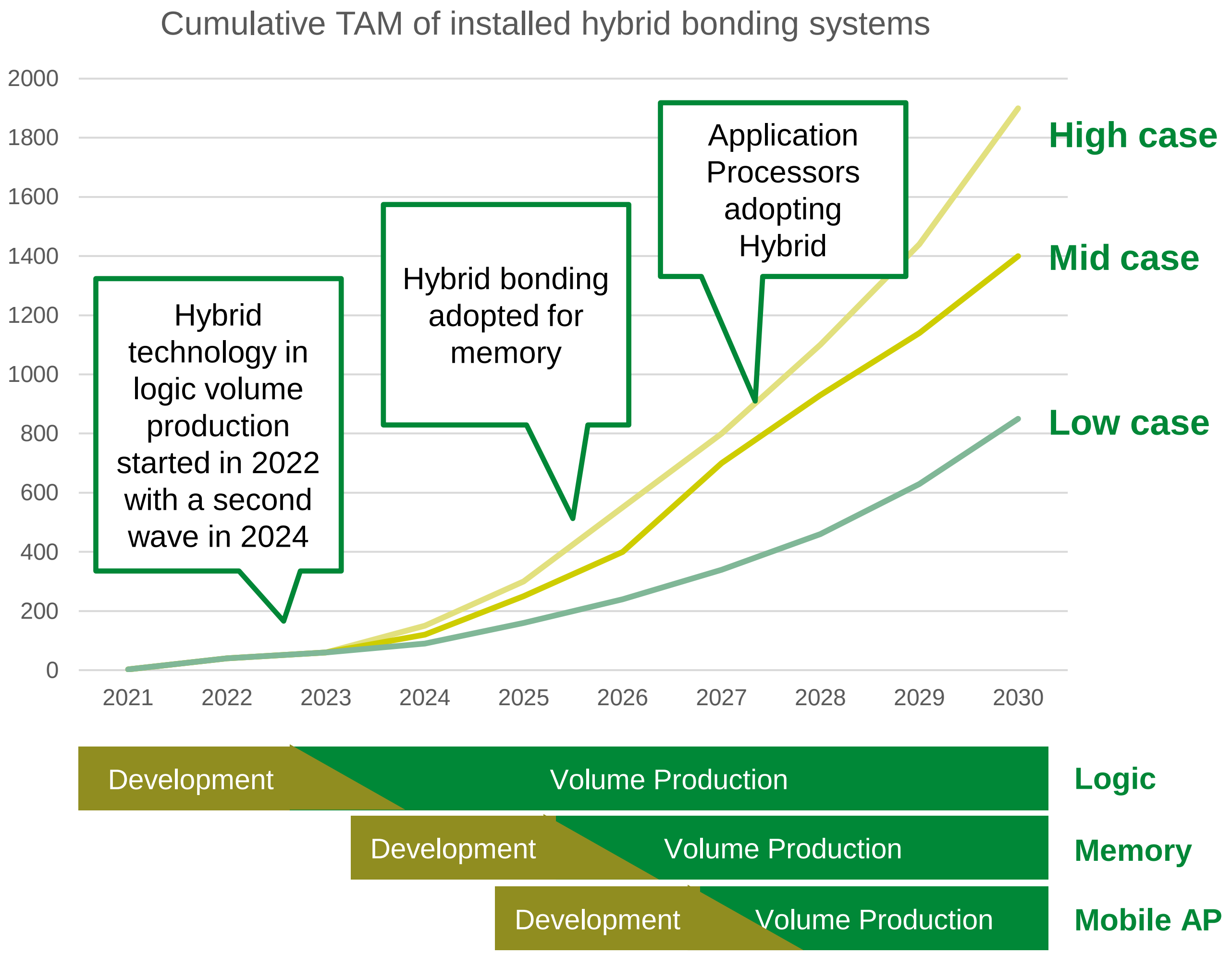
Industry Adoption

- Active engagement increasing by leading semi producers
- Full scale commercial production achieved in H2-22 for HPC
- First orders received in H2-23
  - Memory/HBM applications
  - Leading assembly subcontractor
- Chiplet interface standards being developed

Besi Progress

- ~40 total revenue producing units anticipated to be shipped by end Q4-23
- Backlog of 15 units at end of Q3-23
- Commercial production yields achieved
- Integrated production lines installed at 2 customers
- Sufficient capacity in place to support near term growth

Hybrid Bonding Market Potential



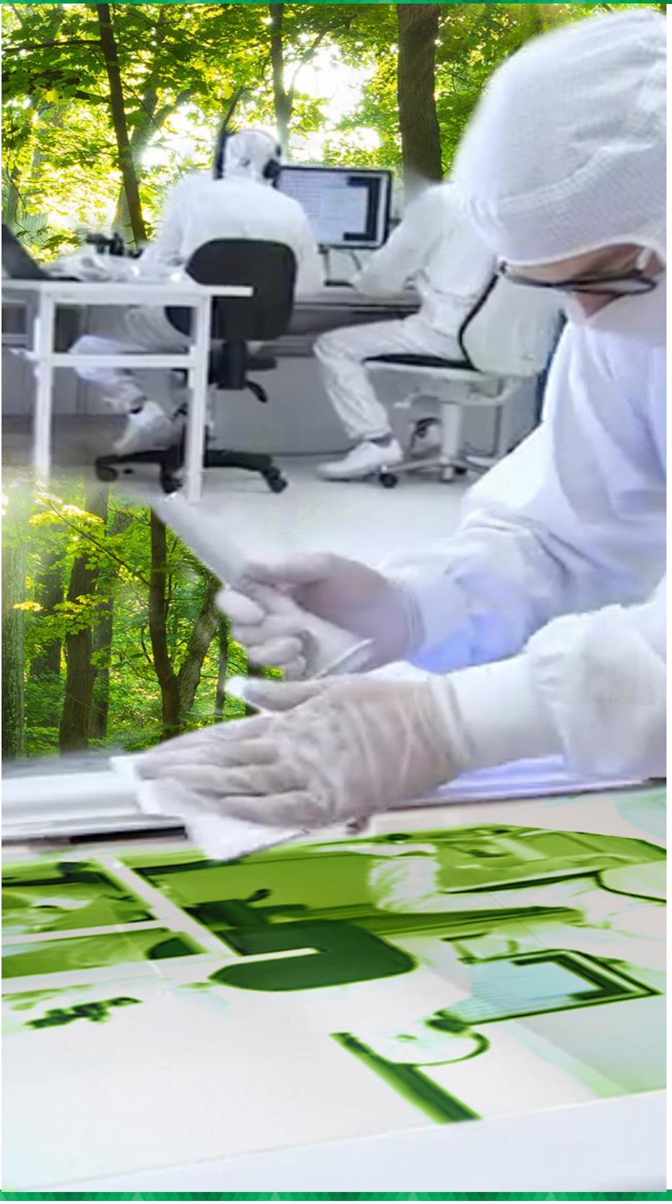
Source: Besi estimates, June 2023.
Cases based on potential adoption scenarios.

Estimated 800 – 1,900 systems cumulative by 2030

- Logic device production and adoption continues
- Low case represents adoption in logic only
- Technology adoption coming in waves
- Major memory companies engaged for HBM programs
- Increased interest for HB usage in consumer applications

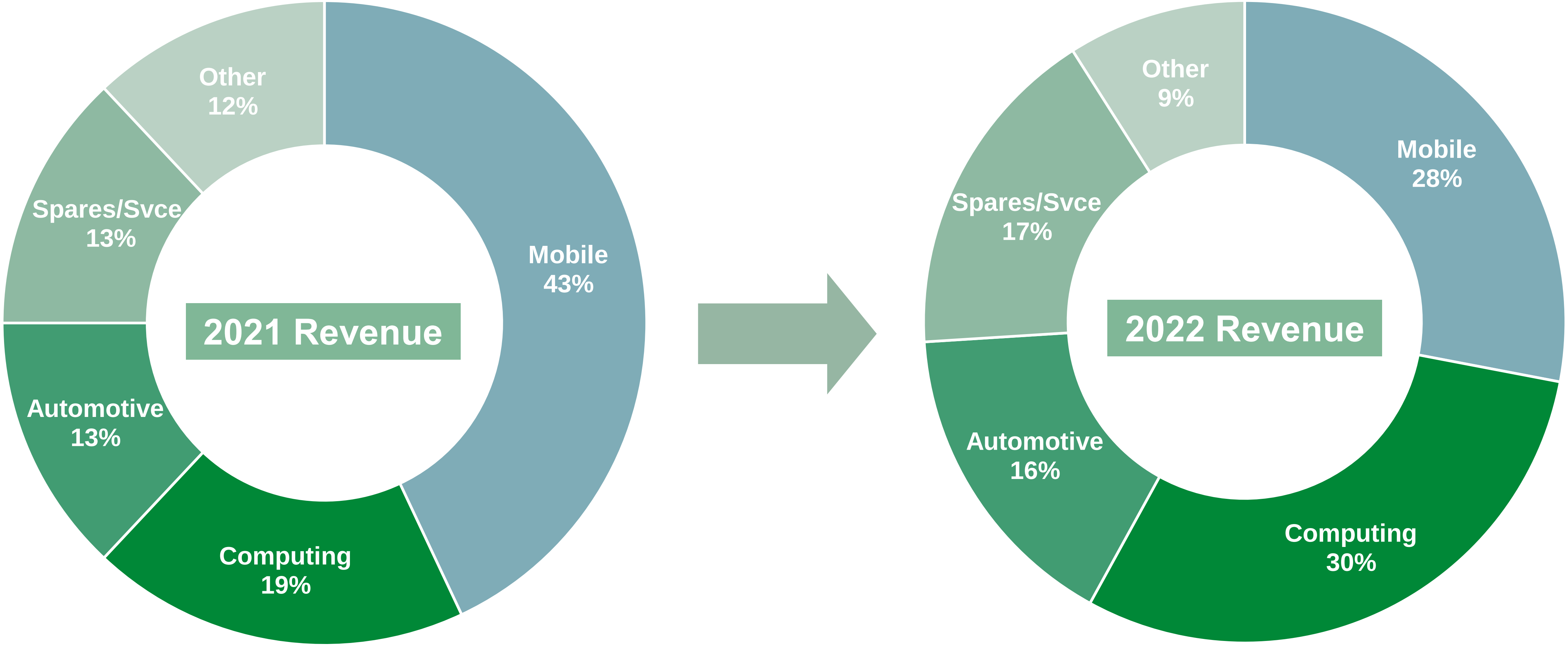
- **Changes to prior market forecast**
  - **Upside and low case unit potential expanded**
  - **Tracking to mid case currently**
  - **Higher ASPs anticipated due to higher accuracy requirements post 2024**

- Expected rollout sequence:
  1. Logic
  2. Memory
  3. Mobile
  4. Other Applications



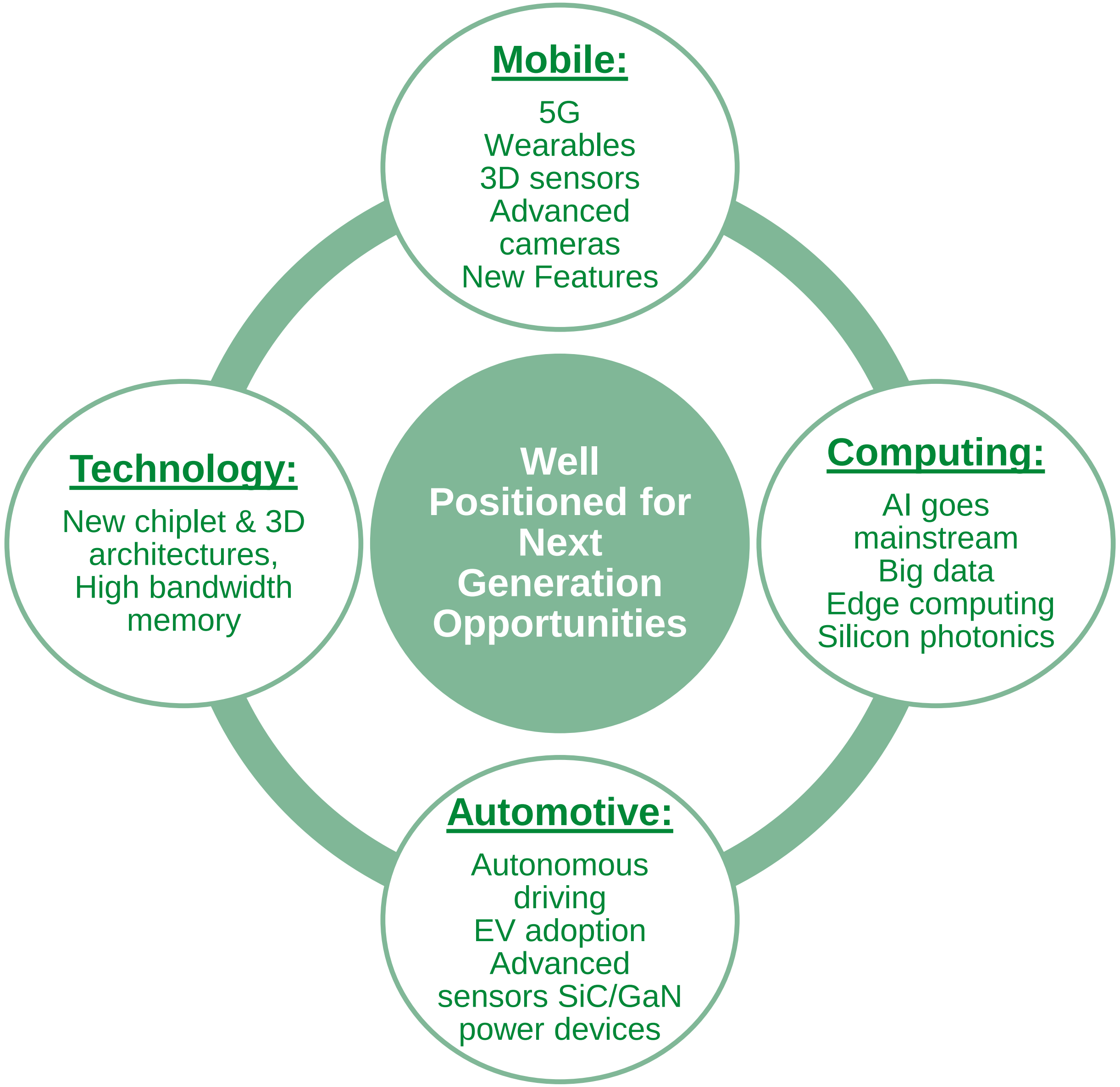
III. END-USER MARKET TRENDS

Besi End-User Market Composition



Source: Company estimates

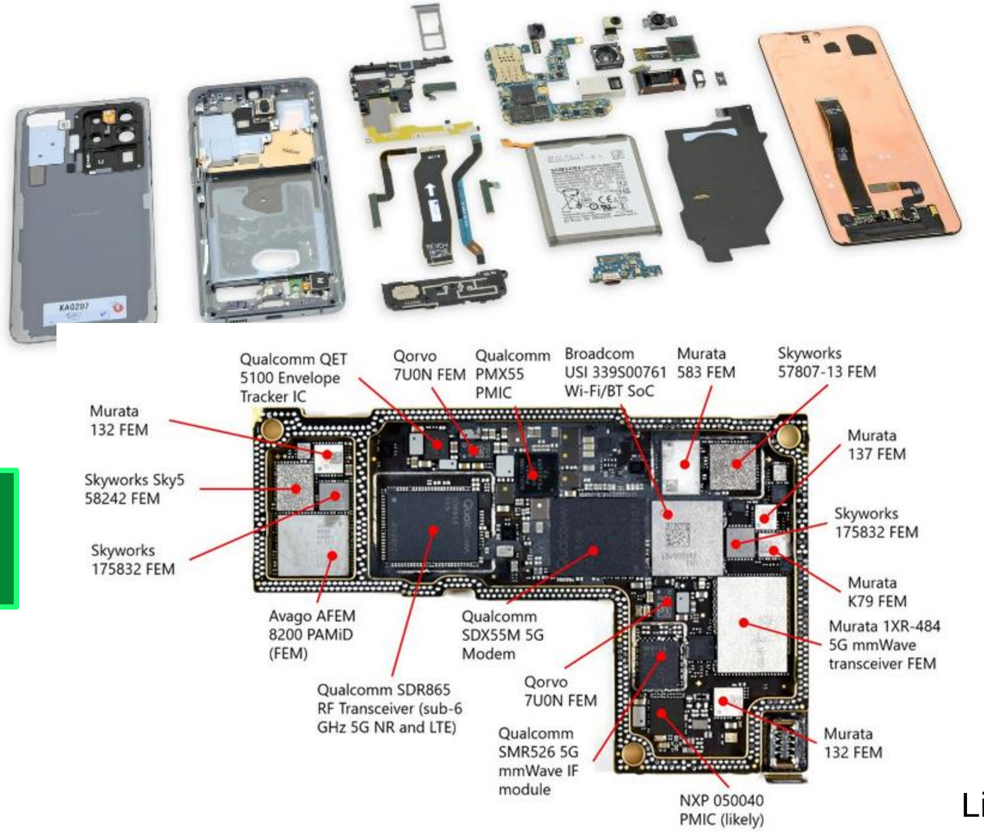
Long Term Secular Growth Drivers



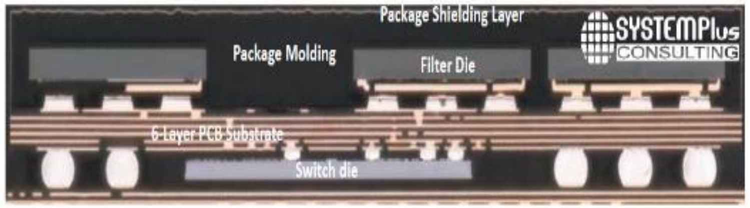
Mobile: Besi's Largest End-User Market
Features/Functionality Key Drivers of Growth

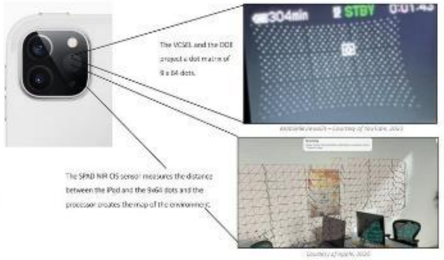
- RF Front End Antennas GPS
- RF Transceiver Modem
- Local Connectivity WiFi/NFC
- Microphone Cameras Sensors
- Display TouchScreen
- Power Battery
- Memory

Application Processor



Lidar





Besi Involved in Almost All Components

Main Components	Besi system Utilized
Processor	8800CHM, MMS-LM
DRAM Memory	2100sD, FSL
NAND Flash	2100sD, AMS-W/LM/FCQ8800
PM IC	2100sD, AMS-W/LM
Motion coprocessor	2100sD, AMS-W/LM
Gyroscope	2100xP, 2100sD, AMS-W/LM, FCL
3-ax accelerometer	2200evo
barometric sensor	2200evo
Charging IC	2100xP, 2100sD, AMS-W/LM, FCL
Power Delivery IC	21000xP
Wireless charging IC	2100xP, 2100sD, AMS-W/LM
Communications	**Besi system Utilized**
Wifi/Bluetooth module	AMS-W/LM / 2100HSi
NFC	8800FCQ, AMS-W/LM,2009SSI
LTE Modem	8800FCQ, AMS-W/LM
Low Band LTE PAD	2200evo, FSL
Mid Band PAD	2200evo, FSL
High Band PAD	2100xP, 2100sD, AMS-W/LM
RF Transceiver	2100xP, 2100sD, AMS-W/LM
RF Receiver	2100xP, 2100sD, AMS-W/LM
Envelop Tracking IC	8800FCQ, AMS-W/LM
Antenna Switch	2100xP, 2100sD
PA	2100xP, 2100sD, AMS-W/LM
PA Module	2200evo, 2100sD
GSM PA module	2200evo, 2100sD
Video/Audio	**Besi system Utilized**
Cameras Back side	2200evo
Cameras Front Side	2200evo
Face ID	2200evo
Image Sensor	2200evo
Dot Projectors	2200evo
2+4 microphones	2100sD
Audio Codec	2100xP, 2100sD, AMS-W/LM
Touch screen control	2100sD
Touch Transmitter	FCL
OLED PMIC	2100xP

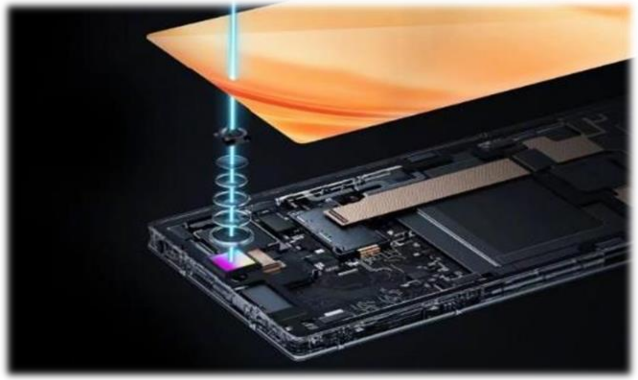
Source: Unitedlex.com and ifixit.com and System plus

What’s Next in Mobile? New Features/Functionality in High-End Smartphones and Wearables Drive Long-Term Growth

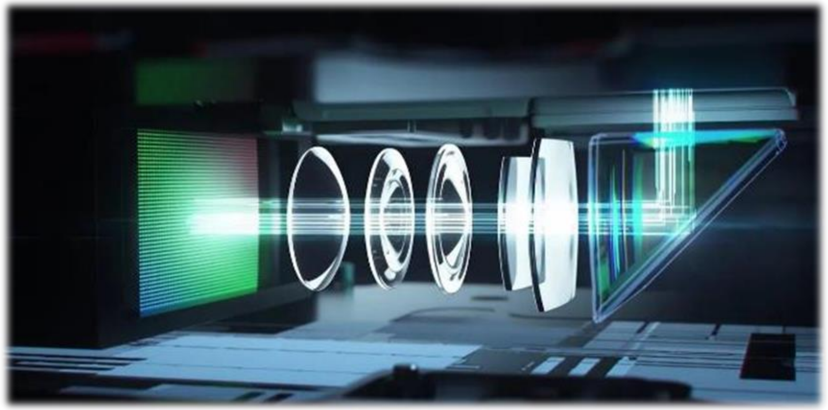
Mobile Data Traffic Growing Rapidly. Continued Deployment Of 5G And Development Of 5G Advanced Drives Need For Advanced Assembly Technologies

Advanced Camera Technology

- Periscope and under display cameras

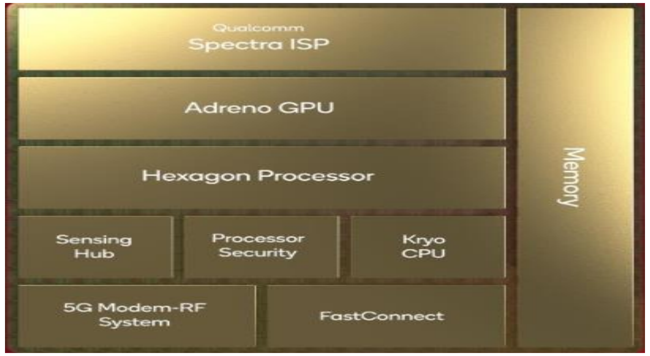


Source: ZTE



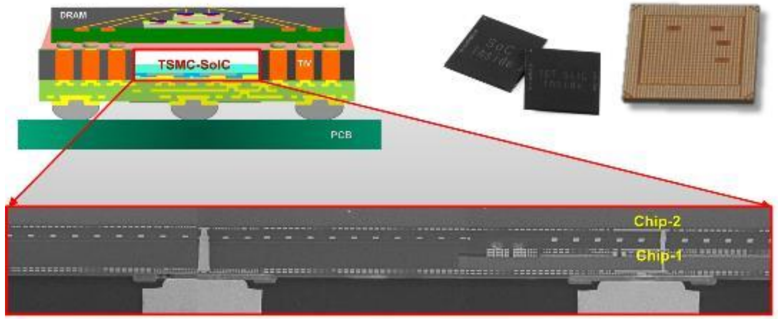
On Device AI

- AP die sizes increasing
- Increased AI capabilities in AP chip



Source: Qualcomm

- 3DIC with **hybrid bonding** for next generation APs



Source: TSMC

AR / VR Headsets

- New product introductions expected 2023 – 2024
- Requires extreme minaturization, 3DIC, TCB, advanced molding

Source: Engaget

Computing Demand Expanding Rapidly

Advanced Computing Expanding To Many Commercial Applications

AI/Vision/Recognition

Medical

Super Computers

Mobile Phones

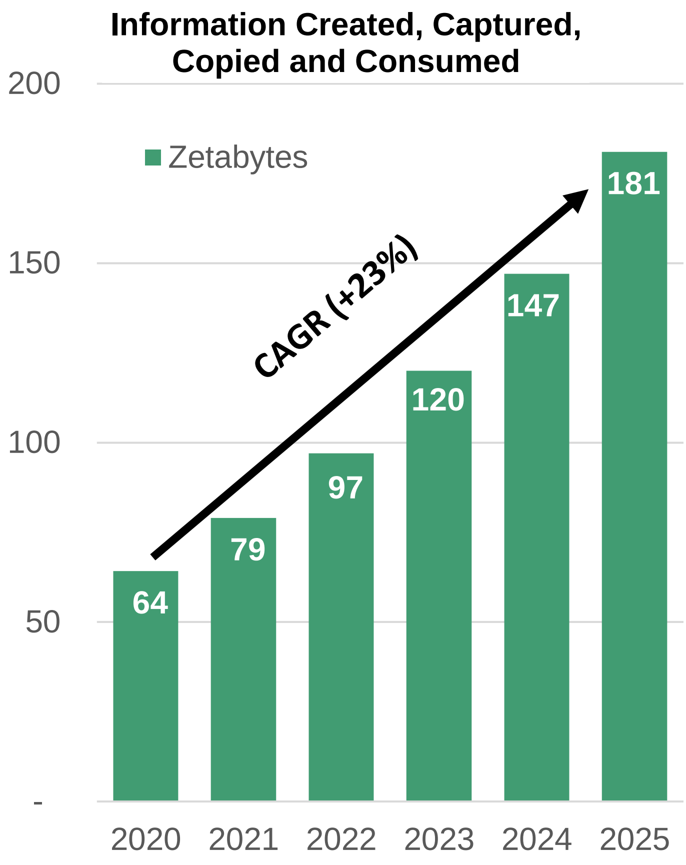
Industry 4.0

Autonomous Driving

Datacenters

Laptops/Gaming/ Engineering

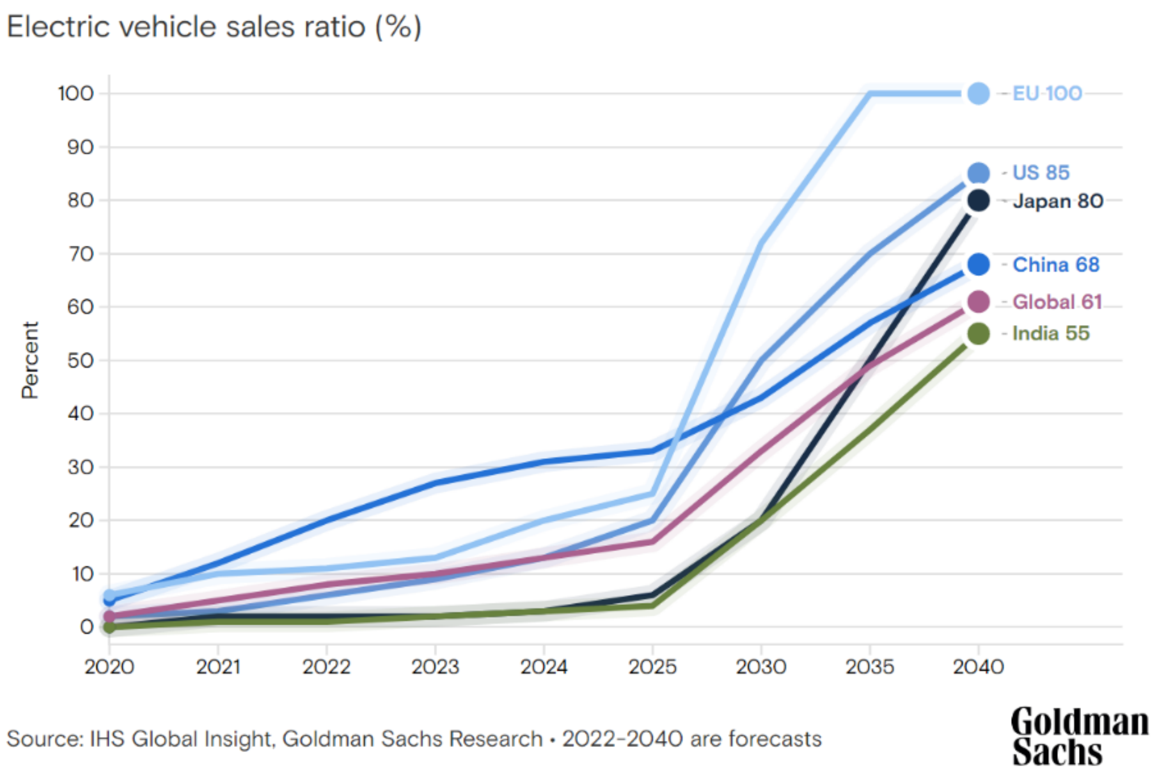
Data Volumes Growing Exponentially



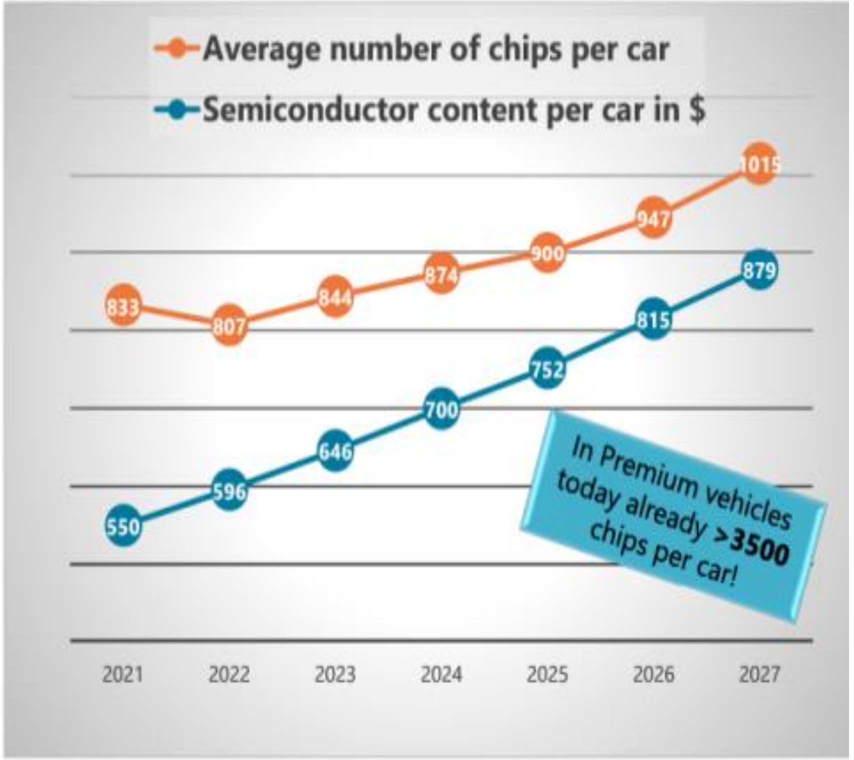
Source: Statista December 2022

Automotive: Growth of EV and Autonomous Driving Will Increase Semiconductor Content and Cost per Car

Electric Vehicle Adoption Forecast to Accelerate



Semiconductor Content per Car Increasing



Source: Power Electronics News, January 2023

~12% CAGR in automotive semi sales (2021 – 2030)*

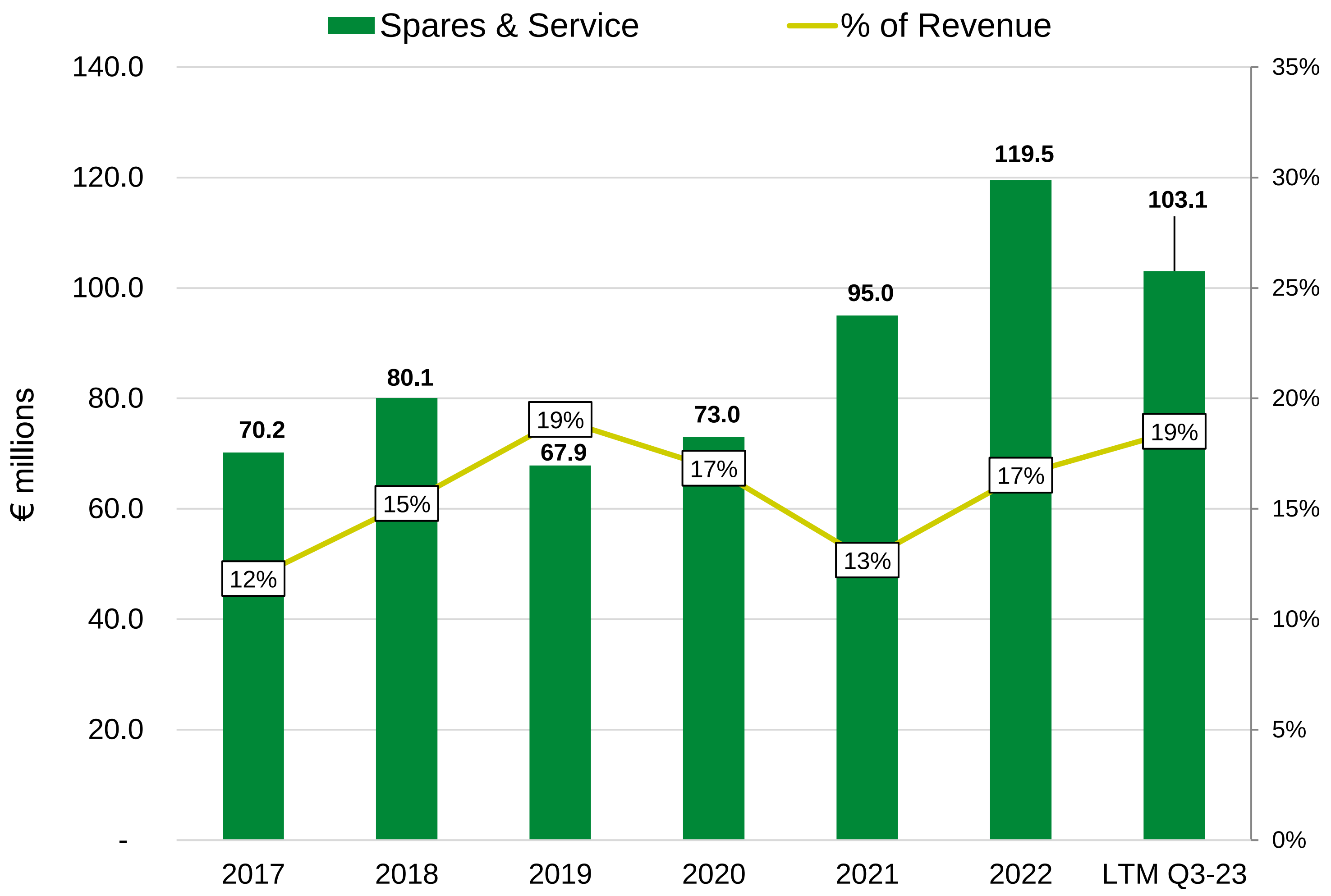
- 61% of global auto sales to be EVs by 2040
- Increased adoption of autonomous driving

* Source: Statista 2023

Positive growth trends anticipated to continue

- More sensors: cameras, radar, ultrasonic, LIDAR
- Increased use of AI, V2E connectivity

Spares/Service Activities Represent Important Area of Growth



- **Increased to 15-20% of revenue since 2017**
  - Diverse customer base
  - Less cyclical part of business
  - Highly profitable
- **Revenue will increase as installed base grows, particularly wafer level**

IV. STRATEGY

Summary Strategy

Strategy Update

Business

- Effectively navigating industry downturn at high profitability levels
  - Overhead aligned with market conditions
  - LTM revenue and operating profit up 56.5% and 115.4% versus 2019 trough
- Signs of industry improvement appearing
- Prepared for next industry upturn with wafer level assembly portfolio

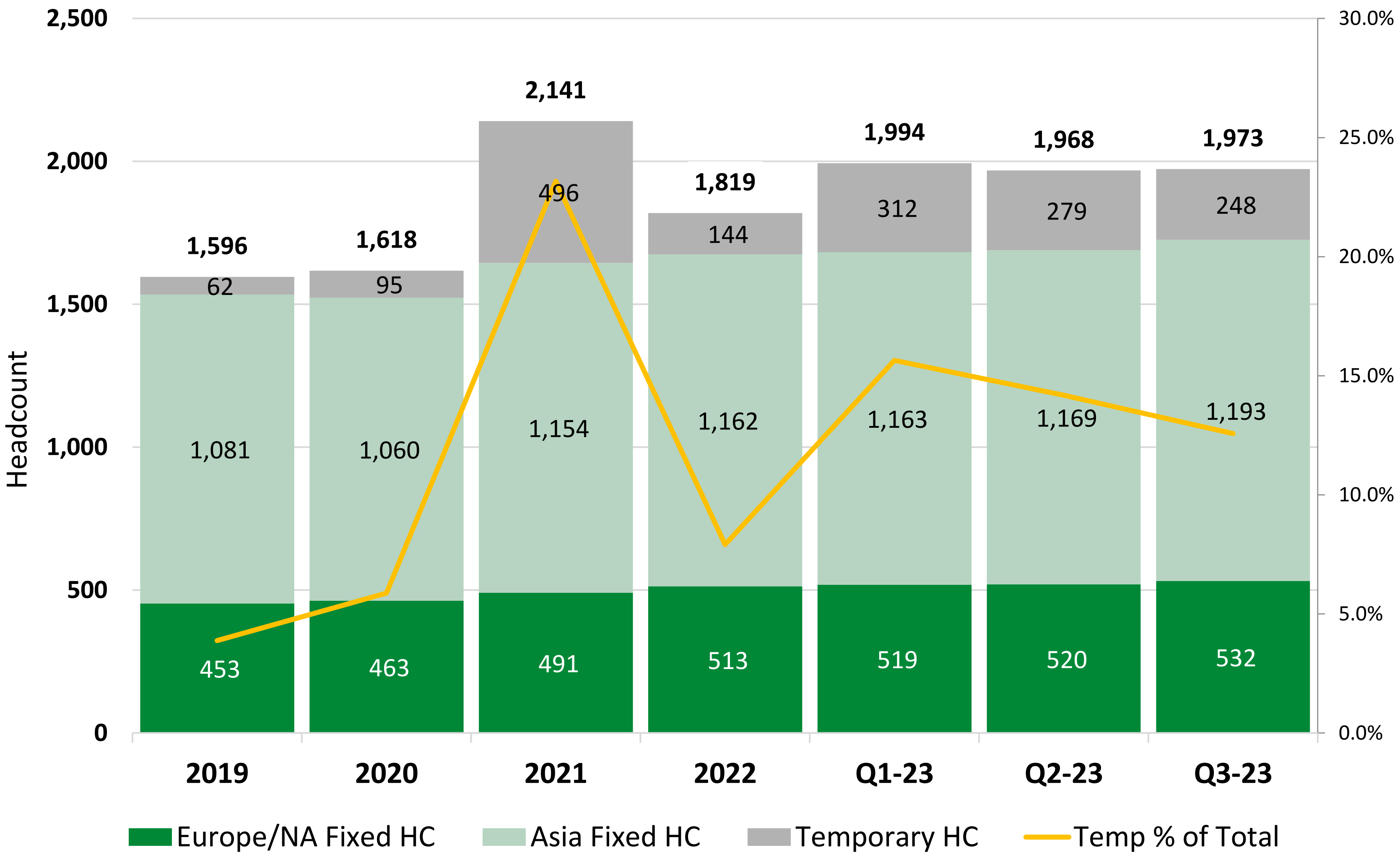
Development

- Orders for Hybrid bonding, Photonics and Chip on Wafer on Substrate applications increased significantly in Q3.
- Multiple Hybrid bonding orders from 2 customers received in Q3-23
- Further Hybrid bonding orders received post quarter end from 2 customers. Additional orders expected in Q4-23.
- Post quarter end, Die Bonding orders for Chip on Wafer on Substrate applications received from Korean subcontractor

Operations

- Singapore cleanroom completed in Q3-23
- Vietnam tooling support facility to be completed in Q4-23
- Branch office established in India to support increased mobile assembly demand
  - Initial orders received in Q3

Headcount Trends



- HC aligned with market conditions:
  - Temporary HC down 60% from Q1-22
  - Total HC down 15% from Q1-22
- Increasing European and Asian fixed HC to support wafer level assembly expansion

Significant ESG Progress. Key Targets Met or Exceeded in 2022

Process Pillar	2022 Target	2022 Progress
Environmental Impact	15% Reduction in Scope 1 & 2 emissions vs. 2019 index	64% Reduction in Scope 1 & 2 emissions intensity vs. 2021
	5% reduction in hazardous waste	Relative and absolute reduction in hazardous waste
	25% energy from renewable sources	Energy generated from renewable sources increased from 20% to 76%
	Develop targets for sustainable design	Initiative developed for 10% reduction in die attach platform energy consumption
People Wellbeing	Increase % local managers to 85%	Increased % local managers to 88%
	Increase % female managers to 20%	Achieved 20% female managers
	Increase training hours by 15%+	19% increase in training hours
Responsible Business	70% Purchasing Volume to sign CFSI	73% Purchasing Volume signed CFSI
	75% Purchasing Volume to sign GWA	77% signed GWA

Enhanced ESG Targets

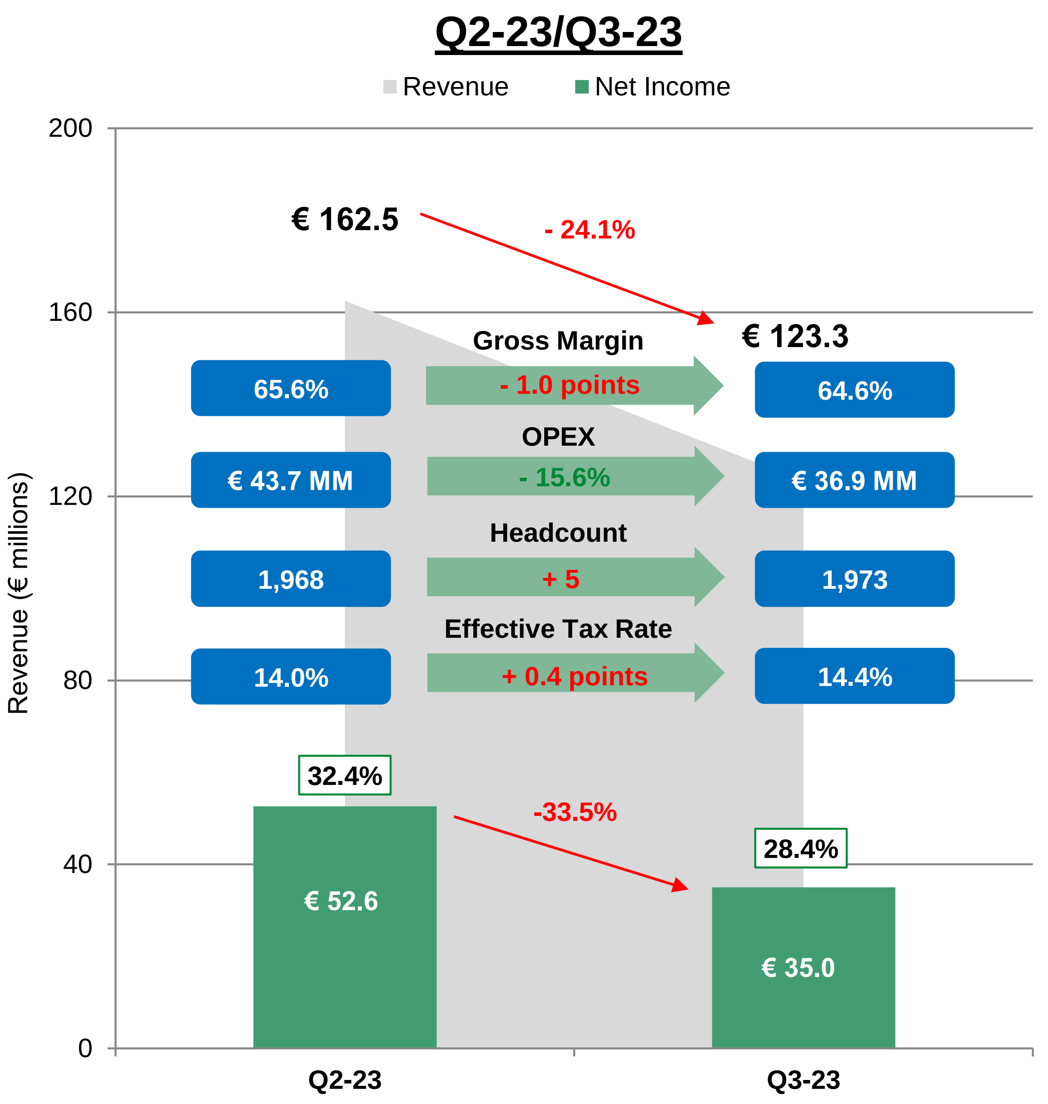
2024	2030
75% renewable sources for global energy needs	90% renewable sources for global energy needs
62% reduction in Scope 1 and 2 carbon emissions*	58% reduction in Scope 1 and 2 carbon emissions*
12% reduction in Scope 3 carbon emissions*	58% reduction in Scope 3 carbon emissions*
Above-benchmark employee engagement	Decouple carbon footprint from revenue growth
Compliance with CSRD	80% vendor compliance with Conflict Free Sourcing Initiative

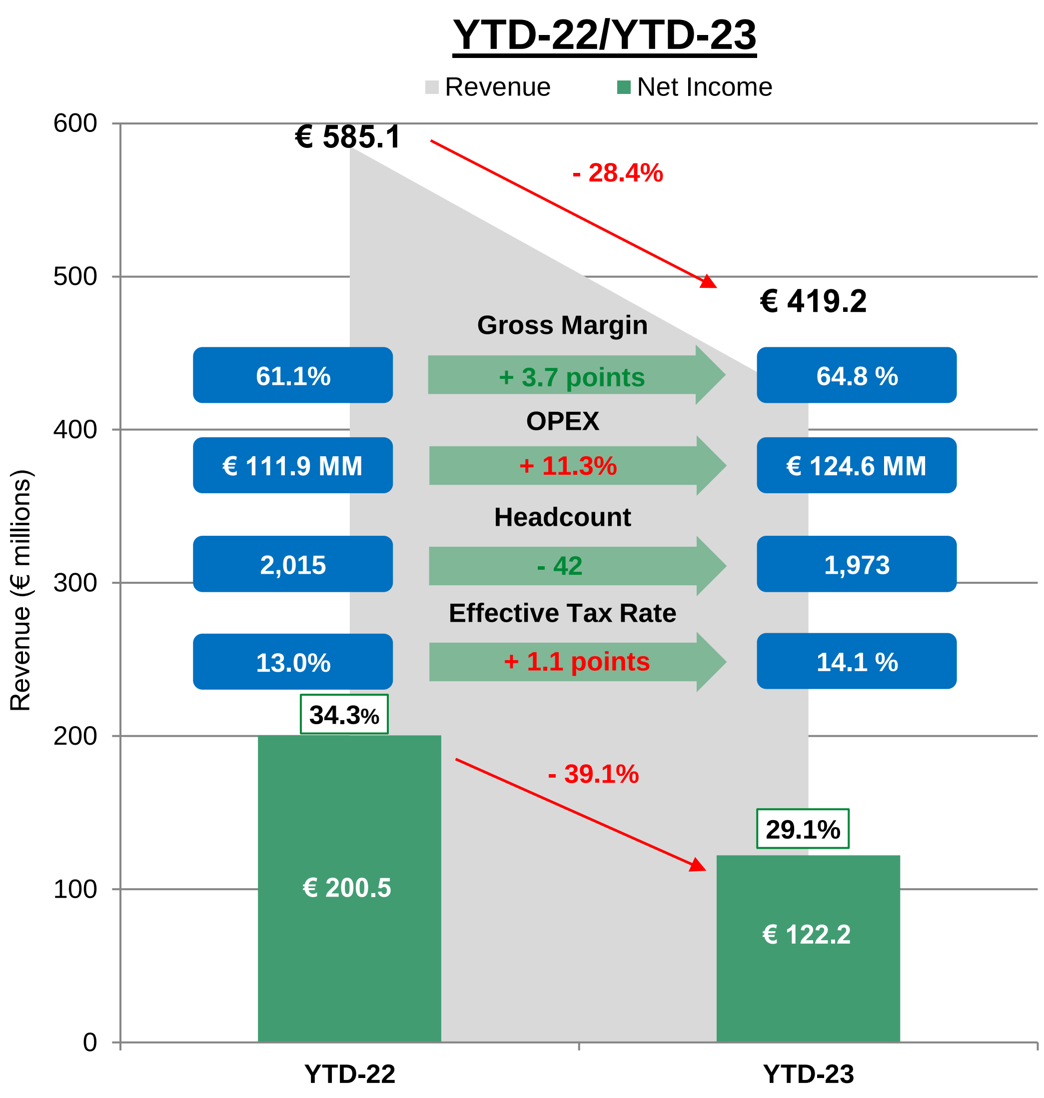
Carbon Neutral By 2050

- As per Greenhouse Gas Protocol. Targets relative to 2021 baseline data

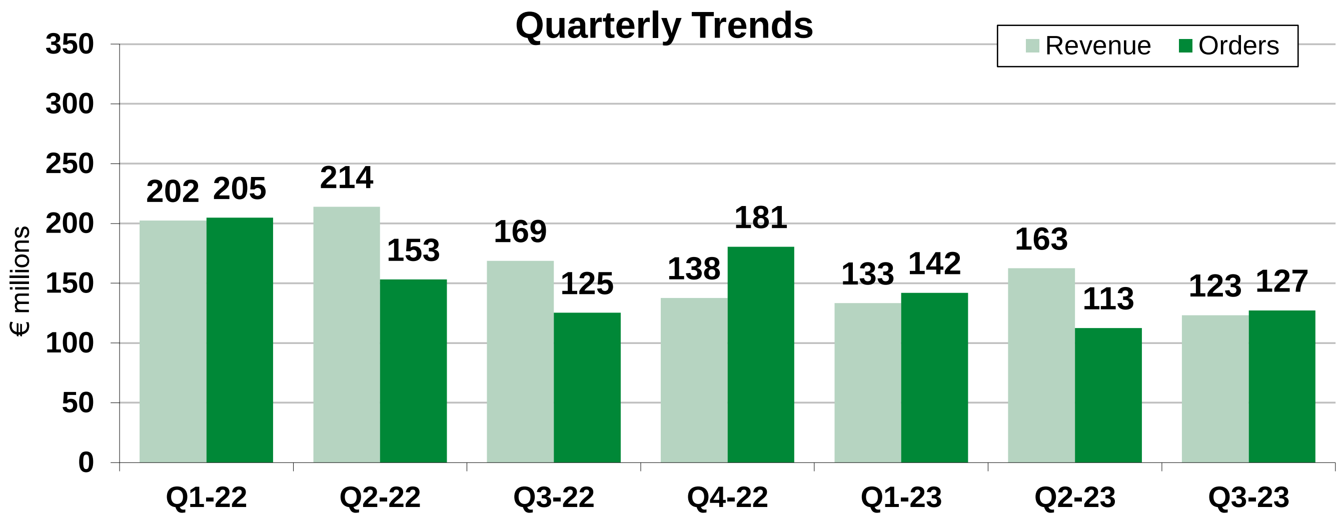
V. FINANCIAL UPDATE AND SUMMARY

YTD-23 Results Reflect Challenging Market, Particularly for Computing Applications. However, Profit Levels Remain Elevated

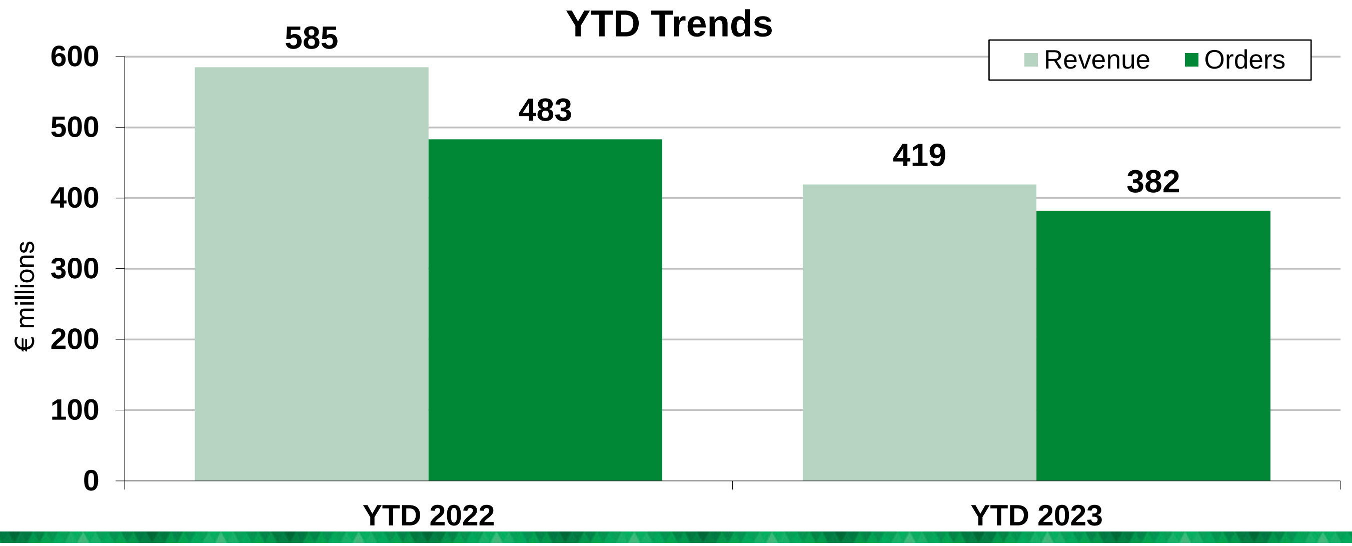




Revenue/Order Trends



Book/Bill	1.0x	0.7x	0.7x	1.3x	1.1x	0.7x	1.0x



Q3-23 vs. Q2-23

- **Revenue: -€ 39.2 million (-24.1%)**
  - Lower mobile shipments post H1 seasonal build
  - Partial offset: increased computing/automotive
- **Orders: +€ 14.7 million (+13.1%)**
  - Primarily computing and photonics applications
    - Includes increased demand for Hybrid Bonders
  - Partial offset: lower automotive/industrial demand

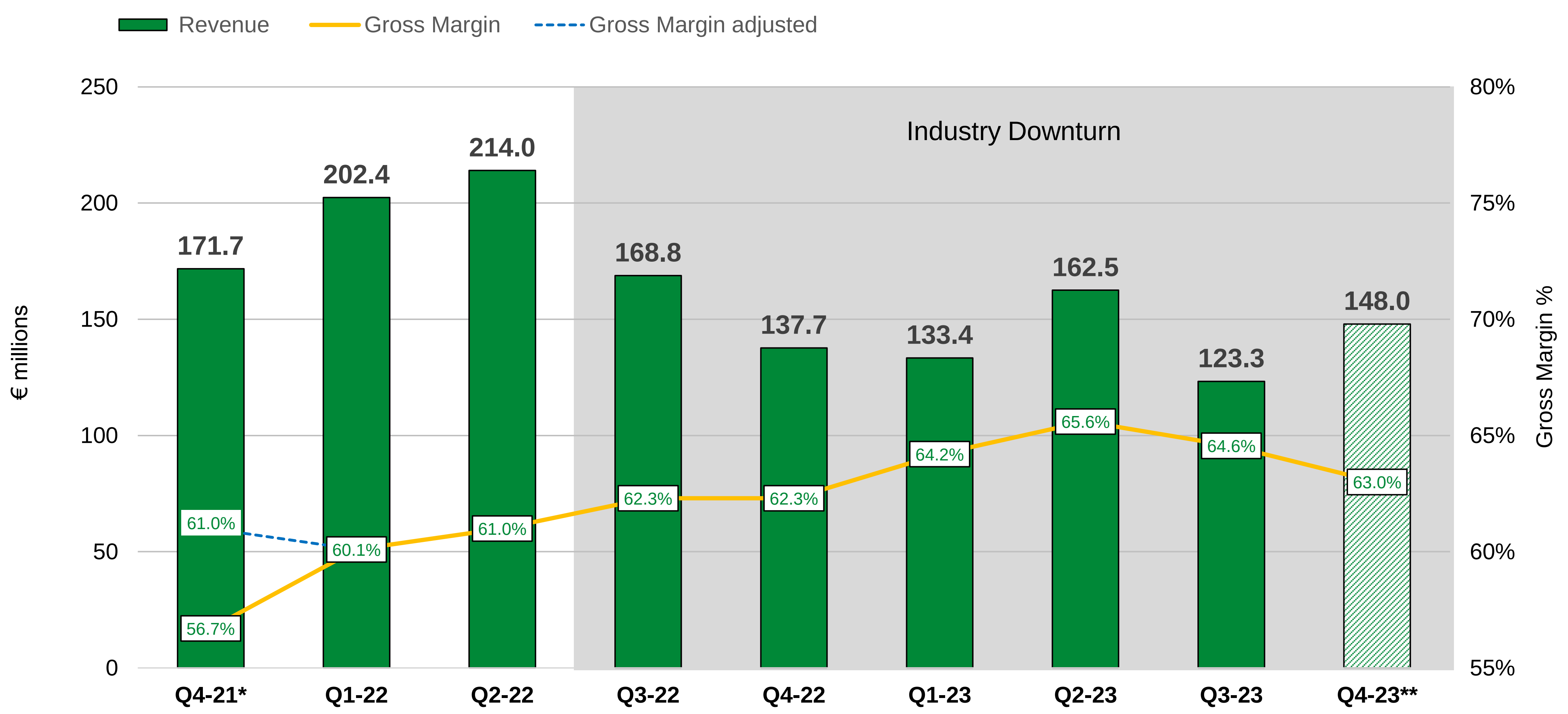
Q3-23 vs. Q3-22

- **Revenue: -€ 45.5 million (-27.0%)**
  - Significantly lower demand for computing applications
- **Orders: +€ 2.0 million (+1.6%)**

YTD-23 vs. YTD-22

- **Revenue: -€ 165.9 million (-28.4%)**
  - Broad based decline
  - Particular weakness for computing applications by IDMs and Asian subcons
- **Orders: -€ 101.3 million (-21.0%)**
  - Adverse market conditions
  - Weakness in computing and, to a lesser extent, automotive markets

Through Cycle Gross Margin Resilience



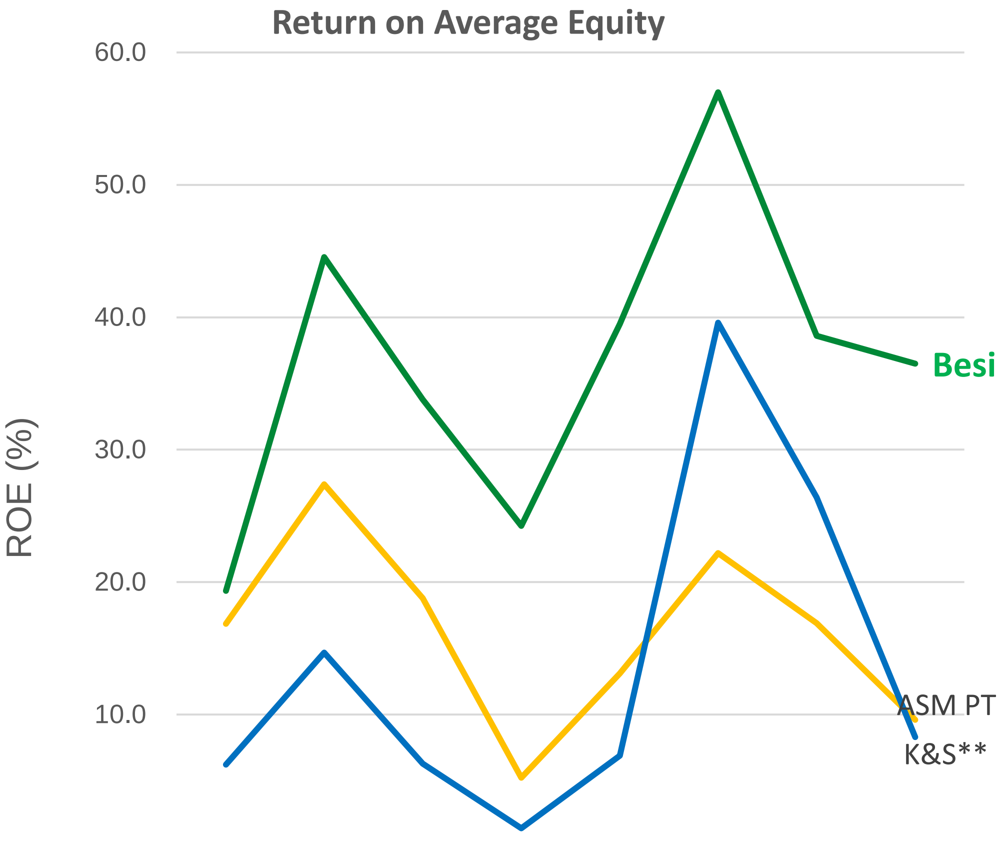
* Adjusted to exclude € 7.4 million (4.3 gross margin point) inventory charge.
** At midpoint of guidance range.

Structural, Through Cycle Outperformance vs. Peers

Gross Margin	2016	LTM-23*	Δ 2016/ LTM-23
Besi	**51.0%**	**63.6%**	**+12.6pts**
ASM PT (Back end)	43.4%	44.2%	-0.8pts
K&S	44.8%	47.9%	+3.1pts

Operating Margin	2016	LTM-23*	Δ 2016/ LTM-23
Besi	**20.0%**	**37.3%**	**+17.3pts**
ASM PT (Back end)	20.6%	6.5%	-14.1pts
K&S	8.6%	10.6%	+2.0pts

* Last twelve months ended June 30, 2023



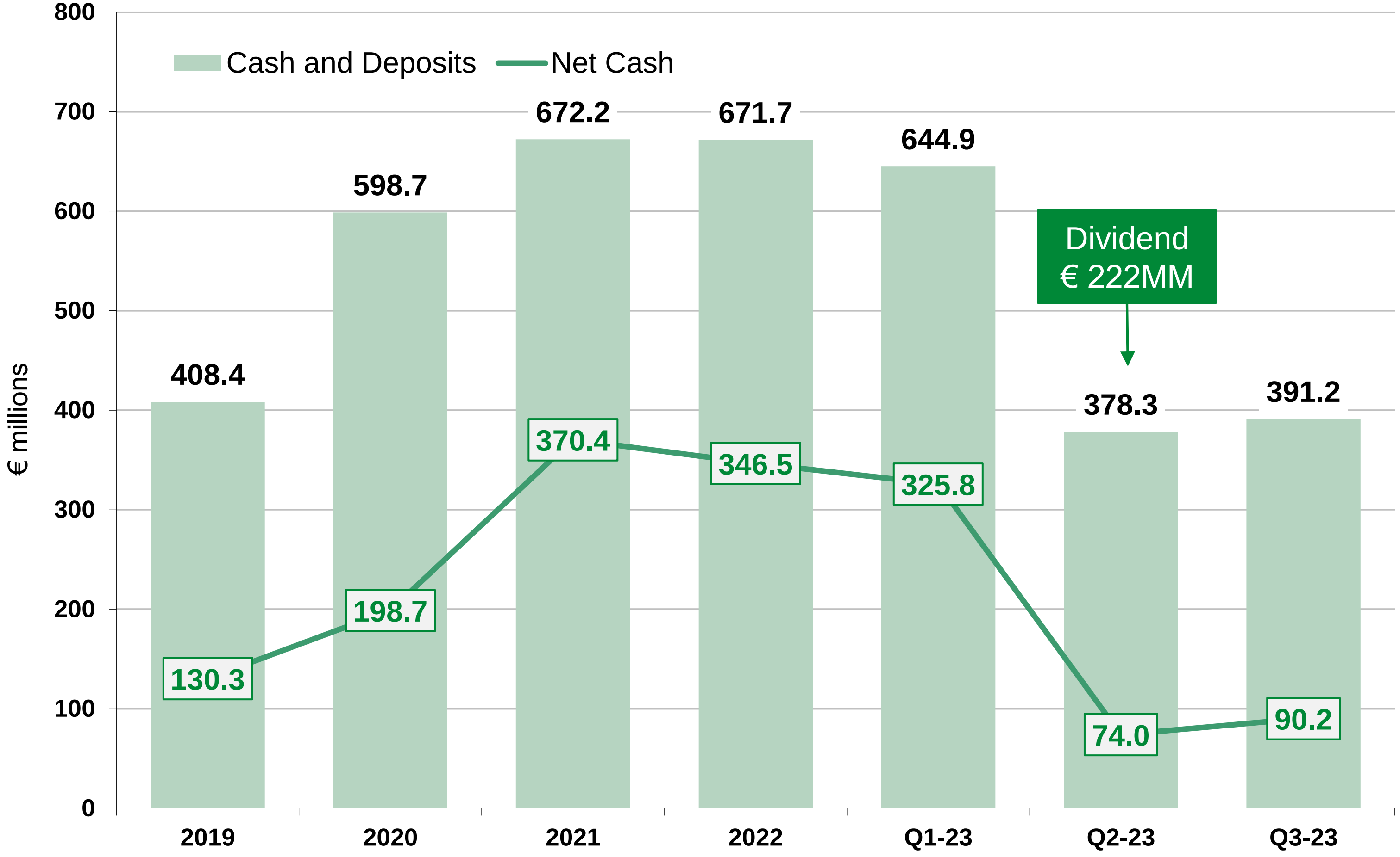
	2016	2017	2018	2019	2020	2021	2022	LTM-23
Besi	19.3	44.5	33.8	24.3	39.5	57.0	38.6	36.5
ASM PT	16.9	27.4	18.8	5.2	13.1	22.2	16.9	9.6
K&S**	6.2	14.7	6.3	1.4	6.9	39.6	26.4	8.3

** K&S ROAE on fiscal year basis except LTM-23

Besi's margins and ROE have exceeded direct peers through cycles:

- Investment in business model has yielded high returns
- Structurally higher gross and operating margins over past five years
- Besi capital allocation strategy has also helped drive ROE outperformance

Strong Liquidity Position Maintained



Q3-23 vs. Q2-23

- Cash and deposits of € 391.2 million
  - +€ 12.9 million, or 3.4% vs. Q2-23 due to:
    - + € 65.1 million cash flow from operations
    - - € 45.5 million capital allocation
    - - € 4.7 million capitalized R&D
    - - € 2.0 million capex
- Net cash increases to € 90.2 million
  - Equals 16% of LTM revenue

Q3-23 vs. Q3-22

- Cash and deposits down € 270.6 million due to capital allocation of € 477 million

Convertible Notes

- € 330.2 million outstanding at September 30, 2023
  - € 4.9 million converted in Q3-23
  - 2023/2024 Notes reduced to € 5.2 million

Guidance Q4 and FY 2023

€ in millions	Q3-23	Q4-23	FY 2023E*	vs. FY 2022
Revenue	€ 123.3	+25% - +15%	€ 567.2	-22%
Gross Margin	64.6%	62% - 64%	64.4%	+3.1 pts
Operating Expenses	€ 36.9	+~5%	€ 163.4	+10%

* Assumes midpoint of guidance for Q4-23

Investment Considerations

Assembly market ever more critical in semiconductor value chain

Disciplined strategic focus has created an industry leader

Long term secular trends drive advanced packaging growth

Wafer level assembly new growth opportunity

Market presence has grown via key IDMs, supply chains and partners

Tech leadership and scalability result in superior financial returns

Commitment to sustainable growth and fighting climate change

Attractive capital allocation policy