

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549**

FORM 10-K

**ANNUAL REPORT
PURSUANT TO SECTIONS 13 OR 15(d)
OF THE SECURITIES EXCHANGE ACT OF 1934**

(MARK ONE)

ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934
For the fiscal year ended December 31, 2024
OR

TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934
Commission file number 001-06462

TERADYNE, INC.

(Exact Name of Registrant as Specified in Its Charter)

MASSACHUSETTS
(State or Other Jurisdiction of
Incorporation or Organization)

600 RIVERPARK DRIVE
NORTH READING, MASSACHUSETTS
(Address of Principal Executive Offices)

04-2272148
(I.R.S. Employer
Identification Number)

01864
(Zip Code)

Registrant's telephone number, including area code: (978) 370-2700
Securities registered pursuant to Section 12(b) of the Act:

Title of each class	Trading Symbol(s)	Name of each exchange on which registered
Common Stock, par value \$0.125 per share	TER	Nasdaq Stock Market LLC

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes No

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Exchange Act. Yes No

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes No

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File to be submitted pursuant to Rule 405 of Regulation S-T (232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes No

If securities are registered pursuant to Section 12(b) of the Act, indicate by check mark whether the financial statements of the registrant included in the filing reflect the correction of an error to previously issued financial statements.

Indicate by check mark whether any of those error corrections are restatements that required a recovery analysis of incentive-based compensation received by any of the registrant's executive officers during the relevant recovery period pursuant to § 240.10D-1(b).

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, or a smaller reporting company. See the definitions of "large accelerated filer," "accelerated filer" and "smaller reporting company" and "emerging growth company" in Rule 12b-2 of the Exchange Act (check one):

Large accelerated filer	<input checked="" type="checkbox"/>	Accelerated filer	<input type="checkbox"/>
Non-accelerated filer	<input type="checkbox"/>	Smaller reporting company	<input type="checkbox"/>
		Emerging growth company	<input type="checkbox"/>

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act.

Indicate by check mark whether the registrant has filed a report on and attestation to its management's assessment of the effectiveness of its internal control over financial reporting under Section 404(b) of the Sarbanes-Oxley Act (15 U.S.C. 7262(b)) by the registered public accounting firm that prepared or issued its audit report. Yes No

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). Yes No

The aggregate market value of the voting stock held by non-affiliates of the registrant as of June 30, 2024, was approximately \$24.0 billion based upon the closing price of the registrant's Common Stock on the Nasdaq Stock Market on that date.

The number of shares outstanding of the registrant's only class of Common Stock as of February 14, 2025, was 161,718,766 shares.

DOCUMENTS INCORPORATED BY REFERENCE

Portions of the registrant's proxy statement in connection with its 2024 annual meeting of shareholders are incorporated by reference into Part III of this Form 10-K.

TERADYNE, INC.

INDEX

Page No.

PART I.

Item 1.	Business	2
Item 1A.	Risk Factors	9
Item 1B.	Unresolved Staff Comments	20
Item 1C.	Cybersecurity	21
Item 2.	Properties	22
Item 3.	Legal Proceedings	22
Item 4.	Mine Safety Disclosure	22

PART II.

Item 5.	Market for Registrant’s Common Equity, Related Shareholder Matters and Issuer Purchases of Equity Securities	23
Item 6.	(Reserved)	23
Item 7.	Management’s Discussion and Analysis of Financial Condition and Results of Operation	24
Item 7A.	Quantitative and Qualitative Disclosures about Market Risk	35
Item 8.	Financial Statements and Supplementary Data	36
Item 9.	Changes in and Disagreements with Accountants on Accounting and Financial Disclosure	85
Item 9A.	Controls and Procedures	85
Item 9B.	Other Information	85
Item 9C.	Disclosure Regarding Foreign Jurisdictions that Prevent Inspections	85

PART III.

Item 10.	Directors, Executive Officers and Corporate Governance	86
Item 11.	Executive Compensation	86
Item 12.	Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters	86
Item 13.	Certain Relationships and Related Transactions, and Director Independence	86
Item 14.	Principal Accountant Fees and Services	86

PART IV.

Item 15.	Exhibits and Financial Statement Schedule	87
Item 16.	Form 10-K Summary	88
	Signatures	93

TERADYNE, INC.

FORM 10-K

SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This Annual Report on Form 10-K contains “forward-looking statements” regarding Teradyne's future business prospects, financial performance or position and results of operations. When used herein, the words such as “anticipate,” “expect,” “plan,” “could,” “may,” “will,” “believe,” “estimate,” “goal,” or other comparable terms are intended to identify forward-looking statements although not all forward-looking statements contain these identifying words. Forward-looking statements involve risks and uncertainties, including, but not limited to, those discussed in the section entitled “Risk Factors” of this Annual Report on Form 10-K and elsewhere, and in our other filings with the Securities and Exchange Commission (“SEC”). Readers are cautioned not to place undue reliance on these forward-looking statements which reflect management’s analysis only as of the date hereof and are subject to risks and uncertainties that could cause actual results to differ materially from those stated or implied. Teradyne assumes no obligation to update these forward-looking statements for any reason, except as may be required by law.

PART I

Item 1: *Business*

Teradyne, Inc. (“Teradyne”) was founded in 1960 and is a leading global supplier of automated test equipment and robotics solutions.

We design, develop, manufacture and sell automated test systems and robotics products. Our automated test systems are used to test semiconductors, wireless products, data storage and complex electronics systems in many industries including consumer electronics, wireless, automotive, industrial, computing, communications, and aerospace and defense industries. Our robotics products include collaborative robotic arms and autonomous mobile robots (“AMRs”) used by global manufacturing, logistics and industrial customers to improve quality, increase manufacturing and material handling efficiency and decrease manufacturing and logistics costs. Our automated test equipment and robotics products and services include:

- semiconductor test (“Semiconductor Test”) systems;
- robotics (“Robotics”) products; and
- defense/aerospace (“Defense/Aerospace”) test instrumentation and systems, circuit-board test and inspection (“Production Board Test”) systems, and wireless test systems (referred collectively as “All Other”).

The market for our test products is concentrated with a limited number of significant customers accounting for a substantial portion of the purchases of test equipment. A few customers drive significant demand for our products both through direct sales and sales to the customer’s supply partners. We expect that sales of our test products will continue to be concentrated with a limited number of significant customers for the foreseeable future.

In 2024, we saw strength in our Semiconductor Test business, with memory and compute offerings growing considerably compared to 2023. We expect mobile, automotive, and industrial will grow in 2025 and that recent advancements in AI inference may help mid-term recovery in these markets. Beyond AI compute, we are investing in other areas of the semiconductor test market that offer the opportunity for accelerating long-term growth, including power semi-conductors and the shift towards vertically integrated products (“VIPs”). We have seen the benefits start to materialize in 2024 and expect them to continue through the mid-term.

2024 was a very weak industrial automation market resulting in a year-over-year decline in Robotics revenues while outperforming our peer group. In 2024, we built key OEM, systems integrators and large account strategic partnerships which will strengthen our go to market for years to come. Introduction of new products, including the MiR 1200 Pallet Jack, will further expand our available markets to support our growth.

On May 27, 2024, we paid 483.1 million Euros, equivalent to \$524.1 million, to purchase a combination of previously issued and outstanding shares and shares newly issued by Technoprobe, S.p.A. (“Technoprobe”). The shares purchased represent 10% of the issued and outstanding shares of Technoprobe. We also received a board seat as part of the purchase. Additionally, as part of the transaction, we completed the sale of the Device Interface Solutions (“DIS”) business, a component of our Semiconductor Test segment, to Technoprobe for \$85.0 million in cash, net of cash and cash equivalents sold, and a customary working capital adjustment. The sale resulted in a pre-tax gain of \$57.1 million recorded as ‘Gain on sale of business’ in the consolidated statement of operations.

Our financial statements are denominated in U.S. dollars. While revenues in our test businesses are predominantly in U.S. dollars, the majority of our Robotics revenue is denominated in foreign currencies. Strengthening of the U.S. dollar would negatively affect Robotics revenue growth in 2025.

Our corporate strategy for our test businesses is to profitably grow market share while in Robotics, we plan to profitably grow revenue through the introduction of differentiated products targeting expanding markets. Our capital allocation plan will continue to be balanced between investing in organic and inorganic growth and returning cash to shareholders through share repurchases and dividends.

Investor Information

We are a Massachusetts corporation incorporated on September 23, 1960. We are subject to the informational requirements of the Securities Exchange Act of 1934 (“Exchange Act”). We file periodic reports, proxy statements and other information with the SEC. The SEC maintains an internet site (<http://www.sec.gov>) that contains reports, proxy and information statements and other information regarding issuers that file documents electronically.

You can access financial and other information, including the charters of our Audit Committee, Compensation Committee and Nominating and Corporate Governance Committee, our Corporate Governance Guidelines and Code of Conduct, by clicking the Investors link on our web site at www.teradyne.com. We make available, free of charge, copies of our filings with the SEC, including our annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K and amendments to those reports filed or furnished pursuant to Section 13(a) or 15(d) of the Exchange Act through our web site as soon as reasonably practicable after filing such material electronically or otherwise furnishing it to the SEC.

Products

Semiconductor Test

We design, manufacture, sell and support Semiconductor Test products and services and hard disk drives on a worldwide basis. The test systems we provide are used for wafer level, device package testing, and system level testing of semiconductor devices. These devices are used in automotive, industrial, communications, consumer, smartphones, cloud, computer and electronic game applications, among others. Semiconductor devices span a broad range of functionality, from very simple low-cost devices such as appliance microcontrollers, operational amplifiers or voltage regulators to complex digital signal processors, Artificial Intelligence/Machine Learning (“AI/ML”) training, high performance computing and microprocessors as well as memory devices. Semiconductor Test products and services are sold to integrated device manufacturers (“IDMs”) that integrate the fabrication of silicon wafers into their business, “Fabless” companies that outsource the manufacturing of silicon wafers, “Foundries” that cater to the processing and manufacturing of silicon wafers, and semiconductor assembly and test providers (“OSATs”) that provide test and assembly services for the final packaged devices to both Fabless companies and IDMs. Fabless companies perform the design of integrated circuits and use Foundries for wafer manufacturing and OSATs for test and assembly. Our customers obtain the overall benefit of comprehensively testing devices and reducing the total costs associated with testing by using our Semiconductor Test systems to:

- improve and control product quality;
- measure and improve product performance;
- reduce time to market; and
- increase production yields.

Our FLEX Test Platform architecture advances our core technologies to produce test equipment that is designed for high efficiency multi-site testing. Multi-site testing involves the simultaneous testing of many devices in parallel. Leading semiconductor manufacturers are using multi-site testing to significantly improve their “Cost of Test” economics. The FLEX Test Platform architecture addresses customer requirements through the following key capabilities:

- A high efficiency multi-site architecture that reduces tester overhead such as instrument setup, synchronization and data movement, and signal processing;
- The IG-XL™ software operating system which provides fast program development, including instant conversion from single to multi-site test; and
- Broad technology coverage by instruments designed to cover the range of test parameters, coupled with a universal slot test head design that allows easy test system reconfiguration to address changing test needs.

FLEX Test Platform purchases are made by IDMs, OSATs, Foundries and Fabless customers. The FLEX Test Platform has become a widely used test solution at OSATs by providing versatile testers that can handle the widest range of devices, allowing OSATs to leverage their capital investments. The broad consumer, automotive and broadband markets have historically driven most of the device volume growth in the semiconductor industry. These markets include mobile phones and tablets, PCs, servers, networking and automotive electronics. These end use markets continue to be drivers for the FLEX Test Platform family of products because they require a wide range of technologies and instrument coverage. In 2019, we introduced our next generation UltraFLEX™ tester, the newest member of the UltraFLEX family, which uses the new PACE™ architecture to deliver superior economics and fast time to market for complex digital devices.

Our J750™ test system shares the IG-XL software environment with the family of FLEX Test Platform systems. The J750 is designed to handle high volume semiconductor devices, such as microcontrollers, that are central to the functionality of almost every consumer electronics product, from small appliances to automobiles. J750 test systems combine compact packaging, high throughput and ease of production test. We extended the J750 platform technology to create the IP750 Image Sensor™ test system. The IP750 is focused on testing image sensor devices used in smartphones, automobiles and other imaging products. We have continued to invest in

the J750 platform with new instrument releases that bring new capabilities to existing market segments and expand the J750 platform to new devices that include high end microcontrollers and the latest generation of image sensors.

Our Magnum platform addresses the requirements of mass production test of memory devices for flash and DRAM memory. Flash and DRAM memory are widely used core building blocks in modern electronic products finding wide application in consumer, industrial, and computing equipment. Our Magnum 7 solution is designed for parallel memory test in the flash, DRAM and multi-chip package markets while our Magnum platform called Magnum EPIC giving us full product coverage of the memory test market.

Our ETS platform is used by semiconductor manufacturers and assembly and test subcontractors, primarily in the analog/mixed signal markets that cover cost sensitive applications. Our proprietary SmartPin™ technology enables high efficiency multi-site testing on an individual test system permitting greater test throughput. Semiconductors tested by ETS platform systems are incorporated into a wide range of products in historically high-growth markets including mobile devices, automotive electronics, computer peripherals, and notebook and desktop computers. The Eagle platform includes the ETS-88 which is a high performance multi-site production test system designed to test a wide variety of high volume power and precision devices including Silicon Carbide ("SiC") and Gallium Nitride ("GaN") power devices used in vehicle electrification. The ETS-800, a high performance multi-site production test system, is used to test high complexity power devices in automotive, industrial and consumer applications.

The Integrated System Test group is comprised of our system level test ("SLT") testers and our hard disk drive ("HDD") testers. Our SLT testers for the semiconductor production market are used to test devices following wafer and package test. SLT testers address customer requirements related to factory density, throughput and thermal performance. HDD products address the high throughput and automated manufacturing test requirements of hard disk drive and semiconductor manufacturers. Our HDD products address the client and enterprise storage markets. The client market is driven by the needs of desktop, laptop, and external HDD storage products. The enterprise market is driven by the needs of data centers and cloud storage.

Robotics

Our Robotics segment is comprised of two business units: Universal Robots and Mobile Industrial Robots.

Universal Robots

Universal Robots is a leading provider of collaborative robots ("cobots") used across various industries, including automotive, food & beverage, metal & machining, electronics, pharmaceutical, and in education. Founded in 2005 and headquartered in Odense, Denmark, Universal Robots aims to create a world where people work with robots, not like robots. Its mission is simple: *"Automation for anyone. Anywhere."*

Since introducing the world's first commercially viable cobot in 2008, Universal Robots has sold over 75,000 cobots worldwide and has developed a product portfolio reflecting a range of reaches and payloads, including the UR3e, UR5e, UR10e, UR16e, UR20 and UR30 robots. All models are robust, built to withstand a wide range of industrial environments, and can be easily integrated into existing production setups, providing a number of game-changing benefits:

- **Straightforward programming** – UR's intuitive software, PolyScope, enables users to program a cobot easily and have an application up and running within a few hours.
- **High return on investment** – cobots require a lower initial investment than traditional robotics and have an average payback time of 12-18 months.
- **Versatile deployment** – cobots' high degree of flexibility allows customers to change the task and pace of the cobot according to production demands.
- **Collaborative-capable safety functions** – following a risk assessment, most cobots can seamlessly operate alongside employees, assisting with dull, dirty, and dangerous tasks.
- **Cutting-edge precision engineering** – UR's global team of talented engineers creatively tackles customer challenges, ensuring our cobots are rigorously tested and built for demanding industrial tasks.

An extensive ecosystem has grown around the company's cobot, technology creating innovation and choice for customers and a wide range of components, kits and solutions to suit every application. UR also provides an all-encompassing customer experience including UR Academy - an award-winning training program, available both online and in person in more than 120 training centers worldwide, and three tiers of service offerings carefully designed to accelerate customer success.

Universal Robots has recently established global Centers of Excellence for Welding, Palletizing, and Machine Tending applications. These centers, led by subject matter experts, serve as knowledge hubs, offering expert recommendations and guidance on the latest trends in the field to UR partners and key customers worldwide.

Mobile Industrial Robots

MiR is a leading provider of autonomous mobile robots ("AMRs") for the manufacturing and logistics segments. MiR AMRs enhance productivity, offering a high return on investment by streamlining workforce efficiency, reducing lead times, and improving workplace safety. These AMRs operate autonomously, eliminating the need for traditional guidance infrastructure. MiR currently offers three deckload AMR models, each supporting a different payload capacity—MiR250, MiR600, and MiR1350—as well as a pallet jack AMR—MiR1200 Pallet Jack—all managed by our unified fleet management software, MiR Fleet.

All models can be easily integrated into existing production environments. MiR's products are differentiated by their:

- **Ease of Use and Speed of Deployment:** Our robots are designed for quick deployment and flexibility, allowing customers to adapt tasks based on changing demands.
- **Safe Operations:** Equipped with 360 safety coverage, our robots navigate around static and dynamic obstacles, ensuring safety in busy environments.
- **Reliable Autonomous Navigation:** MiR robots demonstrate consistent, reliable navigation across large manufacturing and warehouse areas.
- **Short Payback Period:** With an average payback period of 12–24 months, MiR's products provide a swift return on investment.

System Test

Our System Test operating segment is comprised of two business units: Defense/Aerospace and Production Board Test.

Defense/Aerospace

We are a leading provider of high performance test systems, subsystems, instruments and service for the defense and aerospace markets. Our test products are used to ensure the readiness of military and commercial aerospace electronics systems. New programs, such as tactical aircraft and missile systems, as well as upgrade programs, continue to fuel the demand for high performance test systems in this market. Our test products are well-suited to the demands of defense/aerospace electronics manufacturers and repair depots worldwide. Our leadership in this market is underscored by our success with major Department of Defense programs across all U.S. military service branches and many allied defense services worldwide.

Production Board Test

Our test systems are used by electronics manufacturers and OEMs worldwide to perform In-Circuit-Test ("ICT") and device programming of printed circuit board assemblies. Fast, accurate and cost-effective test capabilities are hallmark features of our Test Station product families. We offer the Test Station in off-line and automated in-line configurations. The automated in-line configurations address the growing requirements for automating production lines for high volume applications, such as automotive electronics, computing, and communications.

Wireless Test

Our Wireless Test operating segment is a business unit run under the LitePoint brand name providing wireless test solutions for silicon validation, wireless module manufacturing, and wireless end device manufacturing. LitePoint wireless test systems span design verification to high volume manufacturing and are deployed across the entire production chain from wireless chipset suppliers to consumer brands.

Sales and Distribution

In each of the years, 2024, 2023 and 2022, our five largest direct customers in aggregate accounted for 36%, 32% and 26% of our consolidated revenues, respectively.

[Table of Contents](#)

OSAT customers often purchase our test systems based upon recommendations from OEMs, IDMs and Fabless companies. In all cases when an OSAT customer purchases a test system from us, we consider the OSAT as the customer since credit risk, title and risk of loss, among other things, are between Teradyne and the OSAT. In 2024, we estimate consolidated revenues driven by Samsung, a customer of our Semiconductor Test and Wireless Test segments, combining direct and indirect sales, accounted for approximately 12.5% of our consolidated revenues. In 2023, revenues driven by Texas Instruments Inc., a customer of our Semiconductor Test segment, accounted for 10% of our consolidated revenues. In 2022, we estimate consolidated revenues driven by Qualcomm, a customer of our Semiconductor Test, System Test, and Wireless Test operating segments, combining direct and indirect sales, accounted for approximately 11% of our consolidated revenues. The loss of, or significant decrease in demand from key OEM customers or any of our five largest direct customers, could have a material adverse effect on our business, results of operations and financial condition.

We have sales and service offices located throughout North America, Central America, Asia and Europe. We sell in these areas predominantly through a direct sales force, except for Robotics products, which are sold principally through distributors and OEMs. Our manufacturing activities for our test businesses are primarily conducted through subcontractors and outsourced contract manufacturers with significant operations in Malaysia. The manufacturing activities for our Robotics businesses are done primarily in our production facilities in Denmark and the U.S.

Sales to customers outside the United States were 87%, 84%, and 85%, respectively, of our consolidated revenues in 2024, 2023 and 2022. Sales are attributed to geographic areas based on the location of the customer site.

See also “Item 1A: Risk Factors” and Note U: “Operating Segment, Geographic and Significant Customer Information” in Notes to Consolidated Financial Statements.

Competition

We face significant competition throughout the world in each of our reportable segments. Competitors in the Semiconductor Test segment include, among others, Advantest Corporation, SPEA S.p.A., and Cohu, Inc.

Competitors in our Robotics segment include manufacturers of traditional industrial robots such as KUKA Robotics Corporation, ABB, FANUC, Staubli and Yaskawa Electric Corporation, companies with emerging collaborative robot offerings such as Techman, Doosan, Jaka, and AUBO Robotics, and manufacturers of autonomous mobile robots in the material handling space such as Omron, Rockwell Automation, Junion, HikRobot, Agilox, and KION.

Competitors in the System Test operating segment include, among others, Advantest Corporation and Test Research, Inc.

Competitors in our Wireless Test operating segment include, among others, Rohde & Schwarz GmbH & Co. KG, Anritsu Company, National Instruments Corporation, Weltek and iTest.

Some of our competitors may have greater financial and other resources to pursue engineering, manufacturing, marketing, and distribution of their products. We also face competition from emerging Asian companies and from internal supply at several of our customers. Some of our competitors have introduced or announced new products with certain performance characteristics which may be considered equal or superior to those we currently offer. We expect our competitors to continue to improve the performance of their current products and to introduce new products or new technologies that provide improved cost of ownership and performance characteristics. See also “Item 1A: Risk Factors.”

Backlog

At December 31, 2024 and 2023, our backlog of unfilled orders in our reportable segments was as follows:

	2024	2023
	(in millions)	
Semiconductor Test	\$ 921.9	\$ 893.4
Robotics	36.6	42.3
All Other	203.7	188.9
	<u>\$ 1,162.2</u>	<u>\$ 1,124.6</u>

Customers may delay delivery of products or cancel orders without advanced notice, subject to possible cancellation penalties. Due to possible customer changes in delivery schedules and cancellation of orders, our backlog at any particular date is not necessarily

indicative of the actual sales for any succeeding period. Delays in delivery schedules or cancellations of backlog during any particular period could have a material adverse effect on our business, financial condition or results of operations.

Raw Materials

Our products contain electronic and mechanical components that are provided by a wide range of suppliers. Some of these components are standard products, while others are manufactured to our specifications. We have experienced delays in obtaining timely delivery of certain components. These delays have impacted and may continue to impact the manufacturing of certain products and the timing of delivery of those products to our customers. While the majority of our components are available from multiple suppliers, certain items are obtained from sole sources. We may experience a temporary adverse impact if any of our sole source suppliers delay or cease to deliver products.

Intellectual Property and Licenses

The development of our products, both hardware and software, is based in significant part on proprietary information, our brands and technology. We protect our rights in proprietary information, brands and technology through various methods, such as:

- patents;
- copyrights;
- trademarks;
- trade secrets;
- standards of business conduct and related business practices; and
- technology license agreements, software license agreements, non-disclosure agreements, employment agreements, and other agreements.

However, these protections might not be effective in all circumstances. Competitors might independently develop similar technology or exploit our proprietary information and our brands in countries where we lack enforceable intellectual property rights or where enforcement of such rights through the legal system provides an insufficient deterrent. Also, intellectual property protections can lapse or be invalidated through appropriate legal processes. We do not believe that any single piece of intellectual property or proprietary rights is essential to our business.

Human Capital

We believe that our future success depends upon our continued ability to attract, develop, and retain a high-performance workforce bound by shared values. As of December 31, 2024, we employed approximately 6,500 employees, of whom approximately 2,200 were employed in the United States and approximately 4,300 were employed outside of the United States. Our largest non-US employee populations are in the Philippines (18%), Denmark (12%), China (7%), Costa Rica (7%) and Taiwan (5%). We also leverage contractors to provide flexibility for our business and manufacturing needs. As of December 31, 2024, we worked with approximately 400 contractors globally. Since the inception of our business, we have experienced no work stoppages or other labor disturbances.

Corporate Culture

Our core values are conducting business with honesty and integrity, collaborating with our colleagues as a company without doors, and partnering with our customers every step of the way, because customers count on us.

We strive to foster a positive work environment that helps employees thrive. It is a priority for us to ensure that our people feel inspired, supported, safe and able to achieve their personal best. We are committed to equality through nondiscrimination, harassment prevention and pay equity policies. We value a diverse, inclusive and respectful work environment where all employees enjoy challenging assignments, development opportunities and a safe, positive culture.

We are committed to conducting business in a responsible manner, with strategic operational policies, procedures and values that support transparency, sustainability and legal compliance. We ensure ethical operations and business commitments through robust governance of the company's code of conduct and global environmental, health and safety programs.

Competitive Pay and Benefits

The primary objective of our compensation program is to provide a compensation and benefits package that will continue to attract, retain, motivate and reward high performing employees who operate in a highly competitive and technologically challenging environment. We seek to achieve this objective by linking a meaningful portion of compensation to company and business unit performance. We enable employees worldwide to share in the success of the company through various programs including a stock purchase program, equity compensation and bonus plans. We seek competitiveness and fairness in total compensation with reference to peer comparisons and internal equity.

In addition to providing our employees with competitive compensation packages, we offer benefits designed to meet the needs of employees and their families worldwide, including paid time off, parental leave, bereavement leave, health insurance coverage, flexible work arrangements, contributions to retirement savings, and access to employee assistance and work-life programs.

Employee Development and Training

We believe that employee development and training is a key factor in attracting, motivating, improving and retaining a strong, competitive global workforce. We provide continual development to our employees focused on developing their job skills and competencies. Examples include new manager competencies like giving feedback and coaching, and training in software development tools and project management. Our employees worldwide also receive annual performance reviews and are involved in setting goals for their own development and performance. Employees and managers look back on the previous year, review career development plans and create goals for the next year.

We are committed to recruiting and developing talent at the collegiate level to help advance Science, Technology, Engineering and Mathematics (“STEM”) education for the future workforce. For example, our paid internships and entry-level positions offer real-world experience, and our co-op program offers higher education students a unique learning opportunity as students alternate one semester in a work assignment and one semester in the classroom. Additionally, we offer reimbursement for educational courses related to an employee’s work or as part of a degree program, including tuition, lab fees and books. We also offer a scholarship program for employees with college-age children, step-children and grandchildren. In 2024, approximately half of the scholarship recipients were outside of the United States.

Employee Engagement

We conduct regular employee surveys to check in with our global workforce and obtain input on a number of topics. The feedback we receive from these surveys helps us assess employee sentiment, identify areas of improvement and guides our decision-making as it relates to people management. In addition, our CEO and other executives meet with employees worldwide on a frequent basis through exchange meetings and quarterly webcasts. The exchange meetings allow the executives to directly interact with a small group of employees, while the global webcasts enable all employees to engage with senior leaders and ask questions in an open Q&A session.

We also offer employees worldwide an opportunity to network and connect with colleagues who share similar interests. This includes global groups such as New Employees to Teradyne, Woman’s Affinity Group, Veterans, Blue and Green (for team members that are committed to the environment), Runner’s affinity group and LGBTQ+ advocates.

Diversity and Inclusion

We believe in fostering a diverse workforce, an equitable and inclusive culture in order to build a stronger and more resilient company for our customers, our investors, our employees and our communities worldwide. To support this effort, we have developed programs and training courses for our employees, to aid in recruiting candidates from various backgrounds and experiences. We have policies regarding gender pay equity and regularly conduct audits of pay equity in the United States. We are an equal opportunity employer committed to making employment decisions without regard to race, religion, ethnicity or national origin, gender, sexual orientation, gender identity or expression, age, disability, protected veteran status or any other characteristics protected by law.

We have a tradition of amplifying the charitable actions of our employees and responding to the needs of the communities where we work. To make it easier for employees to support charitable activities and magnify the impact of support, we established a formal matching gift program, “Teradyne Gives.” The program matches up to \$1,000 per year of an employee’s donations to charities of their choosing, selected from a wide range of qualified non-profit organizations.

Additionally, advancing education for future generations is a primary initiative at Teradyne. We seek to increase the diversity of STEM graduates worldwide through our support of STEM programs at the middle, high school and collegiate level. We also donate test equipment and robots to colleges, universities, and vocational programs.

Health and Safety

The health and safety of our employees worldwide is our highest priority. We are committed to complying with all applicable regulatory health and safety requirements wherever we operate. We conduct internal audits, regular reviews and monitoring of regulations to ensure compliance with laws and regulations at the local, state, province and country levels. We ensure workers are provided with the knowledge to perform their jobs safely by deploying mandatory environmental, health and safety training. We also require contractors to complete safety training prior to working at any Teradyne site. We monitor, track and report common safety metrics such as accidents, near misses and illness. Our injury and illness rate is below the industry average. We also provide our employees with a flexible and adjustable workspace, which includes reviewing ergonomics issues in the workplace, educating employees to self-identify risks and ensuring they have the work environment they need to do their jobs safely and effectively.

Regulatory Environment

We are subject to various federal, state, and local government laws and regulations relating to international trade, business conduct, the protection of employee health and safety and the environment.

We accrue for all known environmental liabilities when it becomes probable that we will incur cleanup costs and those costs can reasonably be estimated. Estimated environmental costs are not expected to materially affect the financial position or results of our operations in future periods. However, estimates of future costs are subject to change due to protracted cleanup periods and changing environmental remediation laws and regulations.

We are subject to U.S. and foreign laws and regulations that limit and restrict the export of some of our products and services and may restrict our transactions with certain customers, business partners and other persons. In certain circumstances, export control and economic sanctions or regulations prohibit the export of certain products, services, and technologies, and in other circumstances we are required to obtain an export license before exporting the controlled item. For example, we must comply with current U.S. Department of Commerce export control regulations restricting transactions with certain customers in China. We must also comply with export restrictions and laws imposed by other countries affecting trade and investments. We maintain an export compliance program but there are risks that the compliance controls could be circumvented, exposing us to legal liabilities. Compliance with these laws has limited our sales and likely will continue to limit sales to certain customers in the future. Changes in, and responses to, U.S. trade policy could reduce the competitiveness of our products and cause our sales to drop, which could have a material adverse effect on our business, financial condition or results of operations.

Item 1A: Risk Factors

The risks described below are not the only risks that we face. Additional risks and uncertainties not currently known to us or that we currently deem to be immaterial also may materially adversely affect our business, financial condition and/or operating results.

Risks Associated with Teradyne's Markets

Our business is impacted by global and industry-specific economic cycles, which are difficult to predict, and actions we have taken or may take to offset these cycles may not be sufficient.

Capital equipment providers in the electronics, semiconductor industries and robotics, such as Teradyne, have, in the past, been negatively impacted by both sudden slowdowns in the global economies and recurring cyclicality within those industries. These cycles have resulted in periods of over-supply; a trend we believe will continue to occur. Our business and results of operations depend, in significant part, upon capital expenditures of manufacturers of semiconductors, electronics, and other industrial products, which in turn depend upon the current and anticipated market demand for those products. Disruption or deterioration in economic conditions may reduce customer purchases of our products, thereby reducing our revenues and earnings. In addition, such adverse changes in economic conditions, and resulting slowdowns in the market for our products, may, among other things, result in increased price competition for our products, increased risk of excess and obsolete inventories, increased risk in the collectability of our accounts receivable from our customers, potential reserves for credit losses and write-offs of accounts receivable, increased risk of restructuring charges, and higher operating costs as a percentage of revenues, which, in each case and together, adversely affect our operating results. We are unable to predict the likely duration, frequency and severity of disruptions in financial markets, credit availability, and adverse economic conditions throughout the world, and we cannot ensure that the level of revenues or new orders for a fiscal quarter will be sustained in subsequent quarters. We have taken actions to address the effects of general economic variability and recurring

industry cyclicality, including implementing cost control and reduction measures. We cannot predict whether these measures will be sufficient to offset global or market-specific disruptions that might affect our businesses and we may need to take additional or different measures in the future.

We are subject to intense competition.

We face significant competition throughout the world in each of our reportable segments. Some of our competitors have substantial financial and other resources to pursue engineering, manufacturing, marketing and distribution of their products. In addition, we are subject to trade regulations imposed by the United States government, which may not impact some of our competitors. We also face competition from emerging Asian companies and internal development at several of our customers. Some of our competitors have introduced or announced new products with certain performance characteristics that may be considered equal or superior to those we currently offer. We expect our competitors to continue to improve the performance of their current products and to introduce new products or new technologies that provide improved cost of ownership and performance characteristics. New product introductions by competitors could cause a decline in revenues or loss of market acceptance of our products.

The market for our products is concentrated, and our business depends, in part, on obtaining orders from a few significant customers.

The market for our products is concentrated with a limited number of significant customers accounting for a substantial portion of the purchases of test equipment. In each of the years, 2024, 2023 and 2022, our five largest direct customers in aggregate accounted for 36%, 32% and 26% of consolidated revenues, respectively.

We estimate consolidated revenues driven by Samsung, a customer of our Semiconductor Test and Wireless Test Segments, combining direct sales to that customer with sales to the customer's OSATs, accounted for 12.5% of our consolidated revenues in 2024.

Customer consolidation could affect our operating results.

There has been a trend toward customer consolidation in the semiconductor industry through business combinations, including mergers, asset acquisitions and strategic partnerships. If this trend continues, it could make us more dependent on fewer customers who may be able to exert increased pressure on our prices and other contract terms and could increase the portion of our total sales concentration for any single customer. Customer consolidation activity could also reduce the demand for our products and services if such customers streamline research and development or operations, reduce purchases or delay purchasing decisions. These outcomes could negatively impact our operating results and financial condition.

If we fail to develop new technologies to adapt to our customers' needs or if our customers fail to accept our new products, our revenues will be adversely affected.

We believe that our technological position depends primarily on the technical competence and creative ability of our engineers. In a rapidly evolving market, such as ours, the development or acquisition of new technologies, commercialization of those technologies into products and market acceptance and customer demand for those products are critical to our success. Successful product development or acquisition, introduction and acceptance depend upon a number of factors, including:

- new product selection;
- ability to meet customer requirements including with respect to safety and cyber security;
- development of competitive products by competitors;
- timely and efficient completion of product design;
- timely and efficient implementation of manufacturing and manufacturing processes;
- timely remediation of product performance issues, if any, identified during testing;
- assembly processes and product performance at customer locations;
- differentiation of our products from our competitors' products;
- management of customer expectations concerning product capabilities and product life cycles;
- transition of customers to new product platforms;

- compliance with product safety regulations;
- ability to protect products from cyber attacks when used by our customers;
- ability to attract and retain technical talent; and
- innovation that does not infringe on the intellectual property rights of third parties.

Risks Associated with Operating a Global Business

We are subject to risks of operating internationally.

A significant portion of our consolidated revenues is derived from customers outside the United States. Our international sales and operations are subject to significant risks and difficulties, including:

- unexpected changes in legal and regulatory requirements affecting international markets;
- cost increases due to inflation;
- changes in tariffs and exchange rates;
- social, political and economic instability, acts of terrorism and international conflicts;
- disruption caused by health pandemics;
- difficulties in protecting intellectual property;
- difficulties in accounts receivable collection;
- cultural differences in the conduct of business;
- difficulties in staffing and managing international operations;
- compliance with anti-corruption laws;
- compliance with data privacy regulations;
- compliance with customs and trade regulations; and
- compliance with international tax laws and regulations.

In addition, an increasing portion of our products and the products we purchase from our suppliers are sourced or manufactured in foreign locations, including Malaysia and Denmark, and a large portion of the devices our products test are fabricated and tested by foundries and subcontractors in Taiwan, China, Korea and other parts of Asia. As a result, we are subject to a number of economic and other risks, particularly during times of political, health or financial instability in these regions. Disruption of manufacturing or supply sources in these international locations could materially adversely impact our ability to fill customer orders and potentially result in lost business.

We are subject to risks associated with doing business in China.

In addition to the risks associated with the tariffs and trade regulations detailed below, we are subject to the following risks associated with doing business in China:

- adverse changes in Chinese political, economic or social conditions or Chinese laws, regulations or policies, including the imposition of unexpected or confiscatory taxation, restrictions on currency conversion, imports and sources of supply, devaluations of currency, the nationalization or other expropriation of private enterprises, or the reversal of economic reform policies that encourage private economic activity, foreign investments and greater economic decentralization;
- differing economic practices compared to most developed countries, including with respect to the amount of government involvement, control of foreign exchange and allocation of resources;
- uncertainties presented by the Chinese legal system, which is not fully integrated and continues to rapidly evolve, impeding our ability to interpret certain Chinese laws and regulations, predict and evaluate the outcome of administrative and court proceedings and the level of legal protection to enforce contracts we have entered into in China; and Chinese controls on the convertibility of Renminbi into foreign currencies and, in certain cases, the remittance of currency out of China, restricting our ability to remit sufficient foreign currency to pay dividends or make other payments to us, or otherwise satisfy foreign currency-denominated obligations.

The foregoing risks and the ongoing geopolitical tensions and economic uncertainty between the United States and China and the unknown impact of current and future Chinese rules and regulations, may cause increased costs, as well as restrictions on our ability to sell, or a decreased demand from customers to purchase, our products, which could harm our business, financial condition and operating results.

The Israel-Hamas conflict may have a material impact on our Business

The Israel-Hamas conflict could have a negative impact on our future revenue and supply chain, either of which could adversely affect our business and financial results. Our customers in Israel may experience delays in product releases due to impacts to their labor force and impacts on their suppliers because of the conflict, which could materially impact demand for our products. Similarly, our suppliers in Israel may experience delays in providing us with parts due to the conflict. In addition, the global economic uncertainty following the start of the conflict could impact demand for our products.

Risks Related to Teradyne's Finances

We may not fully realize the benefits of our acquisitions or strategic alliances.

In June 2015, we acquired Universal Robots, in 2018, we acquired Energid and MiR and, in 2019, we acquired Lemsys and AutoGuide. In May 2024, we closed on our strategic partnership agreement with Technoprobe which included Teradyne acquiring 10% of the equity in Technoprobe. We may not be able to realize the benefits of acquiring or successfully growing these businesses. We may continue to acquire additional businesses, form strategic alliances, or create joint ventures with third parties that we believe will complement or augment our existing businesses. We may not be able to realize the expected synergies and cost savings from the integration with our existing operations of other businesses or technologies that we may acquire. In addition, the integration process for our acquisitions may be complex, costly and time consuming and include unanticipated issues, expenses, and liabilities. We may have difficulty in developing, manufacturing, and marketing the products of a newly acquired company in a manner that enhances the performance of our combined businesses or product lines and allows us to realize value from expected synergies. Following an acquisition, we may not achieve the revenue or net income levels that justify the acquisition. Acquisitions may also result in one-time charges (such as acquisition-related expenses, write-offs or restructuring charges) or in the future, impairment of goodwill or acquired intangible assets, or adjustments to contingent consideration liabilities that adversely affect our operating results. Additionally, we may fund acquisitions of new businesses, strategic alliances, or joint ventures by utilizing our cash, incurring debt, issuing shares of our common stock, or by other means. Additionally, we may face restrictions pursuant to the terms of an acquisition or strategic alliance agreement.

We may incur higher tax rates than we expect and may have exposure to additional international tax liabilities and costs.

We are subject to paying income taxes in the United States and other countries where we operate. Our effective tax rate is dependent on where our earnings are generated and the tax regulations and the interpretation and judgment of administrative tax or revenue authorities in the United States and other countries. We have pursued a global tax strategy that could be adversely affected by the mix of earnings and tax rates in the countries where we operate, changes to tax laws (including but not limited to Pillar Two), tax regulations or an adverse tax ruling by administrative authorities. We are also subject to tax audits in the countries where we operate. Any material change in our tax liability resulting from changes in tax laws, tax regulations, administrative rulings or audits from an administrative tax or revenue authority could negatively affect our financial results.

As a multinational corporation, we are subject to income taxes as well as non-income-based taxes, in both the United States and various foreign jurisdictions. In certain foreign jurisdictions, we qualify for tax incentives and tax holidays based on our ability to meet, on a continuing basis, various tests relating to our employment levels, research and development expenditures and other qualification requirements in a particular foreign jurisdiction. While we intend to operate in such a manner to maintain and maximize our tax incentives and tax holidays, no assurance can be given that we have so qualified or that we will qualify for any particular year or jurisdiction. If we fail to qualify or fail to remain qualified for certain foreign tax incentives and tax holidays, we may be subject to further taxation or an increase in our effective tax rate which would adversely impact our financial results. In November 2020, we entered into an agreement with the Singapore Economic Development Board which extended our Singapore tax holiday under substantially similar terms to the agreement which expired on December 31, 2020. The new tax holiday is scheduled to expire on December 31, 2025.

The tax savings attributable to the Singapore tax holiday for the years ended December 31, 2024, 2023 and 2022 were \$17.1 million or \$0.10 per diluted share, \$1.4 million or \$0.01 per diluted share, and \$16.0 million or \$0.09 per diluted share, respectively. These tax savings may not be achievable in subsequent years due to changes in Singapore's tax laws, issuance of new global minimum tax laws, or the expiration of the tax holiday.

In addition, we may incur additional costs, including headcount expenses, in order to maintain or obtain a foreign tax incentive or tax holiday in a particular foreign jurisdiction.

We have significant guarantees, indemnification, and customer confidentiality obligations.

From time to time, we make guarantees to customers regarding the delivery, price and performance of our products and guarantee certain indebtedness, performance obligations or lease commitments of our subsidiary and affiliate companies. We also have agreed to provide indemnification to our officers, directors, employees and agents, to the extent permitted by law, arising from certain events or occurrences, while the officer, director, employee or agent, is or was serving at our request in such capacity. Additionally, we have confidentiality obligations to certain customers and if breached would require the payment of significant penalties. If we become liable under any of these obligations, it could materially and adversely affect our business, financial condition or operating results. For additional information see Note N: “Commitments and Contingencies-Guarantees and Indemnification Obligations” in Notes to Consolidated Financial Statements.

We may discontinue or reduce our quarterly cash dividend or share repurchase program.

In January 2014, our Board of Directors initiated a quarterly cash dividend. Since 2014, the Board of Directors has increased our quarterly cash dividend from \$0.06 per share to \$0.12 per share. Holders of our common stock are only entitled to receive dividends when and if they are declared by our Board of Directors.

In January 2021, our Board of Directors approved a \$2.0 billion share repurchase program. In 2022 and 2021, we repurchased \$752.1 million, and \$600.0 million, respectively of common stock. In January 2023, our Board of Directors cancelled the 2021 repurchase program and approved a new \$2.0 billion share repurchase program. In 2024, we repurchased \$199.4 million of common stock and, in 2023, we repurchased \$400.5 million of common stock. We intend to repurchase up to \$400 million in 2025. Under the share repurchase program, we may repurchase outstanding shares of our common stock from time to time in the open market and through privately negotiated transactions. Unless terminated earlier by resolution of our Board of Directors, the repurchase program will expire when we have repurchased all shares authorized for repurchase under the share repurchase program.

Future cash dividends and share repurchases are subject to the discretion of our Board of Directors and will depend, among other things, upon our earnings, capital requirements and financial condition. While we have declared a quarterly cash dividend on our common stock and authorized a share repurchase program, we are not required to do either and may reduce or eliminate our cash dividend or share repurchase program in the future. The reduction or elimination of our cash dividend or our share repurchase program could adversely affect the market price of our common stock.

We have incurred indebtedness and may incur additional indebtedness.

On May 1, 2020, we entered into a three-year, senior secured revolving credit facility of up to \$400.0 million. On December 10, 2021, the credit agreement was amended to extend the maturity date of the credit facility to December 10, 2026. On October 5, 2022, the credit agreement was amended to increase the amount of the credit facility to \$750.0 million from \$400.0 million. The amended credit agreement provides that, subject to customary conditions, we may seek to obtain from existing or new lenders the available incremental amount under the credit facility, not to exceed the greater of \$200.0 million or 15% of consolidated EBIDTA. We could borrow funds under this credit facility at any time for general corporate purposes and working capital. On May 16, 2024, we borrowed \$185.0 million under this credit facility, primarily to fund our acquisition of the 10% equity interest in Technoprobe discussed above. By December 31, 2024, we had fully repaid all amounts borrowed under the credit facility. As of February 20, 2025, there are no outstanding borrowings under the credit facility.

Our outstanding and any additional indebtedness, among other things, could:

- make it difficult to make payments on this indebtedness and our other obligations;
- make it difficult to obtain any necessary future financing for working capital, capital expenditures, debt service requirements or other purposes;
- require the dedication of a substantial portion of any cash flows from operations to service for indebtedness, thereby reducing the amount of cash flows available for other purposes, including capital expenditures, and
- limit our flexibility in planning for or reacting to changes in our business and the industries in which we complete.

Restrictive covenants in the agreement governing our senior secured revolving credit facility may restrict our ability to pursue business strategies.

The agreement governing our senior secured revolving credit facility limits our ability, among other things, to incur additional secured indebtedness; sell, transfer, license or dispose of assets; consolidate or merge; enter into transactions with our affiliates; and incur liens. In addition, our senior secured revolving credit facility contains financial and other restrictive covenants that limit our ability to engage in activities that may be in our long-term best interest, such as, subject to permitted exceptions, making capital expenditures in excess of certain thresholds, making investments, loans and other advances, and prepaying any additional indebtedness while our indebtedness under our senior secured revolving credit facility is outstanding. Our failure to comply with financial and other restrictive covenants could result in an event of default, which if not cured or waived, could result in the lenders requiring immediate payment of all outstanding borrowings or foreclosing on collateral pledged to them to secure the indebtedness.

We may not be able to pay our debt and other obligations.

If our cash flows are inadequate to meet our obligations, we could face substantial liquidity problems. If we are unable to generate sufficient cash flows or otherwise obtain funds necessary to make required payments on our senior secured revolving credit facility or certain of our other obligations, we would be in default under the terms thereof, which would permit the holders of those obligations to accelerate their maturity and also could cause defaults under future indebtedness we may incur. Any such default could have a material adverse effect on our business, prospects, financial position and operating results.

Foreign currency exchange rates and fluctuations in those rates may affect the Company's ability to realize projected growth rates in its sales and earnings.

Our financial statements are denominated in U.S. dollars. While revenues in our test businesses are predominantly in U.S. dollars, the majority of our Robotics revenue is denominated in foreign currencies. Strengthening of the U.S. dollar would negatively affect Robotics revenue growth.

Adverse developments affecting the financial services industry, including events or risks involving liquidity, defaults or non-performance by financial institutions, could have a material adverse effect on our business, financial condition or results of operations.

We hold cash balances in several large financial institutions significantly in excess of the Federal Deposit Insurance Corporation ("FDIC") and global insurance limits. If banks and financial institutions with whom we have banking relationships enter receivership or become insolvent in the future, we may be unable to access, and we may lose some or all of our existing cash, cash equivalents and investments to the extent those funds are not insured or otherwise protected by the FDIC. For example, on March 10, 2023, *Silicon Valley Bank* ("SVB"), who is a lender in our revolving credit facility and where we maintain certain accounts and cash deposits, was placed into receivership with the FDIC, which resulted in all funds held at SVB being temporarily inaccessible by SVB's customers. As of March 13, 2023, access to our cash and cash equivalents at SVB was fully restored. There is no guarantee that the FDIC or any other global insurer will provide access to uninsured funds in the future in the event of the closure of any other banks or financial institutions in a timely fashion or at all. Any inability to access or delay in accessing these funds could adversely affect our business, financial position, and liquidity.

Our stock price has been subject to fluctuations, and will likely continue to be subject to fluctuations, which may be volatile and due to factors beyond our control.

The market price of our common stock is subject to wide fluctuations in response to various factors, some of which are beyond our control. In addition to the factors discussed in this "Risk Factors" section and elsewhere in this report, factors that could cause fluctuations in the market price of our common stock include the following:

- ratings changes by any securities analysts who follow our company;
- announcements by us or our competitors of significant technical innovations, acquisitions, strategic partnerships, joint ventures, or capital commitments;
- changes in operating performance and stock market valuations of other technology companies generally, or those in our industry in particular;
- changes in accounting standards, policies, guidelines, interpretations, or principles;
- actual or anticipated developments in our business or our competitors' businesses or the competitive landscape generally;
- developments or disputes concerning our intellectual property or our products and platform capabilities, or third-party proprietary rights;

- cybersecurity attacks or incidents;
- announced or completed acquisitions of businesses or technologies by us or our competitors;
- changes in our board of directors or management;
- announced or completed equity or debt transactions involving our securities;
- sales of shares of our common stock by us, our officers, directors, or other stockholders; and
- other events or factors, including those resulting from global and macroeconomic conditions, including heightened inflation, rising interest rates, bank failures, and a potential recession, and speculation regarding the same, as well as public health crises, geopolitical tension, incidents of terrorism, or responses to these events.

In addition, the market for technology stocks and the stock markets in general have experienced extreme price and volume fluctuations. Stock prices of many technology companies have fluctuated in a manner unrelated or disproportionate to the operating performance of those companies. In the past, stockholders have instituted securities class action litigation following periods of market volatility. If we were to become involved in securities litigation, it could subject us to substantial costs, divert resources and the attention of management from our business, and adversely affect our business, results of operations, financial condition, and cash flows. A decline in the value of our common stock, including as a result of one or more factors set forth above, may result in substantial losses for our stockholders.

Risks Related to Operations

Our operating results are likely to fluctuate significantly.

Our operating results are affected by a wide variety of factors that could materially adversely affect revenues or profitability. The following factors could impact future operations:

- a worldwide economic slowdown or disruption in the global financial or industrial markets;
- cost increases from inflation on materials, employee wages, third party labor, and contract manufacturing;
- competitive pressures on selling prices;
- our ability to introduce, and the market acceptance of, new products;
- changes in product revenues mix resulting from changes in customer demand;
- the level of orders received which can be shipped in a quarter because of the tendency of customers to wait until late in a quarter to commit to purchase due to capital expenditure approvals and constraints occurring at the end of a quarter, or the hope of obtaining more favorable pricing from a competitor seeking the business;
- engineering and development investments relating to new product introductions, and the expansion of manufacturing, outsourcing and engineering operations in Asia;
- provisions for excess and obsolete inventory relating to the lack of demand for and the discontinuance of products;
- impairment charges for certain long-lived and intangible assets, and goodwill;
- an increase in the leasing of our products to customers;
- disruption caused by health pandemics,
- the success of sales channel expansion in Robotics;
- our ability to expand our global distribution channel for our collaborative and mobile robots;
- parallel or multi-site testing which could lead to a decrease in the ultimate size of the market for our semiconductor and electronic test products; and
- the ability of our suppliers and subcontractors to meet product quality or delivery requirements needed to satisfy customer orders for our products, especially if consolidated revenues increase.

As a result of the foregoing and other factors, we have experienced and may continue to experience material fluctuations in future operating results on a quarterly or annual basis which could materially and adversely affect our business, financial condition, operating results or stock price.

If our suppliers do not meet product or delivery requirements, we could have reduced revenues and earnings.

If any of our suppliers were to cancel contracts or commitments or fail to meet the quality or delivery requirements needed to satisfy customer orders for our products, we could lose time-sensitive customer orders, have significantly decreased revenues and earnings and be subject to contractual penalties, which would have a material adverse effect on our business, results of operations and financial condition. In addition, we rely on contract manufacturers for certain of our products, and our ability to meet customer orders for those products depends upon the timeliness and quality of the work performed by these subcontractors, over whom we do not exercise any control.

To a certain extent, we are dependent upon the ability of our suppliers and contract manufacturers to help meet increased product or delivery requirements. It may be difficult for certain suppliers to meet delivery requirements in a period of rapid growth, therefore impacting our ability to meet our customers' demands.

Our suppliers are subject to trade regulations, including tariffs and export restrictions imposed by the United States Government and by the governments of other countries. These regulations could impact our suppliers' ability to provide us with components for our products or could increase the price of those components.

We rely on the financial strength of our suppliers. The loss of suppliers either as a result of financial viability, bankruptcy or otherwise could have a material adverse effect on our business, results of operations or financial condition.

The global supply shortage of electrical components and inflationary cost increases impact our ability to meet customer demand and could adversely affect our business and financial results.

The global supply shortage of electrical components, including semiconductor chips, impacted our supply chain in 2023. As a result, we experienced and may experience in the future, increases in our lead times and costs for certain components for certain products. We may also experience delays in the delivery of some orders placed by our customers. In addition, inflationary pressures have in the past contributed to increased costs for product components along with wage inflation which yielded a minimal impact to the costs of our products, gross margin and profit for the year. In an effort to mitigate these risks, we may in some cases, incur higher costs due to investment in supply chain resiliency and to secure available inventory or have extended or non-cancellable purchase commitments with semiconductor suppliers, which introduces inventory risk if our forecasts prove inaccurate. We have also sourced components from additional suppliers and multi-sourced and pre-ordered components and finished goods inventory in some cases in an effort to reduce the impact of the adverse supply chain conditions we have experienced in the past. However, if we are unable to secure manufacturing capacities from our current or new suppliers and contract manufacturers, on acceptable terms or at all, or successfully manage our purchase commitments and inventory for components, our ability to deliver our products to our customers in the desired quantities, at competitive prices or in a timely manner may be negatively impacted for 2025. We also have been, and may continue to attempt to, offset the effect of these inflationary pressures by increasing the prices of our products. However, we may not be fully able to pass additional costs on to our customers, which could have a negative impact on our results of operations and financial condition.

Our operations may be adversely impacted if our outsourced contract manufacturers or service providers fail to perform.

We depend on Flex Ltd. ("Flex") to manufacture and test our FLEX and J750 family of products from its facility in Malaysia; Plexus Corp. ("Plexus") to manufacture and test our Magnum products from its facilities in Malaysia and Thailand and our ETS family of products from its facility in Malaysia; SAM Meerkat to manufacture and test our storage test family of products from its facilities in Malaysia and Thailand and on other contract manufacturers to manufacture other products. If for any reason these contract manufacturers cannot provide us with these products in a timely fashion, or at all, we may not be able to sell these products to our customers until we enter a similar arrangement with an alternative contract manufacturer.

If we experience a problem with our supply of products from Flex, Plexus, SAM Meerkat, or our other contract manufacturers, it may take us significant time to either manufacture the product or find an alternate contract manufacturer, which could result in substantial expense and disruption to our business.

We have also outsourced certain general and administrative functions to reputable service providers, many of which are in foreign countries, sometimes impacting communication with them because of language and time differences. Their presence in foreign countries also increases the risk they could be exposed to political and cybersecurity risk. Additionally, there may be difficulties encountered in coordinating the outsourced operations with existing functions and operations. If we fail in successfully coordinating and managing the outsourced service providers, it may cause an adverse effect on our operations which could have a material adverse effect on our business, results of operations or financial condition.

Our business may suffer if we are unable to attract and retain key employees.

Competition for employees with skills we require is intense in the high technology industry. We expect intense competition for employees to continue in 2025. Our success will depend on our ability to attract and retain key technical employees. The loss of one or more key or other employees, a decrease in our ability to attract additional qualified employees, or the delay in hiring key personnel could each have a material adverse effect on our business, results of operations or financial condition.

Our operations, and the operations of our customers and suppliers, are subject to risks of natural catastrophic events, severe weather, widespread health epidemics, acts of war, terrorist attacks and the threat of domestic and international terrorist attacks, any one of which could result in cancellation of orders, delays in deliveries or other business activities, or loss of customers and could negatively affect our business and results of operations. In certain cases, our insurance policy may be insufficient to cover losses.

Our business is international in nature, with our sales, service and administrative personnel and our customers and suppliers located in numerous countries throughout the world. Our operations, and those of our customers and suppliers, are subject to disruption for a variety of reasons, including work stoppages, acts of war, terrorism, health epidemics, fires, earthquakes, hurricanes, typhoons, volcanic eruptions, energy shortages, telecommunication failures, tsunamis, flooding or other natural disasters. Such disruption could materially increase our costs and expenses as well as cause delays in, among other things, shipments of products to our customers, our ability to perform services requested by our customers, or the installation and acceptance of our products at customer sites. Any of these conditions could have a material adverse effect on our business, financial condition or results of operations.

Global climate change can result in natural disasters occurring more frequently, with greater intensity and with less predictability. For example, when our operations in Cebu, Philippines experienced a devastating typhoon, our employees in Cebu succeeded in restoring most of our operations within days despite the severity of the damage in the region. The long-term effects of climate change on the global economy and the semiconductor industry in particular are unclear but could be severe.

Risks Related to Intellectual Property (“IP”) and Cybersecurity

Third parties may claim we are infringing their intellectual property and we could suffer significant litigation costs, licensing expenses or be prevented from selling our products.

We have been sued for patent infringement and receive notifications from time to time that we may be in violation of patents held by others. An assertion of patent infringement against us, if successful, could have a material adverse effect on our ability to sell our products or it could force us to seek a license to the intellectual property rights of others or alter such products so that they no longer infringe the intellectual property rights of others. A license could be very expensive to obtain or may not be available at all. Similarly, changing our products or processes to avoid infringing the rights of others may be costly or impractical. Additionally, patent litigation could require a significant use of management resources and involve a lengthy and expensive defense, even if we eventually prevail. If we do not prevail, we might be forced to pay significant damages, obtain licenses, modify our products, or stop making our products; each of which could have a material adverse effect on our financial condition, operating results or cash flows.

If we are unable to protect our IP, we may lose a valuable asset or may incur costly litigation to protect our rights.

We protect the technology that is incorporated in our products in several ways, including through patent, copyright, trademark and trade secret protection and by contractual agreement. However, even with these protections, our IP may still be challenged, invalidated or subject to other infringement actions. While we believe that our IP has value in the aggregate, we do not believe that any single element of our IP is in itself essential. If a significant portion of our IP is invalidated or ineffective, our business could be materially adversely affected.

A breach of our operational or security systems could negatively affect our business and results of operations.

We rely on various information technology networks and systems to process, transmit and store electronic information, including proprietary and confidential data, and to carry out and support a variety of business activities, including manufacturing, research and development, supply chain management, sales and accounting. We have experienced several attempted cyber-attacks of our network. None of the attempted attacks have caused a disruption to our operations or had a material adverse effect on our business or financial results. As a result of the attempts, we have taken further preventive security measures to protect our systems. Despite the preventative security measures we have implemented, we may continue to be vulnerable to attempts by third parties to gain unauthorized access to our networks or sabotage our systems. These attempts, which might be related to criminal hackers, industrial espionage or state-sponsored intrusions, include trying to covertly introduce malware to our computers, networks and systems and impersonating authorized users. In addition, third party suppliers and service providers that we rely on to manage our networks and

systems and who process and store our proprietary and confidential data, including the data of our customers and suppliers, may also be subject to similar attacks. Employees and contractors may also attempt to gain unauthorized access to our systems and steal proprietary and confidential data. Such attempts could result in the misappropriation, theft, misuse, disclosure or loss or destruction of the intellectual property, or the proprietary, confidential or personal information, of Teradyne or our employees, customers, suppliers or other third parties, as well as damage to or disruptions in our information technology networks and systems. These threats are constantly evolving and expanding, such as through the increased use of artificial intelligence in our products and expanding remote work opportunities for our employees, thereby increasing the difficulty of defending against them or implementing adequate preventative measures. While we seek to detect and investigate all security incidents and to prevent their recurrence, attempts to gain unauthorized access to our information technology networks and systems may be successful, and in some cases, we might be unaware of an incident or its magnitude and effects. A failure in or a breach of our operational or security systems or infrastructure, or those of our suppliers and other service providers, including as a result of cyber-attacks, could have a material adverse effect on our business or financial results, disrupt our business, result in the disclosure or misuse of proprietary or confidential information, damage our reputation, cause losses and increase our costs. We expect to continue to devote significant resources to the security of our information technology networks and systems.

A breach of the security of our products could negatively affect our business and results of operations.

We may be subject to security breaches of certain of our products caused by viruses, illegal break-ins or hacking, sabotage, or acts of vandalism by third parties or our employees or contractors. A breach of our product security systems could have a material adverse effect on our business or financial results, disrupt our business, result in the disclosure or misuse of proprietary or confidential information, damage our reputation, cause losses, and increase our costs. We expect to continue to devote significant resources to the security of our products.

We are exposed to risks related to the use of AI tools by us and others.

Although we are evaluating, and where we believe appropriate, incorporating AI tools into our products and operations, our use of AI tools may subject us to significant competitive, legal, regulatory and other risks, and there can be no assurance that our use of AI tools will enhance our products, business operations or result in a benefit to us. Our competitors may be more successful in their use of AI tools, including by developing superior products or improving their operations with the assistance of AI. Additionally, there could be adverse impacts from flawed algorithms. Our use of AI tools, or our customers uses of our products that incorporate AI, could also result in the loss of confidential information or intellectual property or an inability to claim or enforce intellectual property rights, as well as subject us to risks related to intellectual property infringement or misappropriation, data privacy, cybersecurity, and the unauthorized use of our data. The jurisdictions in which we conduct business have and may adopt laws and regulations related to AI, which could cause us to incur greater compliance costs, limit our use of AI tools, or subject us to legal liabilities.

Risks Related to Legal and Regulatory Compliance

The implementation of tariffs on our products may have a material impact on our business.

Our business operations and supply chain are global and may be disrupted by the implementation of tariffs.

In 2018, the United States Trade Representative imposed a 25% tariff on many lists of products, including certain Teradyne products that are made in China and imported into the United States. On February 1, 2025, President Trump issued an executive order directing the United States to impose an additional 10% tariff on all imports from China effective February 4, 2025. We plan to implement operational changes that mitigate some of the impact of these tariffs on the import of our impacted products into the United States. As a result, the existing tariffs have not had a material adverse effect on our business, financial condition or results of operations. The implementation of additional tariffs by the United States could have a material adverse effect on our business, financial condition or results of operations.

In addition to the actions taken by the United States, China has implemented retaliatory tariffs on products made in the United States and imported into China. These tariffs have not yet impacted Teradyne products. However, notwithstanding our efforts, the retaliatory tariffs or other trade restrictions implemented by China and possible future retaliatory actions by China or other nations could disrupt our business operations, sales and supply chain and, therefore, have a material adverse effect on our business, financial condition or results of operations.

In February, 2025, President Trump issued executive orders directing the United States to impose new or additional tariffs on certain imports from Canada, Mexico and China and subsequently announced his intention to pause such tariffs on Canada and Mexico. While we do not believe any tariffs announced to date will have a material adverse effect on our business, financial condition or results of operations, we are still evaluating the potential impact of these tariffs and any additional tariffs implemented by the

Trump administration as well as any retaliatory actions by the impacted countries to our business and financial condition and outlook. The actual impact on any new tariffs is subject to a number of factors including the effective date, duration, amount, scope and nature of the tariffs, any retaliatory actions any impacted country may take, and any mitigating actions that are available.

Trade regulations and restrictions impact our ability to manufacture certain products and to sell products to and support certain customers, which may materially adversely affect our sales and results of operations.

We are subject to U.S. laws and regulations that limit and restrict the export of some of our products and services and may restrict our transactions with certain customers, business partners and other persons. In certain circumstances, export control and economic sanctions regulations prohibit the export of certain products, services and technologies, and in other circumstances are required to obtain an export license before exporting the controlled item. We must also comply with export restrictions and laws imposed by other countries affecting trade and investments. We maintain an export compliance program but there are risks that the compliance controls could be circumvented, exposing us to legal liabilities. As further described below, compliance with these laws has not significantly limited our sales over time, but could significantly limit them in the future. Changes in, and responses to, U.S. trade policy could reduce the competitiveness of our products and cause our sales to drop, which could have a material adverse effect on our business, financial condition or results of operations.

The U.S. government from time to time has issued export restrictions that prohibit U.S. companies from exporting U.S. manufactured products, foreign manufactured products with more than 25% controlled U.S. content, foreign made product which was produced using U.S. technology, as well as U.S. origin technology. For example, the U.S. Department of Commerce has restricted the access of U.S. origin technologies to certain Chinese semiconductor companies by adding those companies to the Entity List and the Foreign Direct Product Rule ("FDP") under U.S. Export Administration Regulations ("EAR"). On May 16, 2019, Huawei and 68 of its affiliates, including HiSilicon, were added to the U.S. Department of Commerce Entity List under EAR. On December 2, 2024, certain of our customers and prospective customers were added to the U.S. Department of Commerce Entity List or FDP under EAR. The addition of certain of these companies to the entity list and FDP has had and will continue to have an adverse impact on our business with these customers. We will take appropriate actions, including filing for licenses with the U.S. Department of Commerce to attempt to minimize the impact of the restrictions on our business.

On April 28, 2020, the U.S. Department of Commerce published new export control regulations for certain U.S. products and technology sold to military end users or for military end-use in China, Russia and Venezuela. The definition of military end user is broad. The regulations went into effect on June 29, 2020. In December 2020, the U.S. Department of Commerce issued a list of companies in China and other countries that it considered to be military end users. Compliance with the new export controls has impacted our ability to sell products to certain customers in China. In addition, while we maintain an export compliance program, our compliance controls could be circumvented, exposing us to legal liabilities. We will continue to assess the impact of these export controls on our business and operations and take appropriate actions to ensure compliance and minimize any disruption. However, we cannot be certain that the actions we take will mitigate all the risks associated with the export controls that may impact our business.

On October 7, 2022, the U.S. Department of Commerce published regulations restricting the export to China of advanced semiconductors, supercomputer technology, equipment for the manufacturing of advanced semiconductors and components and technology for the manufacturing in China of certain semiconductor manufacturing equipment. The restrictions impacted our sales to certain companies in China and our manufacturing and development operations in China. We mitigated the impact of these restrictions on our business by obtaining licenses from the U.S. Department of Commerce. On October 17, 2023, the U.S. Department of Commerce released new rules updating the export controls issued on October 7, 2022. The new rules, which took effect on November 17, 2023, significantly limit the impact of the October 7, 2022 restrictions on our business. On December 2, 2024, the U.S. Department of Commerce released additional new rules updating export controls. These regulations may continue to have an adverse impact on certain actual or potential customers and on the global semiconductor industry. To the extent the regulations impact actual and potential customers or disrupt the global semiconductor industry, our business and revenues will be adversely impacted.

In response to the regulations issued by the U.S. Department of Commerce, the Chinese government has passed new laws, including blocking legislation, which may impact our business activities in China. The Company is assessing the potential impact of these new Chinese laws and monitoring relevant laws and regulations issued by the Chinese government. The impact of these new Chinese laws on our business activities in China remains uncertain at this time.

We may be subject to product recalls and warranty and product liability claims.

We invest significant resources in the design, manufacturing and testing of our products. However, from time to time, we discover design or manufacturing defects in our products after they have been shipped and, as a result, we have incurred development and remediation costs and settled warranty and product liability claims. In addition, when our products contain defects or have reliability, quality or safety issues, we have conducted a product recall which resulted in significant repair or replacement costs and

substantial delays in product shipments and may damage our reputation which could make it more difficult to sell our products. We could continue to have warranty and product liability claims or product recalls in the future. Any of these results could have a material adverse effect on our business, results of operations or financial condition.

We may incur significant costs of complying with present and future environmental regulations and may incur significant liabilities if we fail to comply with such environmental regulations.

We are subject to both domestic and international environmental regulations and statutory strict liability relating to the use, storage, discharge, site cleanup and disposal of hazardous chemicals used in our manufacturing processes. In addition, future regulations in response to global climate change may affect us, our suppliers, and our customers. Such regulations could cause us to incur additional direct costs for compliance, as well as increased indirect costs resulting from our customers and/or suppliers. Future climate change regulations could result in decreased demand for our products. If we fail to comply with present and future regulations, or are required to perform site remediation, we could be subject to future liabilities or cost, including penalties or the suspension of production. Present and future regulations may also:

- restrict our ability to expand facilities;
- restrict our ability to ship certain products;
- require us to modify our operations logistics;
- require us to acquire costly equipment; or
- require us to incur other significant costs and expenses.

Pursuant to present regulations and agreements, we are conducting groundwater and subsurface assessment and monitoring and are implementing remediation and corrective action plans for facilities located in Massachusetts and New Hampshire which are no longer conducting manufacturing operations. As of December 31, 2024, we have not incurred material costs as a result of the monitoring and remediation steps taken at the Massachusetts and New Hampshire sites.

The directive on the Restriction of the Use of Certain Hazardous Substances in Electrical and Electronic Equipment (the “RoHS Directive”) and the directive on Waste Electrical and Electronic Equipment (the “WEEE Directive”) altered the form and manner in which electronic equipment is imported, sold and handled in the European Union. Other jurisdictions, such as China, have followed the European Union’s lead in enacting legislation with respect to hazardous substances and waste removal. Ensuring compliance with the RoHS Directive, the WEEE Directive and similar legislation in other jurisdictions, and integrating compliance activities with our suppliers and customers could result in additional costs and disruption to operations and logistics and thus, could have a negative impact on our business, operations or financial condition.

We currently are, and in the future may be, subject to litigation or regulatory proceedings that could have an adverse effect on our business.

From time to time, we may be subject to litigation or other administrative, regulatory or governmental proceedings, including tax audits and resulting claims that could require significant management time and resources and cause us to incur expenses and, in the event of an adverse decision, pay damages or incur costs in an amount that could have a material adverse effect on our financial position or results of operations.

We may face risks associated with shareholder activism.

We may become subject to campaigns by shareholders advocating corporate actions such as financial restructuring, increased borrowing, special dividends, stock repurchases or divestitures. Such activities could interfere with our ability to execute our business plans, be costly and time-consuming, disrupt our operations, divert the attention of management, or result in our initiating borrowing or increasing our share repurchase plan or dividend, any of which could have an adverse effect on our business or stock price.

Provisions of our charter and by-laws and Massachusetts law may make a takeover of Teradyne more difficult.

There are provisions in our basic corporate documents and under Massachusetts law that could discourage, delay or prevent a change in control, even if a change in control may be regarded as beneficial to some or all of our stockholders.

Item 1B: Unresolved Staff Comments

None.

Item 1C: Cybersecurity

We believe cybersecurity is critical to supporting our vision and enabling our strategy. As a producer of leading-edge electronic testing products and maker of advanced robotics, we face a multitude of cybersecurity threats that range from attacks common to most industries, such as ransomware and denial-of-service, to attacks from more advanced, persistent, and highly organized adversaries, including nation state actors, that may target us for our role in critical infrastructure sectors. Our customers, suppliers, and partners face similar cybersecurity threats and, while we have not been materially affected to date, a cybersecurity incident impacting us or any of these entities could materially adversely affect our operations, performance, and results of operations. These cybersecurity threats and related risks make it imperative that we maintain a strong focus on cybersecurity.

Governance

The Board of Directors oversees management's processes for identifying and mitigating risks, including cybersecurity risks, to help align our risk exposure with our strategic objectives. Senior leadership, including our Chief Information Security Officer ("CISO"), brief the Audit Committee of the Board of Directors quarterly and the full Board of Directors at least annually on our cybersecurity and information security posture.

The corporate information security organization, under the CISO, has implemented a governance structure and processes to assess, identify, manage, and report cybersecurity risks. The CISO chairs management's Cybersecurity Steering Committee, in which current cyber threats, program performance, and ongoing risk mitigations are regularly reviewed. Cybersecurity related risks are also integrated into our overall enterprise risk management ("ERM") process. These risks are included in the risk universe that the ERM function evaluates to assess top enterprise risks on an annual basis and is reviewed and evaluated by the Board of Directors. The Board of Directors is also apprised of cybersecurity issues or incidents deemed to have a moderate or higher business impact as they arise, even if considered immaterial.

In the event of a significant incident, we intend to follow our detailed incident response playbooks, which outline the steps to be followed from incident detection through mitigation, recovery and notification, including escalation to functional areas (e.g., legal), and escalation to senior leadership via the Cybersecurity Steering Committee. Upon escalation, the Cybersecurity Steering Committee will review all inputs, assess the materiality of the incident, and then brief the Board of Directors on the determination and on how management intends to respond.

Risk management and strategy

Our global information security organization, led by our CISO, is responsible for our overall information security strategy, policy, security engineering, operations, and cyber threat detection and response. Our CISO is an experienced cybersecurity senior executive with more than 25 years of experience building and leading cybersecurity, risk management and information technology teams. The information security organization manages and continually enhances a robust enterprise security structure with the goal of preventing cybersecurity incidents to the extent feasible, while simultaneously increasing system resilience and deploying highly proficient detection and response capabilities in an effort to minimize the business impact should an incident occur.

Central to this organization is our global cyber operations team, which is responsible for the protection, detection, and response capabilities used in the defense of critical data and enterprise computing services. We also have a corporate-wide insider threat detection program to proactively identify external and internal threats and mitigate those threats in a timely manner. Our broader Teradyne employee community also has a key role in our cybersecurity defenses and is immersed in a comprehensive training and awareness curriculum to build and promote a corporate culture supportive of security.

Third parties also play a role in our cybersecurity. We engage third-party services to provide 24x7x365 monitoring, escalation, and response to cyber events. In addition to consulting on best practices, we leverage third parties for independent evaluations of our security controls through penetration testing and independent audits. These evaluations include testing both the design and operational effectiveness of security controls. We also share and receive threat intelligence with our industry peers, cybersecurity associations, and our cyber controls vendors.

We rely on contract manufacturing organizations and distributors to deliver our products to our customers, and a cybersecurity incident at one of these organizations or a key supplier could materially adversely impact us. We assess third party and supply chain cybersecurity controls through risk monitoring services tailored to align with our risk policy. Notwithstanding the extensive approach we take to cybersecurity, we may not be successful in preventing or mitigating a cybersecurity incident that could have a material adverse effect on us, either directly within our managed environment or indirectly via a third-party partner or supply chain vendor. Periodically we have a recognized independent security expert firm to assess our cyber security maturity along with risks and provide

feedback on where we should continue to improve to mitigate exposures. We share this review with our Board and develop a security roadmap which incorporates this feedback.

Additionally, for our business that supports the defense and aerospace sector, we must comply with extensive regulations, including requirements imposed by the Defense Federal Acquisition Regulation Supplement ("DFARS") related to adequately safeguarding controlled unclassified information ("CUI") and reporting cybersecurity incidents to the DoD. We have implemented cybersecurity policies and frameworks based on industry and governmental standards to align closely with DoD requirements, instructions, and guidance. Moreover, we are pursuing the necessary controls to support the Cybersecurity Maturity Model Certification ("CMMC") program, DoD's program to ensure members of the defense industrial base meet cybersecurity requirements for handling CUI and federal contract information. We believe we are well positioned to meet the requirements of the CMMC and are preparing for certification once the requirements are effective.

Item 2: *Properties*

We conduct manufacturing, engineering, sales and marketing, service, corporate administration and other operations in various leased and owned facilities throughout the world. We own approximately 920,000 square feet of office space and lease approximately 1,340,000 square feet of office space. We own our corporate headquarters in North Reading, Massachusetts, which is approximately 422,000 square feet. We believe our existing facilities are adequate to meet our current and reasonably foreseeable requirements. We regularly evaluate our expected facility needs and periodically make adjustments based on these evaluations. In 2024, we completed construction of an approximately 200,000 square foot building in Odense, Denmark, for our Robotics operations.

Item 3: *Legal Proceedings*

We are subject to legal proceedings, claims and investigations that arise in the ordinary course of business such as, but not limited to, patent, employment, commercial and environmental matters. We believe that we have meritorious defenses against all pending claims and intend to vigorously contest them. While it is not possible to predict or determine the outcomes of any pending claims or to provide possible ranges of losses that may arise, we believe the potential losses associated with all these actions are unlikely to have a material adverse effect on our results of operations, financial condition or cash flows.

Item 4: *Mine Safety Disclosure*

Not Applicable.

PART II

Item 5: Market for Registrant’s Common Equity, Related Shareholder Matters and Issuer Purchases of Equity Securities

Our common stock is traded on the Nasdaq Global Select Market under the trading symbol “TER.” As of February 20, 2025, there were approximately 1,084 holders of record of shares of our common stock.

See “Item 7: Management’s Discussion and Analysis of Financial Condition and Results of Operations,” for information on the frequency and amounts of our quarterly cash dividends, equity compensation plans and performance graph.

The following table includes information with respect to repurchases we made of our common stock during the three months ended December 31, 2024 (in thousands except per share price):

Period	(a) Total Number of Shares (or Units) Purchased	(b) Average Price Paid per Share (or Unit)	(c) Total Number of Shares (or Units) Purchased as Part of Publicly Announced Plans or Programs	(d) Maximum Number (or Approximate Dollar Value) of Shares (or Units) that may Yet Be Purchased Under the Plans or Programs
September 30, 2024 – October 27, 2024	104	\$ 129.01	103	\$ 1,531,150
October 28, 2024 – November 24, 2024	475	107.04	475	1,480,482
November 25, 2024 – December 31, 2024	668	120.26	668	1,400,063
	<u>1,247</u> (1)	<u>\$ 115.95</u> (1)	<u>1,246</u>	

(1) Includes approximately two thousand shares at an average price of \$122.14 withheld from employees for the payment of taxes.

As of January 1, 2023, share repurchases net of share issuances are subject to a 1% excise tax under the Inflation Reduction Act. Excise tax incurred is included as part of the cost basis of shares repurchased in the Condensed Consolidated Statements of Convertible Common Shares and Stockholders' Equity.

In January 2023, the Board of Directors cancelled the 2021 repurchase program and approved a new \$2.0 billion of common stock. Unless terminated by resolution of our Board of Directors, the repurchase program will expire when we have repurchased all shares authorized for repurchase under the share repurchase program.

We satisfy U.S. federal and state minimum withholding tax obligations due upon the vesting and the conversion of restricted stock units into shares of our common stock, by automatically withholding from the shares being issued, a number of shares with an aggregate fair market value on the date of such vesting and conversion that would satisfy the minimum withholding amount due.

Item 6: (Reserved)

Item 7: Management's Discussion and Analysis of Financial Condition and Results of Operations

Overview

We are a leading global supplier of automated test equipment and robotics products. We design, develop, manufacture and sell automated test systems and robotics products. Our automated test systems are used to test semiconductors, wireless products, data storage and complex electronics systems in many industries including consumer electronics, wireless, automotive, industrial, computing, communications, and aerospace and defense industries. Our Robotics products include collaborative robotic arms and autonomous mobile robots ("AMRs") used by global manufacturing, logistics and industrial customers to improve quality, increase manufacturing and material handling efficiency and decrease manufacturing and logistics costs. Our automated test equipment and robotics products and services include:

- semiconductor test ("Semiconductor Test") systems;
- robotics ("Robotics") products; and
- defense/aerospace ("Defense/Aerospace") test instrumentation and systems, circuit-board test and inspection ("Production Board Test") systems, and wireless test systems (referred collectively as "All Other").

The market for our test products is concentrated with a limited number of significant customers accounting for a substantial portion of the purchases of test equipment. A few customers drive significant demand for our products both through direct sales and sales to the customer's supply partners. We expect that sales of our test products will continue to be concentrated with a limited number of significant customers for the foreseeable future.

In 2024, we saw strength in our Semiconductor Test business, with memory and compute offerings growing considerably compared to 2023. We expect mobile, automotive, and industrial will grow in 2025 and that recent advancements in AI inference may help mid-term recovery in these markets. Beyond AI compute, we are investing in other areas of the semiconductor test market that offer the opportunity for accelerating long-term growth, including power semi-conductors and the shift towards vertically integrated products ("VIPs"). We have seen the benefits start to materialize in 2024 and expect them to continue through the mid-term.

2024 was a very weak industrial automation market resulting in a year-over-year decline in Robotics revenues while outperforming our peer group. In 2024, we built key OEM, systems integrators and large account strategic partnerships which will strengthen our go to market for years to come. Introduction of new products, including the MiR 1200 Pallet Jack will further expand our available markets to support our growth.

On May 27, 2024, we paid 483.1 million Euros, equivalent to \$524.1 million, to purchase a combination of previously issued and outstanding shares and shares newly issued by Technoprobe, S.p.A. ("Technoprobe"). The shares purchased represent 10% of the issued and outstanding shares of Technoprobe. We also received a board seat as part of the purchase. Additionally, as part of the transaction, we completed the sale of the Device Interface Solutions ("DIS") business, a component of our Semiconductor Test segment, to Technoprobe for \$85.0 million in cash, net of cash and cash equivalents sold, and a customary working capital adjustment. The sale resulted in a pre-tax gain of \$57.1 million recorded as 'Gain on sale of business' in the consolidated statement of operations.

Our financial statements are denominated in U.S. dollars. While revenues in our test businesses are predominantly in U.S. dollars, the majority of our Robotics revenue is denominated in foreign currencies. Strengthening of the U.S. dollar would negatively affect Robotics revenue growth in 2025.

Our corporate strategy for our test businesses is to profitably grow market share while in Robotics, we plan to profitably grow revenue through the introduction of differentiated products targeting expanding markets. Our capital allocation plan will continue to be balanced between investing in organic and inorganic growth and returning cash to shareholders through share repurchases and dividends.

Supply Chain Constraints and Inflationary Pressures

The global supply shortage of electrical components, including semiconductor chips, impacted our supply chain in the first half of 2023. In the second half of 2023 and the full year of 2024, we saw improvements related to supply constraints and, consequently, did not experience material increases in our lead times and costs for components. In addition, in 2023 and 2024, inflationary pressures contributed to increased costs for product components and wage inflation, which had a minimal impact on our cost of products, gross margin and profit for the year. While our businesses could be impacted by supply constraints in the future, we do not anticipate supply chain constraints will have a material impact on our financial results in 2025.

Government Regulations

We are subject to numerous United States and foreign laws and regulations, including, without limitation, tariffs, trade sanctions, trade barriers, trade embargoes, regulations relating to import-export control, technology transfer restrictions, and other laws and regulations. Additionally, United States and foreign governmental authorities have taken, and may continue to take, administrative, legislative or regulatory action that could impact our operations. We believe that our operations are in material compliance with applicable trade regulations. The costs we incurred in complying with applicable trade regulations for the year ended December 31, 2024 were not material, and we do not currently expect the cost of complying with existing trade laws and regulations to have a material adverse effect on our capital expenditures or earnings or on our competitive position in any one year. It is possible, however, that future developments, including changes in laws and regulations or government policies, could lead to material costs, and such costs may have a material adverse effect on our future business or prospects.

For information regarding risks associated with import-export control regulations and similar applicable laws and regulations, see Part II - Item 1A "Risk Factors- Risks Related to Legal and Regulatory Compliance" included elsewhere in this Form 10-K.

Critical Accounting Policies and Estimates

We have identified the policies and estimates discussed below as critical to understanding our business and our results of operations and financial condition. The impact and any associated risks related to these estimates on our business operations is discussed throughout Management's Discussion and Analysis of Financial Condition and Results of Operations where such policies affect our reported and expected financial results. For a full description of our accounting policies related to the below items refer to Note B. Accounting Policies, included in the Notes to Consolidated Financial Statements in this Annual Report.

Critical accounting estimates are complex and may require significant judgment by management. Changes to the underlying assumptions may have a material impact on our financial condition and results of operations. These estimates may change, as new events occur, and additional information is obtained. Actual results could differ significantly from these estimates under different assumptions or conditions.

Revenue Recognition

In accordance with ASC 606, "Revenue from Contracts with Customers" ("ASC 606"), we recognize revenues, when or as control is transferred to a customer. Our determination of revenue requires judgment in the determination of performance obligations and allocation of the transaction price to performance obligations. We often sell bundled orders that include both product and services or multiple different products within the same order. We evaluate each of the deliverables to determine if it meets the definition of a performance obligation, which requires that it is capable of being distinct and distinct within the context of the contract. This determination is based on an assessment of contractual rights of the contract and the ability of the performance obligation to perform on its own or with readily available resources. In bundled transactions we estimate the standalone selling price of each identified performance obligation and use that estimate to allocate the transaction price among said performance obligations. The estimated standalone selling price is determined using all information reasonably available to us, including standalone transactions, market information and other observable inputs.

Equity Method Investments

We account for investments using the equity method of accounting when it has significant influence over the financial and operating policies, but not control, of the investee. The equity method investments are initially recorded at cost and included in the 'Equity method investment' in the consolidated balance sheet. We record our share of investee's net income or loss and other comprehensive income, and the amortization of equity method basis difference, calculated as the difference between the investment and the amount of underlying equity in net assets acquired, on a 3-month lag, which is applied consistently from period to period. Our share of investee's net income and the amortization of equity method basis difference are reported in 'Equity in net earnings of affiliate' in the consolidated statement of operations. We include our share of investee's other comprehensive income and a cumulative translation adjustment in the consolidated statements of comprehensive income. We monitor on an ongoing basis its equity method investments for indicators of other-than-temporary declines in fair value below carrying value.

Inventories

Inventories are stated at the lower of cost using a standard costing system which approximates cost based on a first-in, first-out basis or net realizable value. On a quarterly basis, we evaluate all inventories for net realizable value. This quarterly process identifies obsolete and excess inventory. Obsolete inventory, which represents items for which there is no demand, is fully reserved. Excess inventory, which represents inventory items that are not expected to be consumed within the forecasted demand window, is written

down to estimated net realizable value. Forecasted demand information is obtained from the sales and marketing groups and incorporates factors such as backlog and future revenues. The demand forecast is based on assumptions around the product life and customer and market expectations.

Retirement and Postretirement Plans

We recognize net actuarial gains and losses and the change in the fair value of the plan assets in our operating results in the year in which they occur or upon any interim remeasurement of the plans. Discount rate and expected return on assets are two assumptions which are important elements of pension plan expense and asset/liability measurement. We evaluate our discount rate and expected rate of return on assets assumptions annually on a plan and country specific basis. We evaluate other assumptions related to demographic factors, such as retirement age, mortality and turnover periodically, and update them to reflect our experience and expectations for the future.

In developing the expected return on U.S. Qualified Pension Plan (“U.S. Plan”) assets assumption, we evaluated input from our investment manager and pension consultants, including their forecast of asset class return expectations. We believe that 4.65% was an appropriate rate of return on assets to use for 2024. The December 31, 2024 asset allocation for our U.S. Plan was 94% invested in fixed income securities, 5% invested in equity securities, and 1% invested in other securities. Our investment manager regularly reviews the actual asset allocation and periodically rebalances the portfolio to ensure alignment with our target allocations.

The discount rate that we utilized for determining future pension obligations for the U.S. Plan is based on the FTSE Pension Index adjusted for the U.S. Plan’s expected cash flows and was 5.45% at December 31, 2024, up from 4.75% at December 31, 2023. We estimate that in 2025 we will recognize approximately \$0.1 million of pension expense for the U.S. Plan. The U.S. Plan pension expense estimate for 2025 is based on a 5.45% discount rate and a 5.05% return on assets. Future pension expense or income will depend on future investment performance, changes in future discount rates and various other factors related to the employee population participating in our pension plans.

Goodwill, Intangible and Long-Lived Assets

We assess goodwill for impairment at least annually in the fourth quarter, as of December 31, on a reporting unit basis, or more frequently, when events and circumstances occur indicating that the recorded goodwill may be impaired. We review intangible and long-lived assets for impairment whenever events or changes in business circumstances indicate that the carrying amount of the assets may not be fully recoverable or that the useful lives of these assets are no longer appropriate. Goodwill impairment will be the amount by which a reporting unit’s carrying value exceeds its fair value, not to exceed the carrying amount of goodwill. Impairment of intangible and long-lived assets would result in the asset being written down to its estimated fair value. The calculated fair value of a reporting unit or intangible or long-lived asset is dependent upon discounted cash flow (“DCF”) models, discount rates, and market multiples. DCF models rely on our forecasted mid-term plans which are subjective based on customer or market conditions and can change materially. We utilize third party specialists when determining discount rates and selected market multiples. A change in any of these key assumptions could result in a reporting unit, intangible asset, or long-lived asset being impaired in a future period.

Convertible Debt

We adopted Accounting Standards Update (“ASU”) ASU 2020-06 – “Debt—Debt with Conversion and Other Options and Derivatives and Hedging—Contracts in Entity’s Own Equity,” on January 1, 2022 using the modified retrospective method of adoption. In accordance with ASU 2020-06, we account for a convertible debt instrument as a single liability measured at its amortized cost, as long as no other features require bifurcation and recognition as derivatives. Unsettled shares are recorded in current debt, and there is no recognition of a debt discount, which was previously amortized to interest expense. Settled shares reduce the outstanding debt balance in an amount equal to the cash paid, but do not result in any gain or loss on extinguishment. We use the if-converted method in the diluted EPS calculation for convertible instruments.

Income Taxes

Deferred tax assets and liabilities are determined based on differences between financial reporting and tax basis of assets and liabilities and are measured using the enacted tax rates and laws that will be in effect when the differences are expected to reverse. The measurement of deferred tax assets is reduced by a valuation allowance if it is more likely than not that some or all of the deferred tax assets will not be realized. Evaluating the positive and negative evidence regarding the realization of the net deferred tax assets in accordance with ASC 740, “Accounting for Income Taxes” is a key judgment in the valuation of income taxes. This assessment included the evaluation of scheduled reversals of deferred tax liabilities, estimates of projected future taxable income and tax-planning strategies. Although realization is not assured, based on our assessment, we concluded that it is more likely than not that such assets, net of the existing valuation allowance, will be realized.

Results of Operations

Information pertaining to fiscal year 2022 results of operations, including a year-to-year comparison against fiscal year 2023, was included in our Annual Report on Form 10-K for the year ended December 31, 2023 under Part II, Item 7, “Management’s Discussion and Analysis of Financial Position and Results of Operations,” which was filed with the SEC on February 22, 2024. This information is incorporated by reference herein.

The following table sets forth the percentage of total net revenues included in our consolidated statements of operations:

	Years Ended December 31,	
	2024	2023
Percentage of revenues:		
Revenues:		
Products	81.4 %	78.3 %
Services	18.6	21.7
Total revenues	100.0	100.0
Cost of revenues:		
Cost of products	34.1	33.0
Cost of services	7.4	9.6
Total cost of revenues (exclusive of acquired intangible assets amortization shown separately below)	41.5	42.6
Gross profit	58.5	57.4
Operating expenses:		
Selling and administrative	21.9	21.6
Engineering and development	16.3	15.6
Acquired intangible assets amortization	0.7	0.7
Restructuring and other	0.6	0.8
Gain on sale of business	(2.0)	0.0
Total operating expenses	37.4	38.7
Income from operations	21.1	18.7
Non-operating (income) expenses:		
Interest income	(0.9)	(1.0)
Interest expense	0.1	0.1
Other (income) expense, net	0.2	(0.0)
Income before income taxes and equity in net earnings of affiliate	21.6	19.6
Income tax provision	2.1	2.9
Income before equity in net earnings of affiliate	19.5	16.8
Equity in net earnings of affiliate	(0.3)	0.0
Net income	19.2 %	16.8 %

Revenues

Revenues for our reportable segments were as follows:

	2024	2023	2023-2024 Dollar Change
	(in millions)		
Semiconductor Test	\$ 2,123.9	\$ 1,957.2	\$ 166.7
Robotics	364.8	375.2	(10.4)
All Other	331.1	343.9	(12.8)
	<u>\$ 2,819.9</u>	<u>\$ 2,676.3</u>	<u>\$ 143.5</u>

The increase in Semiconductor Test revenues of \$166.7 million, or 8.5%, was driven primarily by higher tester sales for computing, ADAS, and memory applications, partially offset by lower tester sales for legacy automotive applications. The decrease in Robotics revenues of \$10.4 million, or 2.8%, was driven primarily by continued weakness in the Industrial Automation market and softer sales in Universal Robots.

Our reportable segments accounted for the following percentages of consolidated revenues:

	2024	2023
Semiconductor Test	75 %	73 %
Robotics	13	14
All Other	12	13
	<u>100 %</u>	<u>100 %</u>

Revenues by country as a percentage of total revenues were as follows (1):

	2024	2023
Korea	25 %	15 %
Taiwan	21	14
United States	13	16
China	13	12
Europe	9	10
Japan	6	11
Singapore	3	4
Philippines	2	7
Thailand	2	3
Malaysia	2	3
Rest of the World	4	5
	<u>100 %</u>	<u>100 %</u>

(1) Revenues attributable to a country are based on the location of the customer site.

The breakout of product and service revenues was as follows:

	2024	2023 (in millions)	2023-2024 Dollar Change
Product revenues	\$ 2,294.9	\$ 2,096.3	\$ 198.6
Service revenues	524.9	580.0	(55.1)
	<u>\$ 2,819.9</u>	<u>\$ 2,676.3</u>	<u>\$ 143.5</u>

Our product revenues increased \$198.6 million, or 9.5%, primarily driven by higher tester sales for computing, ADAS, and memory applications, partially offset by lower tester sales for legacy automotive application. Our service revenues decreased \$55.1 million, or 9.5%, primarily in Semiconductor Test related to the sale of the DIS business on May 27, 2024.

In 2024, revenues from Samsung, a customer of our Semiconductor Test segment, accounted for 12.5% of our consolidated revenues. In 2023, revenues from Texas Instruments Inc., a customer of our Semiconductor Test segment, accounted for 10% of our consolidated revenues. In 2024 and 2023, our five largest direct customers in aggregate accounted for 36% and 32% of our consolidated revenues, respectively.

Gross Profit

	2024	2023 (in millions)	2023-2024 Dollar / Point Change
Gross profit	\$ 1,648.9	\$ 1,536.7	\$ 112.2
Percent of total revenues	58.5 %	57.4 %	1.1

Gross profit as a percent of total revenues increased by 1.1 points, primarily due to a higher volume and product and service mix.

The breakout of product and service gross profit was as follows:

	2024	2023 (in millions)	2023-2024 Dollar / Point Change
Product gross profit	\$ 1,334.0	\$ 1,213.4	\$ 120.6
Percent of product revenues	58.1 %	57.9 %	0.2
Service gross profit	\$ 314.9	\$ 323.4	\$ (8.5)
Percent of service revenues	60.0 %	55.7 %	4.3

Service and product revenues gross profit percentage increased by 4.3 points and 0.2 points, respectively, primarily due to higher volume and product and service mix.

We assess the carrying value of our inventory on a quarterly basis by estimating future demand and comparing that demand against on-hand and on-order inventory positions. Forecasted revenues information is obtained from the sales and marketing groups and incorporates factors such as backlog and future revenues. This quarterly process identifies obsolete and excess inventory. Obsolete inventory, which represents items for which there is no demand, is fully reserved. Excess inventory, which represents inventory items that are not expected to be consumed within the forecasted demand window, is written down to estimated net realizable value.

During the year ended December 31, 2024, we recorded an inventory provision of \$18.9 million included in cost of revenues, primarily due to downward revisions to previously forecasted demand levels for certain products. Of the \$18.9 million of total excess and obsolete provisions, \$13.6 million was related to Semiconductor Test, \$2.3 million was related to Robotics, and \$3.1 million was related to All Other.

During the year ended December 31, 2023, we recorded an inventory provision of \$28.4 million included in cost of revenues, primarily due to downward revisions to previously forecasted demand levels for certain products. Of the \$28.4 million of total excess and obsolete provisions, \$22.5 million was related to Semiconductor Test, \$2.3 million was related to Robotics, and \$3.6 million was related to All Other.

During the years ended December 31, 2024 and 2023, we scrapped \$10.6 million and \$26.4 million of inventory, respectively, and sold \$2.2 million and \$5.2 million of previously written-down or written-off inventory, respectively. As of December 31, 2024, we had inventory related reserves for amounts which had been written-down or written-off totaling \$141.4 million. We have no pre-determined timeline to scrap the remaining inventory.

Selling and Administrative

Selling and administrative expenses were as follows:

	2024	2023 (in millions)	2023-2024 Change
Selling and administrative	\$ 617.0	\$ 577.3	\$ 39.7
Percent of total revenues	21.9 %	21.6 %	

The increase of \$39.7 million in selling and administrative expenses was primarily due to higher sales and marketing spending in Semiconductor Test.

Engineering and Development

Engineering and development expenses were as follows:

	2024	2023 (in millions)	2023-2024 Change
Engineering and development	\$ 460.9	\$ 418.1	\$ 42.8
Percent of total revenues	16.3 %	15.6 %	

The increase of \$42.8 million in engineering and development expenses was primarily due to higher spending in Semiconductor Test.

Restructuring and Other

During the year ended December 31, 2024, we recorded \$5.2 million of severance charges related to headcount reductions of 98 people primarily in Robotics and Semiconductor Test, which included charges related to a voluntary early retirement program for employees meeting certain conditions, \$3.6 million of acquisition and divestiture expenses, and \$1.3 million of charges related to lease terminations.

During the year ended December 31, 2023, we recorded a charge of \$14.7 million of severance charges related to headcount reductions of 215 people primarily in Semiconductor Test and Robotics, which included charges related to a voluntary early retirement program for employees meeting certain conditions, \$3.1 million of acquisition and divestiture expenses related to the Technoprobe transaction, a \$1.5 million contract termination charge, and a charge of \$1.1 million for an increase in environmental liabilities.

Interest and Other

	2024	2023 (in millions)	2023-2024 Change
Interest income	\$ (24.8)	\$ (27.3)	\$ 2.5
Interest expense	3.6	3.8	(0.2)
Other (income) expense, net	5.9	(1.0)	6.8

Other (income) expense, net decreased by \$6.8 million primarily due to \$9.8 million loss on our call option in connection with our agreement to acquire a 10% investment in Technoprobe S.p.A, partially offset by the change in pension actuarial gains/losses, from a \$2.7 million loss in 2023 to a \$4.4 million gain in 2024.

Income (Loss) Before Income Taxes

	2024	2023 (in millions)	2023-2024 Change
Semiconductor Test	\$ 558.2	\$ 498.5	\$ 59.7
Robotics	(77.6)	(54.3)	(23.3)
All Other	65.7	79.5	(13.8)
Corporate and Eliminations (1)	62.7	1.9	60.8
	<u>\$ 609.1</u>	<u>\$ 525.6</u>	<u>\$ 83.5</u>

(1) Included in Corporate and Eliminations are gain on sale of business, interest income, interest expense, net foreign exchange gains (losses), intercompany eliminations, severance charges, pension and postretirement plan actuarial gains (losses), acquisition and divestiture related fees, legal and environmental fees, contract termination settlement charge, and modification of outstanding equity awards.

The increase in income before income taxes in Semiconductor Test was driven primarily by higher tester sales for computing, ADAS, and memory applications, partially offset by lower tester sales for legacy automotive application. The decrease in income before income taxes in Robotics was primarily driven by continued weakness in the Industrial Automation market and softer sales in Universal Robots along with higher selling and administrative costs. The decrease in income before income taxes in All Other was driven primarily by a decrease in sales of Wireless Test products.

Income Taxes

Income tax expense for 2024 and 2023 totaled \$59.5 million and \$76.8 million, respectively. The effective tax rate for 2024 and 2023 was 9.8% and 14.6%, respectively.

The decrease in the effective tax rate from 2023 to 2024 is primarily attributable to a shift in the geographic distribution of income which resulted in a reduction in income in higher tax rate foreign jurisdictions, the benefit of the release of reserves for uncertain tax positions as a result of the expiration of statute and a decrease in non-deductible officer's compensation. These decreases in expense were partially offset by reductions in benefits from foreign tax credits, U.S research and development credits and the U.S. foreign derived intangible income deduction.

We qualify for a tax holiday in Singapore by fulfilling the requirements of an agreement with the Singapore Economic Development Board under which certain headcount and spending requirements must be met. The tax savings attributable to the Singapore tax holiday for the years ended December 31, 2024 and 2023 were \$17.1 million or \$0.10 per diluted share and \$1.4 million or \$0.01 per diluted share, respectively. In November 2020, we entered into an agreement with the Singapore Economic Development Board which extended our Singapore tax holiday under substantially similar terms to the agreement which expired on December 31, 2020. The new tax holiday is scheduled to expire on December 31, 2025.

Capital Resources and Material Cash Requirements

Our cash, cash equivalents and marketable securities balance decreased by \$213.4 million in 2024 to \$723.8 million. Cash decreased due to investments in businesses for \$532.1 million, stock repurchases in the amount of \$198.6 million, and quarterly cash dividend payments in the amount of \$76.4 million, partially offset by proceeds from the sale of business and cash generated by our global operations.

Operating activities during 2024 provided cash of \$672.2 million. Changes in operating assets and liabilities used cash of \$23.9 million. This was due to a \$75.5 million decrease in operating assets and a \$51.6 million decrease in operating liabilities.

The decrease in operating assets was primarily due to a decrease in other assets and inventory of \$119.5 million and \$8.7 million respectively, partially offset by a \$52.7 million increase in accounts receivable, driven by higher sales at year-end.

The decrease in operating liabilities was due to a \$48.2 million decrease in accounts payable, a \$6.2 million decrease in other accrued compensation, \$5.8 million of retirement plan contributions, and a \$3.6 million decrease in income taxes, partially offset by a \$12.2 million increase in deferred revenue and customer advance payments.

Investing activities during 2024 used cash of \$622.3 million, comprised of \$532.1 million used for investments in businesses, \$198.1 million used for purchases of property, plant and equipment, and \$45.8 million used for purchases of marketable securities, partially offset by \$90.3 million in proceeds from the sale of a business, \$38.4 million and \$24.0 million in proceeds from the maturities and sales of marketable securities, respectively, and \$0.9 million in proceeds from life insurance.

Financing activities during 2024 used cash of \$251.8 million, due to \$198.6 million used for the repurchase of 1.7 million shares of common stock at an average price of \$114.63 per share, \$76.4 million used for dividend payments, and \$14.1 million used for payments related to net settlement of employee stock compensation awards, partially offset by \$37.3 million from the issuance of common stock under employee stock purchase and stock option plans.

Operating activities during 2023 provided cash of \$585.2 million. Changes in operating assets and liabilities used cash of \$9.6 million. This was due to a \$33.2 million decrease in operating assets and a \$42.8 million decrease in operating liabilities.

The decrease in operating assets was due to a \$71.0 million decrease in accounts receivable due to lower sales and a \$5.3 million decrease in inventories, partially offset by a \$43.1 million increase in prepayments and other assets due to prepayments to our contract manufacturers.

The decrease in operating liabilities was due to a \$57.2 million decrease in deferred revenue and customer advance payments, a \$26.9 million decrease in income taxes, a \$21.2 million decrease in accrued employee compensation, and \$5.5 million of retirement plan contributions, partially offset by a \$45.0 million increase in accounts payable, and a \$23.0 million increase in other accrued liabilities.

Investing activities during 2023 used cash of \$179.6 million, due to \$161.9 million used for purchases of marketable securities, \$159.6 million used for purchases of property, plant and equipment, and \$5.0 million used for issuance of convertible loans, partially offset by \$85.0 million and \$61.4 million in proceeds from maturities and sales of marketable securities, respectively, and \$0.5 million in proceeds from the cancellation of Teradyne owned life insurance policies related to the cash surrender value.

Financing activities during 2023 used cash of \$501.9 million, due to \$397.2 million used for the repurchase of 3.9 million shares of common stock at an average price of \$102.47 per share, \$67.9 million used for dividend payments, \$50.3 million used for the

payments of convertible debt principal, and \$20.8 million used for payments related to net settlement of employee stock compensation awards, partially offset by \$34.3 million from the issuance of common stock under employee stock purchase and stock option plans.

In January 2024, May 2024, August 2024 and November 2024, our Board of Directors declared a quarterly cash dividend of \$0.12 per share. Total dividend payments in 2024 were \$76.4 million. In January 2023, May 2023, August 2023 and November 2023, our Board of Directors declared a quarterly cash dividend of \$0.11 per share. Total dividend payments in 2023 were \$67.9 million.

In January 2023, our Board of Directors cancelled the 2021 repurchase program and approved a new repurchase program for up to \$2.0 billion of common stock. In 2024, we repurchased 1.7 million shares of common stock for \$198.6 million, which excludes related excise tax, at an average price of \$114.63 per share. In 2023, we repurchased 3.9 million shares of common stock for \$397.2 million, which excludes related excise tax, at an average price of \$102.47 per share against the 2023 repurchase program. The cumulative repurchases as of December 31, 2024, under the 2023 repurchase program, were 5.6 million shares of common stock for \$595.2 million, exclusive of tax, at an average price per share of \$106.21. In 2025, we intend to repurchase up to \$400.0 million.

While we declared a quarterly cash dividend and authorized a share repurchase program, we may reduce or eliminate the cash dividend or share repurchase program in the future. Future cash dividends and stock repurchases are subject to the discretion of our Board of Directors, which will consider, among other things, our earnings, capital requirements and financial condition.

On May 27, 2024, we paid 483.1 million Euros, equivalent to \$524.1 million, to purchase a combination of previously issued and outstanding shares and shares newly issued by Technoprobe, S.p.A. ("Technoprobe"). The shares purchased represent 10% of the issued and outstanding shares of Technoprobe. We also received a board seat as part of the purchase. Additionally, as part of the transaction, we completed the sale of the Device Interface Solutions ("DIS") business, a component of the Semiconductor Test segment, to Technoprobe for \$85.0 million in cash, net of cash and cash equivalents sold, and a customary working capital adjustment. The sale resulted in a pre-tax gain of \$57.1 million recorded as 'Gain on sale of business' in the consolidated statement of operations.

On May 1, 2020, we entered into a credit agreement providing a three-year, senior secured revolving credit facility of \$400 million. On December 10, 2021, the credit agreement was amended to extend the senior secured revolving credit facility to December 10, 2026. On October 5, 2022, the credit agreement was amended to increase the amount of the credit facility to \$750.0 million from \$400.0 million. On November 7, 2023, the Credit Agreement was amended to allow for the purchase of the shares of Technoprobe. On May 16, 2024, we borrowed \$185.0 million under the credit agreement to partially fund the acquisition of 10% of the issued and outstanding shares of Technoprobe. We fully repaid our borrowings on the revolving credit facility prior to December 31, 2024. As of February 20, 2025, there are no outstanding borrowings under the credit facility.

We expect operations to continue to be the primary source of cash to operate the business and meet material cash commitments, including any payments of convertible debt principal, our stock repurchase program, our quarterly dividends, our office lease obligations, contractual obligations related to inventory purchases and the construction of new facilities. We believe our cash, cash equivalents and marketable securities balance will be sufficient to pay our quarterly dividend and meet our working capital and expenditure needs for at least the next twelve months. Inflation has not had a significant long-term impact on earnings.

At December 31, 2024, our future contractual obligations were related to debt, leases, retirement plan liabilities, deferred tax benefits, and purchase obligations. See Note K. "Debt", Note J. "Leases", Note Q. "Retirement Plans", and Note T. "Income Taxes" of Notes to Consolidated Financial Statements in this Annual Report for information about those obligations, which Notes are incorporated by reference into this section. Our purchase obligations were approximately \$419.8 million, with \$409.6 million expected to be paid within twelve months.

Retirement Plans

ASC 715-20, "*Compensation—Retirement Benefits—Defined Benefit Plans*," requires an employer with defined benefit plans or other postretirement benefit plans to recognize an asset or a liability on its balance sheet for the overfunded or underfunded status of the plans as defined by ASC 715-20. The pension asset or liability represents the difference between the fair value of the pension plans' assets and the projected benefit obligation as of December 31. For other postretirement benefit plans, the liability is the difference between the fair value of the plan's assets and the accumulated postretirement benefit obligation as of December 31.

For the year ended December 31, 2024, our pension expense, which includes the U.S. Qualified Pension Plan ("U.S. Plan"), certain qualified plans for non-U.S. subsidiaries, and a U.S. Supplemental Executive Defined Benefit Plan, was approximately \$0.1 million. Pension expense is calculated based upon a number of actuarial assumptions. Discount rate and expected return on assets are two assumptions which are important elements of pension plan expense and asset/liability measurement. We evaluate our discount rate and expected rate of return on assets assumptions annually on a plan and country specific basis. We evaluate other assumptions related

to demographic factors, such as retirement age, mortality and turnover periodically, and update them to reflect our experience and expectations for the future.

In developing the expected return on U.S. Plan assets assumption, we evaluated input from our investment manager and pension consultants, including their forecast of asset class return expectations. We believe that 4.65% was an appropriate rate of return on assets to use for 2024. The December 31, 2024 asset allocation for our U.S. Plan was 94.0% invested in fixed income securities, 5% invested in equity securities, and 1% invested in other securities. Our investment manager regularly reviews the actual asset allocation and periodically rebalances the portfolio to ensure alignment with our target allocations.

We recognize net actuarial gains and losses and the change in the fair value of plan assets in our operating results in the year in which they occur or upon any interim remeasurement of the plans. We calculate the expected return on plan assets using the fair value of the plan assets. Actuarial gains and losses are generally measured annually as of December 31 and, accordingly, recorded during the fourth quarter of each year or upon any interim remeasurement of the plans.

The discount rate that we utilized for determining future pension obligations for the U.S. Plan is based on the FTSE Pension Index adjusted for the U.S. Plan's expected cash flows and was 5.45% at December 31, 2024, up from 4.75% at December 31, 2023. We estimate that in 2025, we will recognize approximately \$0.1 million of pension expense for the U.S. Plan. The U.S. Plan pension expense estimate for 2025 is based on a 5.45% discount rate and a 5.05% return on assets. Future pension expense or income will depend on future investment performance, changes in future discount rates and various other factors related to the employee population participating in our pension plans.

As of December 31, 2024, our pension plans had no unrecognized pension prior service cost.

The assets of the U.S. Plan consist substantially of fixed income securities. U.S. Plan assets have decreased from \$112.6 million at December 31, 2023 to \$81.4 million at December 31, 2024, while the U.S. Plan's liability decreased from \$101.1 million at December 31, 2023 to \$69.4 million at December 31, 2024.

Our funding policy is to make contributions to our pension plans in accordance with local laws and to the extent that such contributions are tax deductible. During 2024, we made contributions of \$3.1 million to the U.S. supplemental executive defined benefit pension plan, and \$1.0 million to certain qualified plans for non-U.S. subsidiaries. In 2025, we expect to contribute approximately \$3.3 million to the U.S. supplemental executive defined benefit pension plan. Contributions to be made in 2025 to certain qualified plans for non-U.S. subsidiaries are based on local statutory requirements and are estimated at approximately \$1.1 million.

Equity Compensation Plans

In addition to our 1996 Employee Stock Purchase Plan discussed in Note R: "Stock-Based Compensation" in Notes to Consolidated Financial Statements, we have a 2006 Equity and Cash Compensation Incentive Plan (the "2006 Equity Plan") under which equity securities are authorized for issuance. The 2006 Equity Plan was initially approved by stockholders on May 25, 2006.

At our annual meeting of stockholders held May 21, 2013, our stockholders approved an amendment to the 2006 Equity Plan to increase the number of shares issuable thereunder by 10.0 million, for an aggregate of 32.0 million shares issuable thereunder, and our stockholders also approved an amendment to our 1996 Employee Stock Purchase Plan to increase the number of shares issuable thereunder by 5.0 million, for an aggregate of 30.4 million shares issuable thereunder. At our annual meeting of stockholders held May 12, 2015, our stockholders approved an amendment to the 2006 Equity Plan to extend its term until May 12, 2025. At our annual meeting of stockholders held May 7, 2021, our stockholders approved an amendment to our 1996 Employee Stock Purchase Plan to increase the number of shares issuable thereunder by 3.0 million, for an aggregate of 33.4 million shares issuable thereunder.

The following table presents information about these plans as of December 31, 2024 (share numbers in thousands):

<u>Plan category</u>	<u>Number of securities to be issued upon exercise of outstanding options, warrants and rights</u>	<u>Weighted-average exercise price of outstanding options, warrants and rights</u>	<u>Number of securities remaining available for future issuance under equity compensation plans (excluding securities reflected in column one)</u>
Equity plans approved by shareholders	1,668 (1)	\$ 99.51	6,862 (2)

(1) Includes 1,527,351 shares of restricted stock units that are not included in the calculation of the weighted average exercise price.

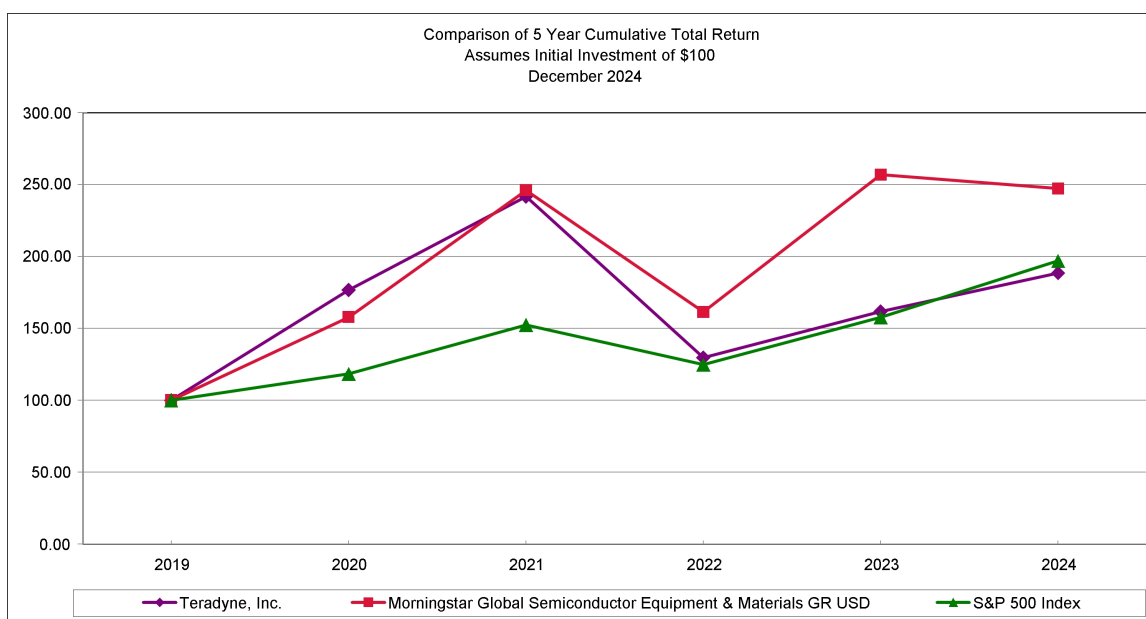
- (2) Consists of 3,638,237 securities available for issuance under the 2006 Equity Plan and 3,224,044 of securities available for issuance under the Employee Stock Purchase Plan.

The purpose of the 2006 Equity Plan is to motivate employees, officers and directors by providing equity ownership and compensation opportunities in Teradyne. The aggregate number of shares available under the 2006 Equity Plan as of December 31, 2024 was 3,638,237 shares of our common stock. The 2006 Equity Plan authorizes the grant of stock-based awards in the form of (1) non-qualified and incentive stock options, (2) stock appreciation rights, (3) restricted stock awards and restricted stock unit awards, (4) phantom stock, and (5) other stock-based awards. Awards may be tied to time-based vesting schedules and/or performance-based vesting measured by reference to performance criteria chosen by the Compensation Committee of the Board of Directors, which administers the 2006 Equity Plan. Awards may be made to any employee, officer, consultant and advisor of Teradyne and our subsidiaries, as well as to our directors. The maximum number of shares of stock-based awards that may be granted to one participant during any one fiscal year is 2,000,000 shares of common stock.

As of December 31, 2024, total unrecognized compensation expense related to non-vested restricted stock units and options was \$82.6 million and is expected to be recognized over a weighted average period of 2.5 years.

Performance Graph

The following graph compares the change in our cumulative total shareholder return in our common stock with (i) the Standard & Poor’s 500 Index and (ii) the Morningstar Global Semiconductor Equipment & Materials GR USD Industry Group. The comparison assumes \$100.00 was invested on December 31, 2019 in our common stock and in each of the foregoing indices and assumes reinvestment of dividends, if any. Historic stock price performance is not necessarily indicative of future price performance.



Recently Issued Accounting Pronouncements

In November 2023, the Financial Accounting Standards Board ("FASB") issued Accounting Standard Update ("ASU") No. 2023-07, "Segment Reporting (Topic 280): Improvements to Reportable Segment Disclosures", which requires us to disclose significant segment expenses and other segment items used by the Chief Operating Decision Maker ("CODM") on an annual and interim basis as well as provide in interim periods all disclosures about a reportable segment’s profit or loss and assets that are currently required annually. Additionally, we are required to disclose the title and position of the CODM. We retrospectively adopted and complied with this standard for the annual period ending December 31, 2024. See Note U: "Segment, Geographic and Significant Customer Information." The adoption of this standard had no impact on our results of operations, cash flows or financial condition.

In December 2023, the FASB issued ASU 2023-09 – “*Income Taxes (Topic 740): Improvements to Income Tax Disclosures*”, which requires expanded disclosures relating to the tax rate reconciliation, income taxes paid, income (loss) before income tax expense (benefit) and income tax expense (benefit), requiring a greater disaggregation of information for each. The provisions of ASU 2023-09 are effective for fiscal years beginning after December 15, 2024. The amendments in this update should be applied on a prospective basis, but retrospective application is permitted. We are currently evaluating the impact of this new standard.

In November 2024, the FASB issued ASU 2024-03- “*Income Statement - Reporting Comprehensive Income -Expense Disaggregation Disclosures (Subtopic 220-40): Disaggregation of Income Statement Expenses*”, which requires disclosure of additional expense information on an annual and interim basis, including the amounts of inventory purchases, employee compensation, depreciation and intangible amortization included within each income statement expense caption. This standard is effective for fiscal years beginning after December 15, 2026, and interim periods within fiscal years beginning after December 15, 2027, with early adoption permitted. The amendments in this update should be applied on a prospective basis, but retrospective application is permitted. We are currently evaluating the impact of this new standard.

Item 7A: Quantitative and Qualitative Disclosures about Market Risks

Concentration of Credit Risk

Financial instruments which potentially subject us to concentrations of credit risk consist principally of cash equivalents, marketable securities, forward currency contracts and accounts receivable. Our cash equivalents consist primarily of money market funds invested in U.S. Treasuries and government agencies. Our fixed income available-for-sale marketable securities have a minimum rating of AA by one or more of the major credit rating agencies. We place forward currency contracts with high credit-quality financial institutions in order to minimize credit risk exposure. Concentrations of credit risk with respect to accounts receivable are limited due to the large number of geographically dispersed customers. We perform ongoing credit evaluations of our customers’ financial condition and from time to time may require customers to provide a letter of credit from a bank to secure accounts receivable. As of December 31, 2024, two customers of our Semiconductor Test segment, Taiwan Semiconductor Manufacturing Co. and SK Hynix Inc, each accounted for 10% of our accounts receivable balance. As of December 31, 2023, a customer of our Semiconductor Test segment, Texas Instruments Inc., accounted for 18% of our accounts receivable balance.

Exchange Rate Risk Management

We regularly enter into foreign currency forward contracts to hedge the value of our monetary assets and liabilities in Japanese Yen, British Pound, Korean Won, Taiwan Dollar, Singapore Dollar, Euro, Philippine Peso, Chinese Yuan, and Danish Krone. These foreign currency forward contracts have maturities of approximately one month. These contracts are used to minimize the effect of exchange rate fluctuations associated with the remeasurement of monetary assets and liabilities.

We also enter into foreign currency forward contracts to hedge the impact of exchange rates on our revenues in Japanese Yen. These contracts have maturities of less than one year. We do not engage in currency speculation.

On November 7, 2023, in connection with our agreement to acquire 10% investment in Technoprobe S.p.A, we purchased a call option to buy 481.0 million Euros, which expired in April 2024. On April 12, 2024, we entered into a forward to buy 481.0 million Euros, which expired on May 23, 2024.

We performed a sensitivity analysis assuming a hypothetical 10% fluctuation in foreign exchange rates to the hedging contracts and the underlying exposures described above. As of December 31, 2024 and 2023, the analysis indicated that these hypothetical market movements would not have a material effect on our consolidated financial position, results of operations or cash flows.

Interest Rate Risk Management

We are exposed to potential losses due to changes in interest rates. Our interest rate exposure is primarily related to short-term and long-term marketable securities.

In order to estimate the potential loss due to interest rate risk, a fluctuation in interest rates of 25 basis points was assumed. Market risk for the short and long-term marketable securities was estimated as the potential change in the fair value resulting from a hypothetical change in interest rates for securities contained in the investment portfolio. The potential change in the fair value from changes in interest rates is immaterial as of December 31, 2024 and 2023.

Item 8: Financial Statements and Supplementary Data

Report of Independent Registered Public Accounting Firm

To the Board of Directors and Shareholders of Teradyne, Inc.

Opinions on the Financial Statements and Internal Control over Financial Reporting

We have audited the accompanying consolidated balance sheets of Teradyne, Inc. and its subsidiaries (the "Company") as of December 31, 2024 and 2023, and the related consolidated statements of operations, of comprehensive income, of convertible common shares and shareholders' equity and of cash flows for each of the three years in the period ended December 31, 2024, including the related notes and schedule of valuation and qualifying accounts for each of the three years in the period ended December 31, 2024 appearing under Item 15(c) (collectively referred to as the "consolidated financial statements"). We also have audited the Company's internal control over financial reporting as of December 31, 2024, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO).

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the financial position of the Company as of December 31, 2024 and 2023, and the results of its operations and its cash flows for each of the three years in the period ended December 31, 2024 in conformity with accounting principles generally accepted in the United States of America. Also in our opinion, the Company maintained, in all material respects, effective internal control over financial reporting as of December 31, 2024, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the COSO.

Change in Accounting Principle

As discussed in Note B to the consolidated financial statements, the Company changed the manner in which it accounts for convertible debt in 2022.

Basis for Opinions

The Company's management is responsible for these consolidated financial statements, for maintaining effective internal control over financial reporting, and for its assessment of the effectiveness of internal control over financial reporting, included in Management's Annual Report on Internal Control over Financial Reporting appearing under Item 9A. Our responsibility is to express opinions on the Company's consolidated financial statements and on the Company's internal control over financial reporting based on our audits. We are a public accounting firm registered with the Public Company Accounting Oversight Board (United States) (PCAOB) and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audits in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audits to obtain reasonable assurance about whether the consolidated financial statements are free of material misstatement, whether due to error or fraud, and whether effective internal control over financial reporting was maintained in all material respects.

Our audits of the consolidated financial statements included performing procedures to assess the risks of material misstatement of the consolidated financial statements, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the consolidated financial statements. Our audits also included evaluating the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of the consolidated financial statements. Our audit of internal control over financial reporting included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, and testing and evaluating the design and operating effectiveness of internal control based on the assessed risk. Our audits also included performing such other procedures as we considered necessary in the circumstances. We believe that our audits provide a reasonable basis for our opinions.

Definition and Limitations of Internal Control over Financial Reporting

A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. A company's internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (ii) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the company are being made only in

accordance with authorizations of management and directors of the company; and (iii) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Critical Audit Matters

The critical audit matter communicated below is a matter arising from the current period audit of the consolidated financial statements that was communicated or required to be communicated to the audit committee and that (i) relates to accounts or disclosures that are material to the consolidated financial statements and (ii) involved our especially challenging, subjective, or complex judgments. The communication of critical audit matters does not alter in any way our opinion on the consolidated financial statements, taken as a whole, and we are not, by communicating the critical audit matter below, providing a separate opinion on the critical audit matter or on the accounts or disclosures to which it relates.

Revenue Recognition - Certain Product Revenue

As described in Note B to the consolidated financial statements, the Company recognizes revenue for transactions that do not meet the criteria for over time recognition, at a point in time when shipped or delivered based on contractual terms. The transaction price is the amount of consideration the Company expects to be entitled to in exchange for such products, which is generally at contractually stated prices. The Company's total product revenue was \$2.3 billion for the year ended December 31, 2024, of which a majority relates to certain product revenue.

The principal consideration for our determination that performing procedures relating to revenue recognition for certain product revenue is a critical audit matter is a high degree of auditor effort in performing procedures related to revenue recognition for certain of the Company's product revenue.

Addressing the matter involved performing procedures and evaluating audit evidence in connection with forming our overall opinion on the consolidated financial statements. These procedures included testing the effectiveness of controls relating to the recognition process for certain product revenue. These procedures also included, among others (i) testing the revenue recognized for a sample of certain product revenue transactions by obtaining and inspecting source documents, such as purchase orders, invoices, and proof of shipment or delivery; (ii) testing the timing of revenue recognized for a sample of certain product revenue transactions that occurred near period end by obtaining and inspecting source documents, such as purchase orders, invoices, and proof of shipment or delivery; and (iii) testing a sample of outstanding customer invoice balances as of December 31, 2024 by obtaining and inspecting source documents, such as purchase orders, invoices, proof of shipment or delivery, and subsequent cash receipts.

/s/ PricewaterhouseCoopers LLP
Boston, Massachusetts
February 20, 2025

We have served as the Company's auditor since 1968.

TERADYNE, INC.
CONSOLIDATED BALANCE SHEETS

	December 31,	
	2024	2023
(in thousands, except per share amount)		
ASSETS		
Current assets:		
Cash and cash equivalents	\$ 553,354	\$ 757,571
Marketable securities	46,312	62,154
Accounts receivable, less allowance for credit losses of \$2,111 and \$1,988 in 2024 and 2023, respectively	471,426	422,124
Inventories, net	298,492	309,974
Prepayments	429,086	548,970
Other current assets	17,727	37,992
Current assets held for sale	—	23,250
Total current assets	<u>1,816,397</u>	<u>2,162,035</u>
Property, plant and equipment, net	508,171	445,492
Operating lease right-of-use assets, net	70,185	73,417
Marketable securities	124,121	117,434
Deferred tax assets	222,438	175,775
Retirement plans assets	11,994	11,504
Equity Method Investment	494,494	—
Other assets	49,620	38,580
Acquired intangible assets, net	15,927	35,404
Goodwill	395,367	415,652
Long-term assets held for sale	—	11,531
Total assets	<u>\$ 3,708,714</u>	<u>\$ 3,486,824</u>
LIABILITIES		
Current liabilities:		
Accounts payable	\$ 134,792	\$ 180,131
Accrued employees' compensation and withholdings	204,991	191,750
Deferred revenue and customer advances	107,710	99,804
Other accrued liabilities	90,777	114,712
Operating lease liabilities	18,699	17,522
Income taxes payable	67,610	48,653
Current liabilities held for sale	—	7,379
Total current liabilities	<u>624,579</u>	<u>659,951</u>
Retirement plans liabilities	133,338	132,090
Long-term deferred revenue and customer advances	40,505	37,282
Deferred tax liabilities	1,038	183
Long-term other accrued liabilities	7,442	19,998
Long-term operating lease liabilities	57,922	65,092
Long-term income taxes payable	24,596	44,331
Long-term liabilities held for sale	—	2,000
Total liabilities	<u>889,420</u>	<u>960,927</u>
Commitments and contingencies (Note N)		
SHAREHOLDERS' EQUITY		
Common stock, \$0.125 par value, 1,000,000 shares authorized, 161,722 and 152,698 shares issued and outstanding at December 31, 2024 and 2023, respectively	20,215	19,087
Additional paid-in capital	1,909,538	1,827,274
Accumulated other comprehensive loss	(81,220)	(26,978)
Retained earnings	970,761	706,514
Total shareholders' equity	<u>2,819,294</u>	<u>2,525,897</u>
Total liabilities and shareholders' equity	<u>\$ 3,708,714</u>	<u>\$ 3,486,824</u>

The accompanying notes are an integral part of the consolidated financial statements.

TERADYNE, INC.
CONSOLIDATED STATEMENTS OF OPERATIONS

	Years Ended December 31,		
	2024	2023	2022
	(in thousands, except per share amount)		
Revenues:			
Products	\$ 2,294,935	\$ 2,096,286	\$ 2,591,572
Services	524,945	580,012	563,473
Total revenues	<u>2,819,880</u>	<u>2,676,298</u>	<u>3,155,045</u>
Cost of revenues:			
Cost of products	960,888	882,892	1,042,555
Cost of services	210,065	256,658	245,339
Total cost of revenues (exclusive of acquired intangible assets amortization shown separately below)	<u>1,170,953</u>	<u>1,139,550</u>	<u>1,287,894</u>
Gross profit	<u>1,648,927</u>	<u>1,536,748</u>	<u>1,867,151</u>
Operating expenses:			
Selling and administrative	617,047	577,315	558,103
Engineering and development	460,876	418,089	440,591
Acquired intangible assets amortization	18,764	18,999	19,333
Restructuring and other	15,571	21,277	17,185
Gain on sale of business	(57,119)	—	—
Total operating expenses	<u>1,055,139</u>	<u>1,035,680</u>	<u>1,035,212</u>
Income from operations	<u>593,788</u>	<u>501,068</u>	<u>831,939</u>
Non-operating (income) expenses:			
Interest income	(24,772)	(27,348)	(6,379)
Interest expense	3,587	3,806	3,719
Other (income) expense, net	5,887	(962)	(5,786)
Income before income taxes and equity in net earnings of affiliate	<u>609,086</u>	<u>525,572</u>	<u>840,385</u>
Income tax provision	<u>59,503</u>	<u>76,820</u>	<u>124,884</u>
Income before equity in net earnings of affiliate	<u>549,583</u>	<u>448,752</u>	<u>715,501</u>
Equity in net earnings of affiliate	<u>(7,211)</u>	<u>—</u>	<u>—</u>
Net income	<u>\$ 542,372</u>	<u>\$ 448,752</u>	<u>\$ 715,501</u>
Net income per common share:			
Basic	<u>\$ 3.41</u>	<u>\$ 2.91</u>	<u>\$ 4.52</u>
Diluted	<u>\$ 3.32</u>	<u>\$ 2.73</u>	<u>\$ 4.22</u>
Weighted average common shares—basic	<u>159,083</u>	<u>154,310</u>	<u>158,434</u>
Weighted average common shares—diluted	<u>163,314</u>	<u>164,304</u>	<u>169,734</u>

The accompanying notes are an integral part of the consolidated financial statements.

TERADYNE, INC.
CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME

	Years Ended December 31,		
	2024	2023 (in thousands)	2022
Net income	\$ 542,372	\$ 448,752	\$ 715,501
Other comprehensive income (loss), net of tax:			
Foreign currency translation adjustment, net of tax of \$0, \$0, \$0, respectively	(52,847)	17,407	(29,031)
Available-for-sale marketable securities:			
Unrealized (losses) gains on marketable securities arising during period, net of tax of \$(470), \$568, (\$3,388), respectively	(1,699)	2,423	(12,666)
Less: Reclassification adjustment for (gains) losses included in net income, net of tax of \$24, \$12, \$25, respectively	86	44	301
	(1,613)	2,467	(12,365)
Cash flow hedges:			
Unrealized (losses) gains arising during period, net of tax of \$593, \$1,537, \$(708), respectively	2,100	5,464	(2,517)
Less: Reclassification adjustment for (gains) losses included in net income, net of tax of \$(527), \$(686), \$0, respectively	(1,875)	(2,441)	—
	225	3,023	(2,517)
Defined benefit post-retirement plan:			
Amortization of prior service credit, net of tax \$(2), \$(2), \$(2), respectively	(7)	(7)	(7)
Other comprehensive income (loss)	(54,242)	22,890	(43,920)
Comprehensive income	<u>\$ 488,130</u>	<u>\$ 471,642</u>	<u>\$ 671,581</u>

The accompanying notes are an integral part of the consolidated financial statements.

TERADYNE, INC.
CONSOLIDATED STATEMENTS OF CONVERTIBLE COMMON SHARES
AND SHAREHOLDERS' EQUITY

	Shareholders' Equity						
	Convertible Common Shares Value	Common Stock Shares	Common Stock Par Value	Additional Paid-in Capital (in thousands)	Accumulated Other Comprehensive Income (loss)	Retained Earnings	Total Shareholders' Equity
Year Ended December 31, 2021	\$ 1,512	162,251	\$ 20,281	\$ 1,811,545	\$ (5,948)	\$ 736,566	2,562,444
Net issuance of common stock under stock-based plans		761	96	(4,471)			(4,375)
Stock-based compensation expense				48,466			48,466
Repurchase of common stock		(7,253)	(907)			(751,175)	(752,082)
Cash dividends (\$0.44 per share)						(69,763)	(69,763)
Settlements of convertible notes		1,495	187	(442)			(255)
Exercise of convertible notes hedge call options		(1,495)	(187)	187			—
Convertible common shares	(1,512)			1,512			1,512
Cumulative-effect of change in accounting principle related to convertible debt				(100,834)		94,600	(6,234)
Net income						715,501	715,501
Other comprehensive loss					(43,920)		(43,920)
Year Ended December 31, 2022	<u>\$ —</u>	<u>155,759</u>	<u>\$ 19,470</u>	<u>\$ 1,755,963</u>	<u>\$ (49,868)</u>	<u>\$ 725,729</u>	<u>\$ 2,451,294</u>
Net issuance of common stock under stock-based plans		848	106	13,371			13,477
Stock-based compensation expense				57,940			57,940
Repurchase of common stock		(3,909)	(489)			(400,040)	(400,529)
Cash dividends (\$0.44 per share)						(67,927)	(67,927)
Settlements of convertible notes		1,072	133	(133)			—
Exercise of convertible notes hedge call options		(1,072)	(133)	133			—
Net income						448,752	448,752
Other comprehensive income					22,890		22,890
Year Ended December 31, 2023	<u>\$ —</u>	<u>152,698</u>	<u>\$ 19,087</u>	<u>\$ 1,827,274</u>	<u>\$ (26,978)</u>	<u>\$ 706,514</u>	<u>\$ 2,525,897</u>
Net issuance of common stock under stock-based plans		728	91	23,137			23,228
Stock-based compensation expense				60,397			60,397
Warrant exercises		10,036	1,254	(1,270)			(16)
Repurchase of common stock		(1,740)	(217)			(201,666)	(201,883)
Cash dividends (\$0.48 per share)						(76,459)	(76,459)
Net income						542,372	542,372
Other comprehensive income					(54,242)		(54,242)
Year Ended December 31, 2024	<u>\$ —</u>	<u>161,722</u>	<u>\$ 20,215</u>	<u>\$ 1,909,538</u>	<u>\$ (81,220)</u>	<u>\$ 970,761</u>	<u>\$ 2,819,294</u>

The accompanying notes are an integral part of the consolidated financial statements.

TERADYNE, INC.
CONSOLIDATED STATEMENTS OF CASH FLOWS

	Years Ended December 31,		
	2024	2023	2022
	(in thousands)		
Cash flows from operating activities:			
Net income	\$ 542,372	\$ 448,752	\$ 715,501
Adjustments to reconcile net income from operations to net cash provided by operating activities:			
Depreciation	100,977	92,118	90,763
Stock-based compensation	60,122	57,682	48,228
Provision for excess and obsolete inventory	18,922	28,358	31,452
Amortization	18,764	18,768	19,912
Losses (gains) on investments	10,056	(14,915)	9,985
Equity in net earnings of affiliate	7,211	—	—
Gain on sale of business	(57,119)	—	—
Deferred taxes	(46,360)	(37,642)	(38,693)
Retirement plans actuarial (gains) losses	(4,355)	2,703	(25,584)
Loss (gain) on sale of asset	—	—	(3,410)
Other	(2,290)	(955)	2,353
Changes in operating assets and liabilities, net of businesses acquired:			
Accounts receivable	(52,659)	70,977	50,628
Inventories	8,707	5,327	(80,809)
Prepayments and other assets	119,454	(43,101)	(140,713)
Accounts payable and other accrued expenses	(54,386)	46,782	(60,507)
Deferred revenue and customer advances	12,176	(57,210)	(6,233)
Retirement plan contributions	(5,814)	(5,492)	(5,116)
Income taxes	(3,602)	(26,921)	(29,834)
Net cash provided by operating activities	672,176	585,231	577,923
Cash flows from investing activities:			
Investments in businesses	(532,060)	—	—
Purchases of property, plant and equipment	(198,095)	(159,642)	(163,249)
Purchases of marketable securities	(45,796)	(161,906)	(287,409)
Issuance of convertible loan	—	(5,000)	—
Proceeds from the sale of a business, net of cash and cash equivalents sold	90,348	—	—
Proceeds from maturities of marketable securities	38,353	85,042	222,941
Proceeds from sales of marketable securities	24,035	61,401	268,058
Proceeds from life insurance	873	460	—
Proceeds from sale of asset	—	—	3,410
Net cash (used for) provided by investing activities	(622,342)	(179,645)	43,751
Cash flows from financing activities:			
Repurchase of common stock	(198,574)	(397,241)	(752,082)
Payments of borrowings on revolving credit facility	(185,000)	—	—
Dividend payments	(76,423)	(67,878)	(69,711)
Payments related to net settlement of employee stock compensation awards	(14,100)	(20,788)	(33,170)
Payments of convertible debt principal	—	(50,264)	(66,759)
Proceeds from borrowings on revolving credit facility	185,000	—	—
Issuance of common stock under stock purchase and stock option plans	37,330	34,259	28,733
Net cash used for financing activities	(251,767)	(501,912)	(892,989)
Effects of exchange rate changes on cash and cash equivalents	(2,284)	(876)	3,889
(Decrease) increase in cash and cash equivalents	(204,217)	(97,202)	(267,426)
Cash and cash equivalents at beginning of year	757,571	854,773	1,122,199
Cash and cash equivalents at end of year	\$ 553,354	\$ 757,571	\$ 854,773
Supplementary disclosure of cash flow information:			
Cash paid for:			
Interest	\$ 767	\$ 296	\$ 1,498
Income taxes	\$ 121,428	\$ 140,239	\$ 193,246
Non-cash investing activities:			
Capital expenditures incurred but not yet paid:	\$ 3,893	\$ 2,735	\$ 1,826

The accompanying notes are an integral part of the consolidated financial statements.

TERADYNE, INC.

NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

A. THE COMPANY

Teradyne, Inc. ("Teradyne") is a leading global supplier of automated test equipment and robotics solutions. Teradyne designs, develops, manufactures, and sells automated test systems and robotics products. Teradyne's automated test systems are used to test semiconductors, wireless products, data storage and complex electronics systems in many industries including consumer electronics, wireless, automotive, industrial, computing, communications, and aerospace and defense industries. Teradyne's robotics products consist primarily of collaborative robotic arms and autonomous mobile robots used by global manufacturing, logistics and industrial customers to improve quality, increase manufacturing and material handling efficiency, and decrease manufacturing and logistics costs. Teradyne's automated test equipment and robotics products and services include:

- semiconductor test ("Semiconductor Test") systems;
- robotics ("Robotics") products; and
- defense/aerospace ("Defense/Aerospace") test instrumentation and systems, circuit-board test and inspection ("Production Board Test") systems, and wireless test systems (referred collectively as "All Other").

B. ACCOUNTING POLICIES

The consolidated financial statements include the accounts of Teradyne and its wholly owned subsidiaries. All significant intercompany balances and transactions are eliminated. Certain prior years' amounts were reclassified to conform to the current year presentation.

Preparation of Financial Statements and Use of Estimates

The preparation of consolidated financial statements requires management to make estimates and judgments that affect the reported amounts of assets, liabilities, revenues and expenses, and related disclosure of contingent liabilities. On an on-going basis, management evaluates its estimates, including those related to revenue, inventories, investments, goodwill, intangible and other long-lived assets, accounts receivable, income taxes, deferred tax assets and liabilities, pensions, warranties, and loss contingencies. Management bases its estimates on historical experience and on appropriate and customary assumptions that are believed to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities that are not readily apparent from other sources. Management is not aware of any specific event or circumstance that would require an update to its estimates or judgments or a revision of the carrying value of its assets or liabilities as of the date of issuance of this Annual Report on Form 10-K. These estimates may change, as new events occur and additional information is obtained. Actual results may differ significantly from these estimates under different assumptions or conditions.

Revenue Recognition

Revenue from Contracts with Customers

In accordance with ASC 606, Teradyne recognizes revenues, when or as control is transferred to a customer. Teradyne's determination of revenue is dependent upon a five-step process outlined below.

- Teradyne accounts for a contract with a customer when there is written approval, the contract is committed, the rights of the parties, including payment terms, are identified, the contract has commercial substance and consideration is probable of collection.
- Teradyne periodically enters into contracts with customers in which a customer may purchase a combination of goods and services, such as products with extended warranty obligations. Teradyne determines performance obligations by assessing whether the products or services are distinct from the other elements of the contract. In order to be distinct, the product or service must perform either on its own or with readily available resources and must be separate within the context of the contract.
- Teradyne determines the transaction price to be the amount of consideration to which Teradyne expects to be entitled to, which is generally at contractually stated prices.
- Transaction price is allocated to each individual performance obligation based on the standalone selling price of that performance obligation. Teradyne uses standalone transactions when available to value each performance obligation. If standalone transactions are not available, Teradyne will estimate the standalone selling price through market assessments or

cost plus a reasonable margin analysis. Any discounts from standalone selling price are spread proportionally to each performance obligation.

- In order to determine the appropriate timing for revenue recognition, Teradyne first determines if the transaction meets any of three criteria for over time recognition. If the transaction meets the criteria for over time recognition, Teradyne recognizes revenue as the good or service is delivered. Teradyne uses input variables such as hours or months utilized or costs incurred to determine the amount of revenue to recognize in a given period. Input variables are used as they best align consumption with benefit to the customer. For transactions that do not meet the criteria for over time recognition, Teradyne will recognize revenue at a point in time based on an assessment of the five criteria for transfer of control. Teradyne has concluded that revenue should be recognized when shipped or delivered based on contractual terms. Typically, acceptance of Teradyne's products and services is a formality as Teradyne delivers similar systems, instruments and robots to standard specifications. In cases where acceptance is not deemed a formality, Teradyne will defer revenue recognition until customer acceptance.

Performance Obligations

Products

Teradyne products consist primarily of semiconductor test systems and instruments, defense/aerospace test instrumentation and systems, storage test systems and instruments, circuit-board test and inspection systems and instruments, wireless test systems and robotics products. Teradyne's hardware is typically recognized at a point in time upon transfer of control to the customer.

Services

Teradyne services consist of extended warranties, training and application support, service agreements, post contract customer support ("PCS") and replacement parts. Each service is recognized based on relative standalone selling price. Extended warranty, training and support, service agreements and PCS are recognized over time based on the period of service. Replacement parts are recognized at a point in time upon transfer of control to the customer.

Teradyne does not allow customer returns or provide refunds to customers for any products or services. Teradyne products include a standard 12-month warranty. This warranty is not considered a distinct performance obligation because it does not obligate Teradyne to provide a separate service to the customer and it cannot be purchased separately. Cost related to warranties are included in cost of revenues when product revenues are recognized.

As of December 31, 2024 and 2023, deferred revenue and customer advances consisted of the following and are included in the short and long-term deferred revenue and customer advances:

	2024	(in thousands)	2023
Maintenance, service and training	\$ 58,473		\$ 66,458
Customer advances, undelivered elements and other	48,118		35,731
Extended warranty	41,624		34,897
Total deferred revenue and customer advances	<u>\$ 148,215</u>		<u>\$ 137,086</u>

Product Warranty

Teradyne generally provides a one-year warranty on its products, commencing upon installation, acceptance or shipment. A provision is recorded upon revenue recognition to cost of revenues for estimated warranty expense based on historical experience. Related costs are charged to the warranty accrual as incurred. The balance below is included in other accrued liabilities:

	<u>Amount</u> (in thousands)
Balance at December 31, 2021	\$ 24,577
Accruals for warranties issued during the period	21,851
Accruals related to pre-existing warranties	(5,618)
Settlements made during the period	(26,629)
Balance at December 31, 2022	14,181
Accruals for warranties issued during the period	21,644
Accruals related to pre-existing warranties	(1,576)
Settlements made during the period	(18,551)
Balance at December 31, 2023	15,698
Accruals for warranties issued during the period	11,315
Accruals related to pre-existing warranties	(1,078)
Settlements made during the period	(12,973)
Balance at December 31, 2024	<u>\$ 12,962</u>

When Teradyne receives revenue for extended warranties, beyond one year, it is deferred and recognized on a straight-line basis over the contract period. Related costs are expensed as incurred. The balance below is included in short and long-term deferred revenue and customer advances:

	<u>Amount</u> (in thousands)
Balance at December 31, 2021	\$ 64,168
Deferral of new extended warranty revenue	33,686
Recognition of extended warranty deferred revenue	(41,674)
Balance at December 31, 2022	56,180
Deferral of new extended warranty revenue	14,330
Recognition of extended warranty deferred revenue	(35,613)
Balance at December 31, 2023	34,897
Deferral of new extended warranty revenue	29,990
Recognition of extended warranty deferred revenue	(23,263)
Balance at December 31, 2024	<u>\$ 41,624</u>

Accounts Receivable and Allowance for Credit Losses

Trade accounts receivable are recorded at the invoiced amount and do not bear interest. Teradyne maintains allowances for estimated losses resulting from the inability of its customers to make required payments. Estimated allowances for credit losses are reviewed periodically taking into account the customer's recent payment history, the customer's current financial statements and other information regarding the customer's creditworthiness. Account balances are written off against the allowance when it is determined the receivable will not be recovered.

Teradyne sells certain trade accounts receivables on a non-recourse basis to third-party financial institutions pursuant to factoring agreements. Teradyne accounts for these transactions as sales of receivables and presents cash proceeds as a cash provided by operating activities in the consolidated statements of cash flows. Total trade accounts receivable sold under the factoring agreements were \$129.0 million and \$243.5 million during 2024 and 2023, respectively. Factoring fees for the sales of receivables are recorded in interest expense and are not material.

Equity Method Investments

Teradyne accounts for investments using the equity method of accounting when it has significant influence over the financial and operating policies, but not control, of the investee. The equity method investments are initially recorded at cost and included in 'Equity method investment' in the consolidated balance sheet. Teradyne records its share of investee's net income or loss and other

comprehensive income, and the amortization of equity method basis difference, calculated as the difference between the investment and the amount of underlying equity in net assets acquired, on a 3-month lag, which is applied consistently from period to period. Teradyne's share of investee's net income and the amortization of equity method basis difference are reported in 'Equity in net earnings of affiliate' in the consolidated statement of operations. Teradyne includes its share of investee's other comprehensive income and a cumulative translation adjustment in the consolidated statements of comprehensive income. Teradyne monitors on an ongoing basis its equity method investments for indicators of other-than-temporary declines in fair value below carrying value.

Inventories

Inventories are stated at the lower of cost (first-in, first-out basis) or net realizable value. On a quarterly basis, Teradyne uses consistent methodologies to evaluate all inventories for net realizable value. Teradyne records a provision for both excess and obsolete inventory when such write-downs or write-offs are identified through the quarterly review process. The inventory valuation is based upon assumptions about future demand, product mix and possible alternative uses.

Investments

Teradyne accounts for its investments in debt and equity securities in accordance with the provisions of ASC 320-10, "*Investments—Debt and Equity Securities*." ASC 320-10 requires that certain debt and equity securities be classified into one of three categories; trading, available-for-sale or held-to-maturity securities. On a quarterly basis, Teradyne reviews its investments to identify and evaluate those that have an indication of a potential other-than-temporary impairment. Factors considered in determining whether a loss is other-than-temporary include:

- The length of time and the extent to which the market value has been less than cost;
- The financial condition and near-term prospects of the issuer; and
- The intent and ability to retain the investment in the issuer for a period of time sufficient to allow for any anticipated recovery in market value.

Teradyne uses the market and income approach techniques to value its financial instruments and there were no changes in valuation techniques during the twelve months ended December 31, 2024 and 2023.

Teradyne measures its debt and equity investments at fair value, in accordance with ASC 820-10, "*Fair Value Measurements and Disclosures*." ASC 820-10 defines fair value as the price that would be received from the sale of an asset or paid to transfer a liability in an orderly transaction between market participants and requires that assets and liabilities carried at fair value be classified and disclosed in one of the following three categories:

Level 1: Quoted prices in active markets for identical assets as of the reporting date;

Level 2: Inputs other than Level 1, that are observable either directly or indirectly as of the reporting date. For example, a common approach for valuing fixed income securities is the use of matrix pricing. Matrix pricing is a mathematical technique used to value securities by relying on the securities' relationship to other benchmark quoted prices, and is considered a Level 2 input; or

Level 3: Unobservable inputs that are not supported by market data. Unobservable inputs are developed based on the best information available, which might include Teradyne's own data.

Teradyne's debt investments are classified as Level 2, and equity investments are classified as Level 1.

Financial Assets and Financial Liabilities

Teradyne records changes in fair value of equity securities directly in earnings and unrealized gains and losses in other (income) expense, net, in accordance with ASU 2016-01, "*Financial Instruments—Overall (Subtopic 825-10): Recognition and Measurement of Financial Assets and Financial Liabilities*."

Prepayments

Prepayments consist of the following:

	2024	2023 ⁽¹⁾
	(in thousands)	
Contract manufacturer and supplier prepayments	\$ 365,875	\$ 502,257
Prepaid maintenance and other services	22,176	17,592
Prepaid taxes	22,211	16,083
Other prepayments	18,824	13,038
Total prepayments	\$ 429,086	\$ 548,970

(1) Excludes \$5.3 million of contract manufacturer and supplier prepayments, classified as assets held for sale. See Note E: "Dispositions" for additional information.

Retirement and Postretirement Plans

Teradyne recognizes net actuarial gains and losses and the change in the fair value of the plan assets in its operating results in the year in which they occur or upon any interim remeasurement of the plans. Teradyne calculates the expected return on plan assets using the fair value of the plan assets. Actuarial gains and losses are generally measured annually as of December 31 and, accordingly, recorded during the fourth quarter of each year or upon any interim remeasurement of the plans.

Teradyne reports net periodic pension cost and net periodic postretirement benefit costs in accordance with ASU 2017-07, “*Compensation—Retirement Benefits (Topic 715): Improving the Presentation of Net Periodic Pension Cost and Net Periodic Postretirement Benefit Cost.*” The service cost component of net benefit costs is reported in the same line item in the consolidated statement of operations as other employee compensation costs. The non-service components of net benefit costs such as interest cost, expected return on assets, amortization of prior service cost, and actuarial gains or losses, are reported within other (income) expense, net.

Goodwill, Intangible and Long-Lived Assets

Teradyne accounts for goodwill and intangible assets in accordance with ASC 350-10, “*Intangibles-Goodwill and Other.*” Intangible assets are amortized over their estimated useful economic life and are carried at cost less accumulated amortization. Goodwill is assessed for impairment at least annually in the fourth quarter, as of December 31, on a reporting unit basis, or more frequently when events and circumstances occur indicating that the recorded goodwill may be impaired.

In accordance with ASC 350-10, Teradyne has the option to perform a qualitative assessment to determine whether it is more likely than not that the fair value of a reporting unit is less than its carrying amount. If Teradyne determines this is the case, Teradyne is required to perform a quantitative goodwill impairment test to identify potential goodwill impairment and measure the amount of goodwill impairment loss to be recognized. If Teradyne determines that it is more likely than not that the fair value of the reporting unit is greater than its carrying amounts, a quantitative goodwill impairment test is not required.

In accordance with ASC 360-10, “*Impairment or Disposal of Long-Lived Assets,*” Teradyne reviews long-lived assets for impairment whenever events or changes in business circumstances indicate that the carrying amount of the assets may not be fully recoverable or that the useful lives of these assets are no longer appropriate. Each impairment test is based on a comparison of the estimated undiscounted cash flows to the recorded value of the asset. If impairment is indicated, the asset is written down to its estimated fair value based on a discounted cash flows analysis. The cash flows estimates used to determine the impairment, if any, contain management’s best estimates using appropriate assumptions and projections at that time.

Business Combination

Teradyne recognizes the tangible and intangible assets acquired and liabilities assumed based on their estimated fair values at the date of acquisition. The fair value of identifiable intangible assets is based on detailed cash flows valuations that use information and assumptions provided by management. Teradyne uses all pertinent information known at the time of acquisition to estimate the fair value of contingent consideration at the time of the acquisition using all pertinent information known to us at the time to assess the probability of payment of contingent amounts or through the use of a Monte Carlo simulation model. Teradyne allocates any excess purchase price over the fair value of the net tangible and intangible assets acquired and liabilities assumed to goodwill. The assumptions used in the valuations for our acquisitions may differ materially from actual results depending on performance of the acquired businesses and other factors. While Teradyne believes the assumptions used were appropriate, different assumptions in the valuation of assets acquired and liabilities assumed could have a material impact on the timing and extent of impact on our statements of operations. Goodwill is assigned to reporting units as of the date of the related acquisition.

Property, Plant and Equipment

Property, plant and equipment are stated at cost and depreciated over the estimated useful lives of the assets. Leasehold improvements and major renewals are capitalized and included in property, plant and equipment accounts, while expenditures for maintenance and repairs and minor renewals are charged to expense. When assets are retired, the assets and related accumulated depreciation are removed from the accounts and any resulting gain or loss is reflected in the consolidated statements of operations.

Teradyne provides for depreciation of its assets principally on the straight-line method with the cost of the assets being charged to expense over their useful lives as follows:

Buildings	40 years
Building improvements	5 to 10 years
Leasehold improvements	Lesser of lease term or 10 years
Furniture and fixtures	10 years
Test systems manufactured internally	6 years
Machinery, equipment and software	3 to 5 years

Test systems manufactured internally are used by Teradyne for customer evaluations and manufacturing and support of its customers. Teradyne depreciates the test systems manufactured internally over a six-year life to cost of revenues, engineering and development, and selling and administrative expenses. Teradyne often sells internally manufactured test equipment to customers. Upon the sale of an internally manufactured test system, the net book value of the system is transferred to inventory and expensed as cost of revenues. The net book value of internally manufactured test systems sold in the years ended December 31, 2024, 2023, and 2022 was \$4.0 million, \$2.8 million, and \$6.6 million, respectively.

Convertible Debt

Teradyne adopted Accounting Standards Update (“ASU”) ASU 2020-06 – “Debt—Debt with Conversion and Other Options and Derivatives and Hedging—Contracts in Entity’s Own Equity,” on January 1, 2022 using the modified retrospective method of adoption. As a result of adoption, Teradyne recorded an increase of \$1.4 million to current debt for unsettled shares, an increase of \$1.8 million to deferred tax assets, an increase of \$6.6 million to long-term debt for unamortized debt discount, and an increase to retained earnings of \$94.6 million for the reclassification of the equity component. Mezzanine equity representing unsettled shares value was reduced to zero and additional paid-in capital was reduced by \$100.8 million. In accordance with ASU 2020-06, Teradyne accounts for a convertible debt instrument as a single liability measured at its amortized cost, as long as no other features require bifurcation and recognition as derivatives. Unsettled shares are recorded in current debt, and there is no recognition of a debt discount, which was previously amortized to interest expense. Settled shares reduce the outstanding debt balance in an amount equal to the cash paid, but do not result in any gain or loss on extinguishment. We use the if-converted method in the diluted EPS calculation for convertible instruments.

Leases

Under ASC 842, a contract is or contains a lease when Teradyne has the right to control the use of an identified asset. Teradyne determines if an arrangement is a lease at inception of the contract, which is the date on which the terms of the contract are agreed to and the agreement creates enforceable rights and obligations. The commencement date of the lease is the date that the lessor makes an underlying asset available for use by Teradyne. As of December 31, 2024, Teradyne does not have material leases that have not yet commenced.

Teradyne determines if the lease is an operating or finance lease at the lease commencement date based upon the terms of the lease and the nature of the asset. The lease term used to calculate the lease liability includes options to extend or terminate the lease when it is reasonably certain that the option will be exercised.

The lease liability is measured at the present value of future lease payments, discounted using the discount rate for the lease at the commencement date. As Teradyne is typically unable to determine the implicit rate, Teradyne uses an incremental borrowing rate based on the lease term and economic environment at commencement date. Teradyne initially measures payments based on an index by using the applicable rate at lease commencement. Variable payments that do not depend on an index are not included in the lease liability and are recognized as they are incurred. The right-of-use (“ROU”) asset is initially measured as the amount of lease liability, adjusted for any initial lease costs, prepaid lease payments, and reduced by any lease incentives.

Teradyne's contracts often include non-lease components such as common area maintenance. Teradyne elected the practical expedient to account for the lease and non-lease components as a single lease component. For leases with a term of one year or less, Teradyne has elected not to record the lease asset or liability. Rent is recognized in the consolidated statement of earnings on a straight-line basis over the lease term. Teradyne includes lease costs within cost of revenues and operating expenses. See Note J: "Leases."

Engineering and Development Costs

Teradyne's products are highly technical and require a large and continuing engineering and development effort. Software development costs incurred prior to the establishment of technological feasibility are charged to expense. Software development costs incurred subsequent to the establishment of technological feasibility are capitalized until the product is available for release to customers. To date, the period between achieving technological feasibility and general availability of the product has been short and software development costs eligible for capitalization have not been material. Engineering and development costs are expensed as incurred and consist primarily of salaries, contractor fees including non-recurring engineering charges related to product design, allocated facility costs, depreciation, and tooling costs.

Stock Compensation Plans and Employee Stock Purchase Plan

Stock-based compensation expense is based on the grant-date fair value estimated in accordance with the provisions of ASC 718-10, "*Compensation-Stock Compensation*." Teradyne elects to account for forfeitures by applying an estimated forfeiture rate and recognizes compensation costs only for those stock-based compensation awards expected to vest. Under its stock compensation plans, Teradyne has granted stock options, restricted stock units and performance-based restricted stock units, and employees are eligible to purchase Teradyne's common stock through its Employee Stock Purchase Plan ("ESPP").

Excess tax benefits or tax deficiencies are recognized as a discrete tax benefit or discrete tax expense to the current income tax provision in Teradyne's consolidated statements of operations, all excess tax benefits related to share-based payments are reported as cash flows from operating activities, and all cash payments made to taxing authorities on the employees' behalf for withheld shares are presented as financing activities on the statement of cash flows.

Income Taxes

Deferred tax assets and liabilities are determined based on differences between financial reporting and tax basis of assets and liabilities and are measured using the enacted tax rates and laws that will be in effect when the differences are expected to reverse. The measurement of deferred tax assets is reduced by a valuation allowance if it is more likely than not that some or all of the deferred tax assets will not be realized. Teradyne performed the required assessment of positive and negative evidence regarding the realization of the net deferred tax assets in accordance with ASC 740, "*Accounting for Income Taxes*." This assessment included the evaluation of scheduled reversals of deferred tax liabilities, estimates of projected future taxable income and tax-planning strategies. Although realization is not assured, based on its assessment, Teradyne concluded that it is more likely than not that such assets, net of the existing valuation allowance, will be realized.

Advertising Costs

Teradyne expenses all advertising costs as incurred. Advertising costs were \$16.1 million, \$15.5 million and \$17.3 million in 2024, 2023 and 2022, respectively.

Translation of Non-U.S. Currencies

The functional currency for all non-U.S. subsidiaries is the U.S. dollar, except for Robotics and Lemsys for which the local currency is its functional currency. All foreign currency denominated monetary assets and liabilities are remeasured on a monthly basis into the functional currency using exchange rates in effect at the end of the period. All foreign currency denominated non-monetary assets and liabilities are remeasured into the functional currency using historical exchange rates. Net foreign exchange gains and losses resulting from remeasurement are included in other (income) expense, net. For Robotics and Lemsys, assets and liabilities are translated into U.S. dollars using exchange rates in effect at the end of the period. Revenues and expense amounts are translated using an average of exchange rates in effect during the period. Translation adjustments are recorded within accumulated other comprehensive income (loss) on the balance sheet.

Net foreign exchange gains and losses resulting from remeasurement are included in other (income) expense, net. For the years ended December 31, 2024, 2023 and 2022, losses (gains) from the remeasurement of the monetary assets and liabilities denominated in foreign currencies were \$2.8 million, \$10.9 million, and \$10.8 million, respectively.

These amounts do not reflect the corresponding (gains) losses from foreign exchange contracts. See Note I: "Financial Instruments" regarding foreign exchange contracts.

Net Income per Common Share

Basic net income per common share is calculated by dividing net income by the weighted average number of common shares outstanding during the period. Except where the result would be anti-dilutive, diluted net income per common share is calculated by dividing net income by the sum of the weighted average number of common shares plus common stock equivalents, if applicable.

With respect to its convertible debt issued in 2016, Teradyne was required to settle the principal of the convertible debt in cash; accordingly, the principal amount was excluded from the determination of diluted earnings per share. As a result, Teradyne is accounting for the conversion spread using the treasury stock method.

Comprehensive Income

Comprehensive income includes net income, unrealized pension and postretirement prior service costs and benefits, unrealized gains and losses on investments in debt marketable securities, unrealized gains and losses on cash flow hedge and foreign currency translation adjustment.

C. RECENTLY ISSUED ACCOUNTING PRONOUNCEMENTS

In November 2023, the Financial Accounting Standards Board ("FASB") issued Accounting Standard Update ("ASU") No. 2023-07, *"Segment Reporting (Topic 280): Improvements to Reportable Segment Disclosures"*, which requires Teradyne to disclose significant segment expenses and other segment items used by the Chief Operating Decision Maker ("CODM") on an annual and interim basis as well as provide in interim periods all disclosures about a reportable segment's profit or loss and assets that are currently required annually. Additionally, we are required to disclose the title and position of the CODM. Teradyne retrospectively adopted and complied with this standard for the annual period ending December 31, 2024. Teradyne updated our segment disclosures to comply with the requirements. See Note U: "Segment, Geographic and Significant Customer Information." The adoption of this standard had no impact on Teradyne results of operations, cash flows or financial condition.

In December 2023, the FASB issued ASU 2023-09 – *"Income Taxes (Topic 740): Improvements to Income Tax Disclosures"*, which requires expanded disclosures relating to the tax rate reconciliation, income taxes paid, income (loss) before income tax expense (benefit) and income tax expense (benefit), requiring a greater disaggregation of information for each. The provisions of ASU 2023-09 are effective for fiscal years beginning after December 15, 2024. The amendments in this update should be applied on a prospective basis, but retrospective application is permitted. Teradyne is currently evaluating the impact of this new standard.

In November 2024, the FASB issued ASU 2024-03-*"Income Statement - Reporting Comprehensive Income -Expense Disaggregation Disclosures (Subtopic 220-40): Disaggregation of Income Statement Expenses"*, which requires disclosure of additional expense information on an annual and interim basis, including the amounts of inventory purchases, employee compensation, depreciation and intangible amortization included within each income statement expense caption. This standard is effective for fiscal years beginning after December 15, 2026, and interim periods within fiscal years beginning after December 15, 2027, with early adoption permitted. The amendments in this update should be applied on a prospective basis, but retrospective application is permitted. Teradyne is currently evaluating the impact of this new standard.

D. REVENUE

Disaggregation of Revenue

The following table provides information about disaggregated revenue by timing of revenue recognition, primary geographical market, and major product lines.

	Semiconductor Test			Robotics	Reportable Segments	All Other	Corporate and Eliminations	Total
	System-on-a-chip	Memory	IST					
(in thousands)								
For the Year Ended December 31, 2024 (1)								
Timing of Revenue Recognition								
Point in Time	\$ 1,255,579	\$ 472,279	\$ 63,288	\$ 356,384	\$ 2,147,530	\$ 266,955	\$ —	\$ 2,414,485
Over Time	281,545	29,509	21,720	8,464	341,238	64,157	—	405,395
Total	\$ 1,537,124	\$ 501,788	\$ 85,008	\$ 364,848	\$ 2,488,768	\$ 331,112	\$ —	\$ 2,819,880
Geographical Market								
Asia Pacific	\$ 1,400,149	\$ 466,214	\$ 78,719	\$ 69,353	\$ 2,014,435	\$ 113,263	\$ —	\$ 2,127,698
Americas	92,386	15,017	6,289	147,607	261,299	174,084	—	435,383
Europe, Middle East and Africa	44,589	20,557	—	147,888	213,034	43,765	—	256,799
Total	\$ 1,537,124	\$ 501,788	\$ 85,008	\$ 364,848	\$ 2,488,768	\$ 331,112	\$ —	\$ 2,819,880
For the Year Ended December 31, 2023 (1)								
Timing of Revenue Recognition								
Point in Time	\$ 1,141,882	\$ 356,417	\$ 115,220	\$ 363,238	\$ 1,976,757	\$ 282,558	\$ —	\$ 2,259,315
Over Time	290,739	29,598	23,332	11,945	355,614	61,369	—	416,983
Total	\$ 1,432,621	\$ 386,015	\$ 138,552	\$ 375,183	\$ 2,332,371	\$ 343,927	\$ —	\$ 2,676,298
Geographical Market								
Asia Pacific	\$ 1,214,322	\$ 366,151	\$ 135,502	\$ 73,736	\$ 1,789,711	\$ 103,300	\$ —	\$ 1,893,011
Americas	117,728	11,367	3,050	147,952	280,097	199,299	—	479,396
Europe, Middle East and Africa	100,571	8,497	—	153,495	262,563	41,328	—	303,891
Total	\$ 1,432,621	\$ 386,015	\$ 138,552	\$ 375,183	\$ 2,332,371	\$ 343,927	\$ —	\$ 2,676,298
For the Year Ended December 31, 2022 (1)								
Timing of Revenue Recognition								
Point in Time	\$ 1,445,238	\$ 344,693	\$ 248,919	\$ 391,326	\$ 2,430,176	\$ 342,195	\$ 251	\$ 2,772,622
Over Time	261,646	29,013	21,094	11,812	323,565	58,858	—	382,423
Total	\$ 1,706,884	\$ 373,706	\$ 270,013	\$ 403,138	\$ 2,753,741	\$ 401,053	\$ 251	\$ 3,155,045
Geographical Market								
Asia Pacific	\$ 1,514,964	\$ 360,176	\$ 266,729	\$ 89,654	\$ 2,231,523	\$ 168,388	\$ —	\$ 2,399,911
Americas	122,575	11,987	3,284	147,416	285,262	190,106	251	475,619
Europe, Middle East and Africa	69,345	1,543	—	166,068	236,956	42,559	—	279,515
Total	\$ 1,706,884	\$ 373,706	\$ 270,013	\$ 403,138	\$ 2,753,741	\$ 401,053	\$ 251	\$ 3,155,045

(1) Includes \$3.7 million, \$5.2 million and \$8.2 million in 2024, 2023 and 2022, respectively, for leases of Teradyne’s systems recognized outside of ASC 606: “Revenue from Contracts with Customers.”

Contract Balances

For the years ended December 31, 2024, 2023 and 2022, Teradyne recognized \$72.7 million, \$108.1 million and \$112.4 million, respectively, that was included within the deferred revenue and customer advances balances at the beginning of the period. This revenue primarily relates to undelivered hardware, extended warranties, training, application support, and post contract support. Each of these represents a distinct performance obligation. As of December 31, 2024, Teradyne had \$1,162.2 million of unsatisfied performance obligations. Teradyne expects to recognize 88% of the remaining performance obligation in the next 12 months and the remainder in 1-3 years.

E. DISPOSITIONS

On May 27, 2024, Teradyne completed the sale of the Device Interface Solutions ("DIS") business, a component of the Semiconductor Test segment, to Technoprobe S.p.A. ("Technoprobe") for \$85.0 million in cash, net of cash and cash equivalents sold, and a customary working capital adjustment. The sale resulted in a pre-tax gain of \$57.1 million recorded as 'Gain on sale of business' in the consolidated statement of operations. The transaction did not meet the criteria to be classified as a discontinued operation, as it did not represent a strategic shift that will have a major effect on operations and financial results.

Assets and liabilities related to the DIS sale agreement met the criteria and were classified as held for sale in Teradyne's consolidated balance sheet as of December 31, 2023, as follows:

	December 31, 2023
	(in thousands)
Current assets:	
Inventories, net	\$ 17,952
Prepayments	5,298
Total current assets held for sale	23,250
Property, plant and equipment, net	8,986
Operating lease right-of-use assets, net	2,545
Total assets held for sale	<u>\$ 34,781</u>
Current liabilities:	
Accounts payable	\$ 6,356
Other accrued liabilities	552
Operating lease liabilities	471
Total current liabilities held for sale	7,379
Long-term operating lease liabilities	2,000
Total liabilities held for sale	<u>\$ 9,379</u>
Net assets held for sale	<u>\$ 25,402</u>

F. EQUITY METHOD INVESTMENT

On May 27, 2024, Teradyne paid 483.1 million Euros, equivalent to \$524.1 million, to purchase a combination of previously issued and outstanding shares and shares newly issued by Technoprobe, S.p.A. ("Technoprobe"). The shares purchased represent 10% of the issued and outstanding shares of Technoprobe. Teradyne also received a board seat as part of the purchase. Teradyne accounts for this investment using the equity method as a result of being able to exercise significant influence over the operating and financial decisions of Technoprobe. As of December 31, 2024, \$494.5 million was recorded as 'Equity method investment' in the consolidated balance sheets.

	(in thousands)
Balance at May 27, 2024	\$ 524,060
Other comprehensive income related to investment	(22,355)
Equity in net earnings of affiliate	(7,211)
Balance at December 31, 2024	<u>\$ 494,494</u>

Based on the quoted closing price of Technoprobe stock as of December 31, 2024, the fair value of the publicly traded investment was \$389.5 million. Evaluation of Technoprobe's financial condition and Teradyne's ability to hold the investment indicate there was no other-than-temporary impairment as of December 31, 2024.

Teradyne's equity method basis difference was calculated as the difference between the investment and the amount of underlying equity in net assets acquired. The equity method basis difference calculated at acquisition attributable to developed technology, customer relationships, trade name, property, plant and equipment, inventory, and deferred tax liability was \$200.9 million. The basis differences, net of tax, will be amortized over their estimated useful lives.

Teradyne made an accounting policy election to report its share of Technoprobe's results on a 3-month lag, which is applied consistently from period to period. Teradyne records its share of Technoprobe's net income or loss and the amortization of equity method basis difference, as 'Equity in net earnings of affiliate' in the consolidated statements of operations. Teradyne includes its share

of Technoprobe's other comprehensive income and a cumulative translation adjustment in the consolidated statements of comprehensive income.

G. INVENTORIES

Inventories, net consisted of the following at December 31, 2024 and 2023:

	2024	2023 ⁽¹⁾
	(in thousands)	
Raw material	\$ 225,915	\$ 258,422
Work-in-process	41,964	26,851
Finished goods	30,613	24,701
	<u>\$ 298,492</u>	<u>\$ 309,974</u>

(1) Excludes \$18.0 million of primarily work-in-process inventories, net classified as assets held for sale. See Note E: "Dispositions" for additional information.

Inventory reserves at December 31, 2024, and December 31, 2023, were \$141.4 million and \$136.0 million, respectively.

H. PROPERTY, PLANT AND EQUIPMENT

Property, plant and equipment, net consisted of the following at December 31, 2024 and 2023:

	2024	2023 ⁽¹⁾
	(in thousands)	
Land	\$ 19,409	\$ 19,487
Buildings	183,371	127,705
Machinery, equipment and software	1,157,784	1,047,235
Furniture and fixtures	28,432	28,093
Leasehold improvements	67,387	66,777
Construction in progress	5,678	54,799
	<u>1,462,061</u>	<u>1,344,096</u>
Less: accumulated depreciation	953,890	898,604
	<u>\$ 508,171</u>	<u>\$ 445,492</u>

(1) Excludes \$9.0 million of property, plant and equipment, net classified as assets held for sale. See Note E: "Dispositions" for additional information.

Depreciation of property, plant and equipment for the years ended December 31, 2024, 2023, and 2022 was \$101.0 million, \$92.1 million, and \$90.8 million, respectively. As of December 31, 2024 and 2023, the gross book value included in machinery and equipment for internally manufactured test systems being leased by customers was \$25.7 million and \$5.1 million, respectively. As of December 31, 2024 and 2023, the accumulated depreciation on these test systems was \$5.5 million and \$4.9 million, respectively.

I. FINANCIAL INSTRUMENTS

Cash Equivalents

Teradyne considers all highly liquid investments with maturities of three months or less at the date of acquisition to be cash equivalents.

Marketable Securities

Teradyne's equity and debt mutual funds are classified as Level 1 and available-for-sale debt securities are classified as Level 2. The vast majority of Level 2 securities are fixed income securities priced by third party pricing vendors. These pricing vendors utilize the most recent observable market information in pricing these securities or, if specific prices are not available, use other observable inputs like market transactions involving identical or comparable securities.

During the years ended December 31, 2024 and 2023, there were no transfers in or out of Level 1, Level 2, or Level 3 financial instruments.

[Table of Contents](#)

Realized gains recorded in 2024, 2023, and 2022 were \$2.2 million, \$0.6 million, and \$0.8 million, respectively. Realized losses recorded in 2024, 2023, and 2022 were \$0.3 million, \$0.3 million, and \$0.1 million, respectively. Realized gains and losses are included in other (income) expense, net.

Unrealized gains on equity securities recorded during the years ended December 31, 2024, 2023 and 2022 were \$6.7 million, \$8.9 million and \$1.9 million, respectively. Unrealized losses on equity securities recorded during the years ended December 31, 2024, 2023, and 2022 were \$1.2 million, \$1.7 million and \$11.6 million, respectively. Unrealized gains and losses on equity securities are included in other (income) expense, net. Unrealized gains and losses on available-for-sale debt securities are included in accumulated other comprehensive income (loss) on the balance sheet.

The cost of securities sold is based on average cost.

The following table sets forth by fair value hierarchy Teradyne's financial assets and liabilities that were measured at fair value on a recurring basis as of December 31, 2024 and 2023:

	December 31, 2024			
	Quoted Prices in Active Markets for Identical Instruments (Level 1)	Significant Other Observable Inputs (Level 2)	Significant Unobservable Inputs (Level 3)	Total
	(in thousands)			
Assets				
Cash	\$ 261,176	\$ —	\$ —	\$ 261,176
Cash equivalents	283,037	9,141	—	292,178
Available for sale securities:				
U.S. Treasury securities	—	44,942	—	44,942
Corporate debt securities	—	35,696	—	35,696
Certificates of deposit and time deposits	—	21,689	—	21,689
Debt mutual funds	8,951	—	—	8,951
U.S. government agency securities	—	3,970	—	3,970
Non-U.S. government securities	—	773	—	773
Equity securities:				
Mutual funds	54,412	—	—	54,412
Total	\$ 607,576	\$ 116,211	\$ —	\$ 723,787
Derivative assets	—	1,665	—	1,665
Total	\$ 607,576	\$ 117,876	\$ —	\$ 725,452
Liabilities				
Derivative liabilities	—	1,324	—	1,324
Total	\$ —	\$ 1,324	\$ —	\$ 1,324
Reported as follows:				
	(Level 1)	(Level 2)	(Level 3)	Total
	(in thousands)			
Assets				
Cash and cash equivalents	\$ 544,213	\$ 9,141	\$ —	\$ 553,354
Marketable securities	—	46,312	—	46,312
Long-term marketable securities	63,363	60,758	—	124,121
Other current assets	—	1,665	—	1,665
Total	\$ 607,576	\$ 117,876	\$ —	\$ 725,452
Liabilities				
Other current liabilities	\$ —	\$ 1,324	\$ —	\$ 1,324
Total	\$ —	\$ 1,324	\$ —	\$ 1,324

[Table of Contents](#)

	December 31, 2023			
	Quoted Prices in Active Markets for Identical Instruments (Level 1)	Significant Other Observable Inputs (Level 2)	Significant Unobservable Inputs (Level 3)	Total
	(in thousands)			
Assets				
Cash	\$ 298,156	\$ —	\$ —	\$ 298,156
Cash equivalents	453,298	6,117	—	459,415
Available for sale securities:				
Corporate debt securities	—	52,734	—	52,734
U.S. Treasury securities	—	41,808	—	41,808
Certificates of deposit and time deposits	—	21,772	—	21,772
Debt mutual funds	8,773	—	—	8,773
U.S. government agency securities	—	4,892	—	4,892
Commercial paper	—	1,667	—	1,667
Non-U.S. government securities	—	810	—	810
Equity securities:				
Mutual funds	47,132	—	—	47,132
Total	<u>\$ 807,359</u>	<u>\$ 129,800</u>	<u>\$ —</u>	<u>\$ 937,159</u>
Derivative assets	—	18,746	—	18,746
Total	<u>\$ 807,359</u>	<u>\$ 148,546</u>	<u>\$ —</u>	<u>\$ 955,905</u>
Liabilities				
Derivative liabilities	—	2,545	—	2,545
Total	<u>\$ —</u>	<u>\$ 2,545</u>	<u>\$ —</u>	<u>\$ 2,545</u>

Reported as follows:

	(Level 1)	(Level 2)	(Level 3)	Total
	(in thousands)			
Assets				
Cash and cash equivalents	\$ 751,454	\$ 6,117	\$ —	\$ 757,571
Marketable securities	—	62,154	—	62,154
Long-term marketable securities	55,905	61,529	—	117,434
Other current assets	—	18,746	—	18,746
Total	<u>\$ 807,359</u>	<u>\$ 148,546</u>	<u>\$ —</u>	<u>\$ 955,905</u>
Liabilities				
Other current liabilities	\$ —	\$ 2,545	\$ —	\$ 2,545
Total	<u>\$ —</u>	<u>\$ 2,545</u>	<u>\$ —</u>	<u>\$ 2,545</u>

The carrying amounts and fair values of Teradyne's financial instruments at December 31, 2024 and 2023 were as follows:

	December 31, 2024		December 31, 2023	
	Carrying Value	Fair Value	Carrying Value	Fair Value
	(in thousands)			
Assets				
Cash and cash equivalents	\$ 553,354	\$ 553,354	\$ 757,571	\$ 757,571
Marketable securities	170,433	170,433	179,588	179,588
Derivative assets	1,665	1,665	18,746	18,746
Liabilities				
Derivative liabilities	1,324	1,324	2,545	2,545

The fair values of accounts receivable, net and accounts payable approximate the carrying amount due to the short-term nature of these instruments.

The following tables summarize the composition of available-for-sale marketable securities at December 31, 2024 and 2023:

December 31, 2024					
Available-for-Sale					
	Cost	Unrealized Gain	Unrealized (Loss) (in thousands)	Fair Market Value	Fair Market Value of Investments with Unrealized Losses
U.S. Treasury securities	\$ 49,879	\$ 14	\$ (4,951)	\$ 44,942	\$ 30,530
Corporate debt securities	40,395	79	(4,778)	35,696	27,824
Certificates of deposit and time deposits	21,689	—	—	21,689	—
Debt mutual funds	9,299	—	(348)	8,951	3,238
U.S. government agency securities	3,966	5	(1)	3,970	1,946
Non-U.S. government securities	773	—	—	773	—
	<u>\$ 126,001</u>	<u>\$ 98</u>	<u>\$ (10,078)</u>	<u>\$ 116,021</u>	<u>\$ 63,538</u>

Reported as follows:

	Cost	Unrealized Gain	Unrealized (Loss) (in thousands)	Fair Market Value	Fair Market Value of Investments with Unrealized Losses
Marketable securities	\$ 46,349	\$ 16	\$ (53)	\$ 46,312	\$ 10,454
Long-term marketable securities	79,652	82	(10,025)	69,709	53,084
	<u>\$ 126,001</u>	<u>\$ 98</u>	<u>\$ (10,078)</u>	<u>\$ 116,021</u>	<u>\$ 63,538</u>

December 31, 2023					
Available-for-Sale					
	Cost	Unrealized Gain	Unrealized (Loss) (in thousands)	Fair Market Value	Fair Market Value of Investments with Unrealized Losses
Corporate debt securities	\$ 56,458	\$ 201	\$ (3,925)	\$ 52,734	\$ 44,263
U.S. Treasury securities	45,725	14	(3,931)	41,808	35,080
Certificates of deposit and time deposits	21,772	—	—	21,772	—
Debt mutual funds	9,081	—	(308)	8,773	3,303
U.S. government agency securities	4,898	—	(6)	4,892	4,892
Commercial paper	1,633	34	—	1,667	—
Non-U.S. government securities	810	—	—	810	—
	<u>\$ 140,377</u>	<u>\$ 249</u>	<u>\$ (8,170)</u>	<u>\$ 132,456</u>	<u>\$ 87,538</u>

Reported as follows:

	Cost	Unrealized Gain	Unrealized (Loss) (in thousands)	Fair Market Value	Fair Market Value of Investments with Unrealized Losses
Marketable securities	\$ 62,385	\$ 36	\$ (267)	\$ 62,154	\$ 34,844
Long-term marketable securities	77,992	213	(7,903)	70,302	52,694
	<u>\$ 140,377</u>	<u>\$ 249</u>	<u>\$ (8,170)</u>	<u>\$ 132,456</u>	<u>\$ 87,538</u>

As of December 31, 2024, the fair market value of investments with unrealized losses less than one year and greater than one year totaled \$22.6 million and \$40.9 million, respectively.

As of December 31, 2023, the fair market value of investments with unrealized losses less than one year and greater than one year totaled \$22.3 million and \$65.2 million, respectively.

[Table of Contents](#)

Teradyne reviews its investments to identify and evaluate investments that have an indication of possible impairment. Based on this review, Teradyne determined that the unrealized losses related to these investments at December 31, 2024 and 2023 were not other than temporary.

The contractual maturities of investments in available-for-sale marketable securities held at December 31, 2024 were as follows:

	<u>Cost</u>	<u>Fair Value</u>
	(in thousands)	
Due within one year	\$ 46,349	\$ 46,312
Due after 1 year through 5 years	25,554	25,316
Due after 5 years through 10 years	8,648	8,232
Due after 10 years	36,151	27,210
Total	<u>\$ 116,702</u>	<u>\$ 107,070</u>

Contractual maturities of investments in available-for-sale marketable securities held at December 31, 2024 exclude debt mutual funds with the fair market value of \$9.0 million as they do not have a contractual maturity date.

Derivatives

Teradyne conducts business in various foreign countries, with certain transactions denominated in local currencies. As a result, Teradyne is exposed to risks relating to changes in foreign currency exchange rates. Teradyne's foreign currency risk management objective is to minimize the effect of exchange rate fluctuations associated with the remeasurement of monetary assets and liabilities denominated in foreign currencies, and changes in its cash inflows attributable to the forecasted cash flows from certain foreign currency denominated revenues.

To minimize the effect of exchange rate fluctuations associated with the remeasurement of monetary assets and liabilities denominated in foreign currencies, Teradyne enters into foreign currency forward contracts. The change in fair value of these derivatives is recorded directly in earnings and is used to offset the change in value of monetary assets and liabilities denominated in foreign currencies.

Teradyne also enters into foreign currency forward and option contracts designated as cash flow hedges to hedge the risk of changes in its cash inflows attributable to changes in foreign currency exchange rates. The cash flow hedges have maturities of less than six months and mature in the period of revenue recognition for certain products and services in backlog and forecasted to be recognized in a future period. Teradyne evaluates cash flow hedges for effectiveness at inception based on the critical terms match method. The hedges are not expected to incur any ineffectiveness however a quarterly qualitative assessment of effectiveness is done to determine if the critical terms match method remains appropriate to use. The change in fair value of the contracts is recorded in accumulated other comprehensive income (loss) and reclassified to earnings at maturity date.

Teradyne does not use derivative financial instruments for speculative purposes.

At December 31, 2024 and 2023, to hedge certain of its local currency balance sheet assets and liabilities, Teradyne had the following contracts to buy and sell non-U.S. currencies for U.S. dollars and other non-U.S. currencies with the following notional amounts:

	Net Notional Value	
	December 31, 2024	December 31, 2023
	(in millions)	
Currency Hedged (Buy/Sell)		
U.S. dollar/Taiwan dollar	\$ 14.5	\$ 42.7
U.S. dollar/Japanese yen	12.6	11.0
Danish krone/Chinese yuan	10.5	—
U.S. dollar/Korean won	4.2	7.2
U.S. dollar/British pound sterling	1.2	1.5
U.S. dollar/Danish krone	—	36.0
Singapore dollar/U.S. dollar	28.9	16.6
Euro/U.S. dollar	22.3	25.3
Danish krone/U.S. dollar	16.9	0.7
Philippine peso/U.S. dollar	9.4	10.1
Chinese yuan/U.S. dollar	1.6	1.0
	<u>\$ 122.1</u>	<u>\$ 152.1</u>

The change in the fair value of the outstanding contracts was a loss of \$0.6 million and a loss of \$1.8 million, respectively, at December 31, 2024 and 2023.

Unrealized gains and losses on foreign currency forward contracts and foreign currency remeasurement gains and losses on monetary assets and liabilities are included in other (income) expense, net.

At December 31, 2024 and 2023, Teradyne had the following cash flow hedge contracts to buy and sell non-U.S. currencies for U.S. dollars with the following notional amounts:

	Net Notional Value	
	December 31, 2024	December 31, 2023
	(in millions)	
Currency Hedged (Buy/Sell)		
U.S. dollar/Japanese yen	\$ 15.6	\$ 35.5
Total	<u>\$ 15.6</u>	<u>\$ 35.5</u>

The change in the fair value of the outstanding cash flow hedge contracts was a gain of \$0.9 million at December 31, 2024 and a gain of \$0.6 million at December 31, 2023.

Unrealized gains and losses on foreign currency cash flow hedge contracts are included in accumulated other comprehensive income (loss). At maturity, the gains or losses associated with cash flow hedge contracts are recorded to revenue.

On November 7, 2023, in connection with the agreement to acquire 10% investment in Technoprobe S.p.A, Teradyne purchased a call option to buy 481.0 million Euros. The expiration date of the option was April 26, 2024. At December 31, 2023, the fair value of the outstanding contract was \$17.4 million and an unrealized gain of \$7.5 million was recorded in other (income) expense, net. On April 12, 2024, Teradyne entered into a forward to buy 481.0 million Euros which expired on May 23, 2024. For the year ended December 31, 2024, a realized loss of \$9.8 million was recorded in 'Other (income) expense, net' in the consolidated statement of operations.

The following table summarizes the fair value of derivative instruments as of December 31, 2024 and 2023:

	Balance Sheet Location	December 31,	December 31,
		2024	2023
(in thousands)			
Derivatives not designated as hedging instruments:			
Foreign exchange forward contracts	Other current assets	\$ 725	\$ 733
Foreign exchange option contracts	Other current assets	—	17,364
Foreign exchange forward contracts	Other current liabilities	(1,324)	(2,545)
Derivatives designated as hedging instruments:			
Foreign exchange forward contracts	Other current assets	940	648
Total derivatives		\$ 341	\$ 16,200

The following table summarizes the effect of derivative instruments in the statements of operations recognized for the years ended December 31, 2024, 2023, and 2022:

	Location of (Gains) Losses Recognized in Statement of Operations	December 31,	December 31,	December 31,
		2024	2023	2022
(in thousands)				
Derivatives not designated as hedging instruments:				
Foreign exchange forward contracts (1)	Other (income) expense, net	\$ 3,226	\$ (1,843)	\$ (2,482)
Foreign exchange option contracts	Other (income) expense, net	9,764	(7,464)	—
Derivatives designated as hedging instruments:				
Foreign exchange forward and option contracts	Revenue	(2,402)	(3,127)	(251)
Total derivatives		\$ 10,588	\$ (12,434)	\$ (2,733)

- (1) The table does not reflect the corresponding gains and losses from the remeasurement of the monetary assets and liabilities denominated in foreign currencies. For the years ended December 31, 2024, 2023 and 2022, net losses from remeasurement of monetary assets and liabilities denominated in foreign currencies were \$2.8 million, \$10.9 million, and \$10.8 million, respectively.

See Note K: “Debt” regarding derivatives related to the convertible senior notes.

Concentration of Credit Risk

Financial instruments which potentially subject us to concentrations of credit risk consist principally of cash equivalents, marketable securities, forward currency contracts and accounts receivable. Our cash equivalents consist primarily of money market funds invested in U.S. Treasuries and government agencies. Our fixed income available-for-sale marketable securities have a minimum rating of AA by one or more of the major credit rating agencies. We place forward currency contracts with high credit-quality financial institutions in order to minimize credit risk exposure. Concentrations of credit risk with respect to accounts receivable are limited due to the large number of geographically dispersed customers. We perform ongoing credit evaluations of our customers’ financial condition and from time to time may require customers to provide a letter of credit from a bank to secure accounts receivable. As of December 31, 2024, two customers of our Semiconductor Test segment, Taiwan Semiconductor Manufacturing Co. and SK Hynix Inc, each accounted for 10% of our accounts receivable balance. As of December 31, 2023, a customer of our Semiconductor Test segment, Texas Instruments Inc., accounted for 18% of our accounts receivable balance.

J. LEASES

Teradyne has facility and auto leases, which are accounted for as operating leases. Teradyne’s facility leases are primarily used for administrative functions, research and development, manufacturing, and storage and distribution. Remaining lease terms range from less than one year to twelve years.

For the years ended December 31, 2024, 2023 and 2022, total lease expense was \$43.6 million, \$42.7 million, and \$40.1 million, respectively, and included \$15.9 million, \$15.5 million, and \$14.1 million, respectively, of variable lease costs and \$1.3 million, \$1.3 million, and \$2.0 million, respectively, of costs related to short-term leases, which are not recorded on the consolidated balance sheets.

At December 31, 2024, the weighted average remaining lease term and weighted average discount rate for operating leases was 5.8 years and 5.5%, respectively. At December 31, 2023, the weighted average remaining lease term and weighted average discount rate for operating leases was 6.3 years and 5.2%, respectively.

Supplemental cash flows information related to leases was as follows:

	For the Years Ended		
	December 31, 2024	December 31, 2023	December 31, 2022
	(in thousands)		
Cash paid for amounts included in the measurement of lease liabilities included in operating cash flows	\$ 23,990	\$ 26,059	\$ 20,775
Right-of-use assets obtained in exchange for new lease obligations	18,358	17,987	26,149

Maturities of lease liabilities as of December 31, 2024 were as follows:

	Operating Lease (in thousands)
2025	\$ 21,872
2026	17,729
2027	13,991
2028	9,608
2029	7,332
Thereafter	20,760
Total lease payments	91,292
Less imputed interest	(14,671)
Total lease liabilities	\$ 76,621

K. DEBT

Convertible Senior Notes

On December 12, 2016, Teradyne completed a private offering of \$460.0 million aggregate principal amount of 1.25% convertible senior unsecured notes (the “Notes”) and received net proceeds, after issuance costs, of approximately \$450.8 million, \$33.0 million of which was used to pay the net cost of the convertible note hedge transactions and \$50.1 million of which was used to repurchase 2.0 million shares of Teradyne’s common stock under its existing stock repurchase program from purchasers of the Notes in privately negotiated transactions effected through one of the initial purchasers or its affiliates conducted concurrently with the pricing of the Note offering. The Notes bore interest at a rate of 1.25% per year payable semiannually in arrears on June 15 and December 15 of each year. The notes matured on December 15, 2023.

Concurrent with the offering of the Notes, Teradyne entered into convertible note hedge transactions (the “Note Hedge Transactions”) with the initial purchasers or their affiliates (the “Option Counterparties”). The Note Hedge Transactions cover, subject to customary anti-dilution adjustments, the number of shares of the common stock that underlie the Notes. Separately and concurrent with the pricing of the Notes, Teradyne entered into warrant transactions with the Option Counterparties (the “Warrant Transactions”) in which it sold net-share-settled (or, at its election subject to certain conditions, cash-settled) warrants to the Option Counterparties. These transactions have been accounted for as an adjustment to Teradyne’s shareholders’ equity. The Warrant Transactions, which began expiring on March 18, 2024, and continued to expire through July 10, 2024, covered, subject to customary anti-dilution adjustments, approximately 1.3 million shares of common stock. During the year ended December 31, 2024, 14.7 million warrants expired, resulting in the issuance of 10.0 million shares of Teradyne common stock, respectively. As of the final date of expiration, July 10, 2024, the strike price of the warrants was approximately \$39.35 per share. The Warrant Transactions resulted in additional shares of Teradyne’s common stock being issued to the extent that the market price per share of Teradyne’s common stock, as measured under the terms of the Warrant Transactions, exceeded the applicable strike price of the warrants.

The interest expense on Teradyne’s senior notes for the years ended December 31, 2024, and December 31, 2023, was as follows:

	For the Years Ended	
	December 31, 2024	December 31, 2023
	(in thousands)	
Contractual interest expense on the coupon	\$ —	\$ 312
Amortization of the issuance fees recognized as interest expense	—	113
Total interest expense on the convertible debt	<u>\$ —</u>	<u>\$ 425</u>

Revolving Credit Facility

On May 1, 2020, Teradyne entered into a credit agreement (the “Credit Agreement”) with Truist Bank, as administrative agent and collateral agent, and the lenders party thereto. The Credit Agreement provides for a three-year, senior secured revolving credit facility of \$400.0 million (the “Credit Facility”).

On December 10, 2021, the Credit Agreement was amended to extend the maturity date of the Credit Facility to December 10, 2026. On October 5, 2022, the Credit Agreement was amended to increase the amount of the Credit Facility to \$750.0 million from \$400.0 million. On November 7, 2023, the Credit Agreement was amended to allow for the purchase of the shares of Technoprobe.

The Credit Agreement provides that, subject to customary conditions, Teradyne may seek to obtain from existing or new lenders the available incremental amount under the Credit Facility, not to exceed the greater of \$200.0 million or 15% of consolidated EBIDTA. The interest rate applicable to loans under the Credit Facility are, at Teradyne’s option, equal to either a base rate plus a margin ranging from 0.00% to 0.75% per annum or SOFR plus a margin ranging from 1.10% to 1.85% per annum, based on the consolidated leverage ratio of Teradyne. In addition, Teradyne will pay a commitment fee on the unused portion of the commitments under the Credit Facility ranging from 0.15% to 0.25% per annum, based on the then applicable consolidated leverage ratio.

Teradyne is not required to repay any loans under the Credit Facility prior to maturity, subject to certain customary exceptions. Teradyne is permitted to prepay all or any portion of the loans under the Credit Facility prior to maturity without premium or penalty, other than customary SOFR breakage costs.

The Credit Agreement contains customary events of default, representations, warranties and affirmative and negative covenants that, among other things, limit Teradyne’s ability to sell assets, grant liens on assets, incur other secured indebtedness and make certain investments and restricted payments, all subject to exceptions set forth in the Credit Agreement. The Credit Agreement also requires Teradyne to satisfy two financial ratios measured as of the end of each fiscal quarter; a consolidated leverage ratio and an interest coverage ratio.

The Credit Facility is guaranteed by certain of Teradyne’s domestic subsidiaries and collateralized by assets of Teradyne and such subsidiaries, including a pledge of 65% of the capital stock of certain foreign subsidiaries.

On May 16, 2024, Teradyne borrowed \$185.0 million under the Credit Agreement to support the acquisition of 10% of the issued and outstanding shares of Technoprobe. Teradyne fully repaid its borrowings on the revolving credit facility prior to December 31, 2024. There was no outstanding revolver balance as of December 31, 2024.

As of February 20, 2025, the Credit Agreement was undrawn and Teradyne was in compliance with all covenants under the Credit Agreement.

L. ACCUMULATED OTHER COMPREHENSIVE INCOME (LOSS)

Changes in accumulated other comprehensive income (loss), which is presented net of tax, consist of the following:

	Foreign Currency Translation Adjustment	Unrealized Gains (Losses) on Marketable Securities	Unrealized (Losses) Gains on Cash Flow Hedges (in thousands)	Retirement Plans Prior Service Credit	Total
Balance at December 31, 2022, net of tax of \$0, \$(2,308), \$(708), \$(1,130), respectively	\$ (39,849)	\$ (8,661)	\$ (2,517)	\$ 1,159	\$ (49,868)
Other comprehensive gain before reclassifications, net of tax of \$0, \$568, \$1,537, \$0, respectively	17,407	2,423	5,464	—	25,294
Amounts reclassified from accumulated other comprehensive income (loss), net of tax of \$0, \$12, \$(686), \$(2), respectively	—	44	(2,441)	(7)	(2,404)
Net current period other comprehensive gain (loss), net of tax of \$0 \$580, \$851, \$(2), respectively	17,407	2,467	3,023	(7)	22,890
Balance at December 31, 2023, net of tax of \$0, \$(1,728), \$143, \$(1,132), respectively	\$ (22,442)	\$ (6,194)	\$ 506	\$ 1,152	\$ (26,978)
Other comprehensive gain before reclassifications, net of tax of \$0, \$(470), \$593, \$0, respectively	(52,847)	(1,699)	2,100	—	(52,446)
Amounts reclassified from accumulated other comprehensive income (loss), net of tax of \$0, \$24, \$(527), \$(2), respectively	—	86	(1,875)	(7)	(1,796)
Net current period other comprehensive gain (loss), net of tax of \$0 \$(446), \$66, \$(2), respectively	(52,847)	(1,613)	225	(7)	(54,242)
Balance at December 31, 2024, net of tax of \$0, \$(2,174), \$209, \$(1,134), respectively	\$ (75,289)	\$ (7,807)	\$ 731	\$ 1,145	\$ (81,220)

Reclassifications out of accumulated other comprehensive income (loss) to the statements of operations for the years ended December 31, 2024, 2023, and 2022, were as follows:

Details about Accumulate Other Comprehensive Income (Loss) Components	For the years ended			Affected Line Item in the Statements of Operations
	December 31, 2024	December 31, 2023 (in thousands)	December 31, 2022	
Available-for-sale marketable securities				
Unrealized (losses) gains, net of tax of \$(24), \$(12), \$(25), respectively	\$ (86)	\$ (44)	\$ (301)	Other (income) expense, net
Cash flow hedges:				
Unrealized gains, net of tax of \$527, \$686, \$0, respectively	1,875	2,441	—	Revenue
Defined benefit pension and postretirement plans:				
Amortization of prior service benefit, net of tax of \$2, \$2, \$2, respectively	7	7	7	(a)
Total reclassifications, net of tax of \$505, \$676, \$(23), respectively	\$ 1,796	\$ 2,404	\$ (294)	Net income

(a) The amortization of prior service credit is included in the computation of net periodic pension cost and postretirement benefit; see Note Q: “Retirement Plans.”

M. GOODWILL AND INTANGIBLE ASSETS

Goodwill

Teradyne performs its annual goodwill impairment test as required under the provisions of ASC 350-10, “Intangibles—Goodwill and Other,” on December 31 of each fiscal year unless interim indicators of impairment exist. Goodwill is considered to be impaired when the net book value of a reporting unit exceeds its estimated fair value.

Teradyne has the option to perform a qualitative assessment to determine whether it is more likely than not that the fair value of a reporting unit is less than its carrying amount. If Teradyne determines this is the case, Teradyne is required to perform a quantitative

goodwill impairment test to identify potential goodwill impairment and measure the amount of goodwill impairment loss to be recognized. If Teradyne determines that it is more likely than not that the fair value of the reporting unit is greater than its carrying amounts, the quantitative goodwill impairment test is not required. In performing the quantitative goodwill impairment test, Teradyne determines the fair value of a reporting unit using the results derived from an income approach and a market approach, weighting the fair value determined under each approach to determine an estimated fair value for a reporting unit. The income approach is estimated through the discounted cash flows (“DCF”) analysis. Determining fair value requires the exercise of significant judgment, including judgments about appropriate discount rates, perpetual growth rates, and the amount and timing of expected future cash flows. Discount rates are based on a weighted average cost of capital (“WACC”), which represents the average rate a business must pay its providers of debt and equity, plus a risk premium. The WACC used to test goodwill is derived from a group of comparable companies. The cash flows employed in the DCF analysis are derived from internal forecasts and external market forecasts. The market approach estimates the fair value of the reporting unit by utilizing the market comparable method which is based on revenue and earnings multiples from comparable companies. If the estimated fair value of a reporting unit exceeds its carrying amount, goodwill of the reporting unit is not impaired. If the carrying amount of a reporting unit exceeds its estimated fair value, then the goodwill is written down by the amount that carrying value exceeds the fair value of the reporting unit, but not below zero.

In the fourth quarter of 2024, Teradyne performed the annual goodwill impairment test, completing a quantitative assessment for the Robotics reporting unit and a qualitative assessment for the Wireless Test reporting unit and for a reporting unit within System Test. There was no impairment as a result of the annual test performed in the fourth quarter of 2024. Key assumptions in the goodwill valuation model are forecasted revenues, discount rate, earnings before interest and taxes, and revenue multiples from comparable companies. A change in any of these key assumptions could result in the reporting unit being impaired in a future period.

In the fourth quarter of 2023, Teradyne performed the annual goodwill impairment test, completing a quantitative assessment for the Robotics reporting unit and a qualitative assessment for the Wireless Test reporting unit and for a reporting unit within System Test reporting units. There was no impairment as a result of the annual test performed in the fourth quarter of 2023. Key assumptions in the goodwill valuation model are forecasted revenues, discount rate, earnings before interest and taxes, and revenue multiples from comparable companies. A change in any of these key assumptions could result in the reporting unit being impaired in a future period.

The changes in the carrying amount of goodwill by reportable segments for the years ended December 31, 2024 and 2023 are as follows:

	Robotics	Semiconductor Test	All Other	Total
	(in thousands)			
Balance at December 31, 2022				
Goodwill	\$ 383,166	\$ 262,077	\$ 520,518	\$ 1,165,761
Accumulated impairment losses	—	(260,540)	(502,026)	(762,566)
Total Goodwill	383,166	1,537	18,492	403,195
Foreign currency translation adjustment	12,297	160	—	12,457
Balance at December 31, 2023				
Goodwill	395,463	262,237	520,518	1,178,218
Accumulated impairment losses	—	(260,540)	(502,026)	(762,566)
Total Goodwill	395,463	1,697	18,492	415,652
Foreign currency translation adjustment	(20,165)	(120)	—	(20,285)
Balance at December 31, 2024				
Goodwill	375,298	262,117	520,518	1,157,933
Accumulated impairment losses	—	(260,540)	(502,026)	(762,566)
Total Goodwill	<u>\$ 375,298</u>	<u>\$ 1,577</u>	<u>\$ 18,492</u>	<u>\$ 395,367</u>

Intangible Assets

Teradyne reviews long-lived assets for impairment whenever events or changes in business circumstances indicate that the carrying amount of the assets may not be fully recoverable or that the useful lives of these assets are no longer appropriate.

There were no events or circumstances indicating that the carrying value of intangible and long-lived assets may not be recoverable in 2024, 2023 and 2022.

Amortizable intangible assets consist of the following and are included in intangible assets, net on the balance sheets:

	December 31, 2024			
	Gross Carrying Amount (1)	Accumulated Amortization (1)	Foreign Currency Translation Adjustment	Net Carrying Amount
	(in thousands)			
Developed technology	\$ 267,706	\$ (255,448)	\$ (5,820)	\$ 6,438
Customer relationships	52,109	(49,562)	204	2,751
Tradenames and trademarks	59,007	(50,805)	(1,464)	6,738
Total intangible assets	<u>\$ 378,822</u>	<u>\$ (355,815)</u>	<u>\$ (7,080)</u>	<u>\$ 15,927</u>

	December 31, 2023			
	Gross Carrying Amount (1)	Accumulated Amortization (1)	Foreign Currency Translation Adjustment	Net Carrying Amount
	(in thousands)			
Developed technology	\$ 267,706	\$ (243,191)	\$ (5,343)	\$ 19,172
Customer relationships	52,109	(47,850)	232	4,491
Tradenames and trademarks	59,007	(46,021)	(1,245)	11,741
Total intangible assets	<u>\$ 378,822</u>	<u>\$ (337,062)</u>	<u>\$ (6,356)</u>	<u>\$ 35,404</u>

(1) In 2023, \$9.3 million of amortizable intangible assets became fully amortized and have been eliminated from the gross carrying amount and accumulated amortization.

Aggregate intangible assets amortization expense for the years ended December 31, 2024, 2023, and 2022, was \$18.8 million, \$19.0 million, and \$19.3 million, respectively. Estimated intangible assets amortization expense for each of the five succeeding fiscal years is as follows:

Year	Amortization Expense (in thousands)
2025	\$ 11,125
2026	2,325
2027	1,108
2028	1,027
2029	342
Thereafter	—

N. COMMITMENTS AND CONTINGENCIES

Purchase Commitments

As of December 31, 2024, Teradyne had entered into non-cancelable purchase commitments for certain components and materials. The purchase commitments covered by the agreements aggregate to approximately \$419.8 million, of which \$409.6 million is for less than one year.

Legal Claims

Teradyne is subject to various legal proceedings and claims which have arisen in the ordinary course of business such as, but not limited to, patent, employment, commercial and environmental matters. Teradyne believes that it has meritorious defenses against all pending claims and intends to vigorously contest them. While it is not possible to predict or determine the outcomes of any pending claims or to provide possible ranges of losses that may arise, Teradyne believes the potential losses associated with all of these actions are unlikely to have a material adverse effect on its business, financial position or results of operations.

On March 8, 2021, Industrial Automation LLC, sellers of AutoGuide, submitted a demand for arbitration against Teradyne and AutoGuide in Wilmington, Delaware alleging that Teradyne and AutoGuide breached certain provisions of the Membership Interests Purchase Agreement (the "Purchase Agreement"), dated as of October 18, 2019, among Industrial Automation LLC, Teradyne and AutoGuide. The arbitration demand sought full acceleration of the maximum earn-out amount payable under the Purchase Agreement.

or \$106.9 million, for the alleged breach of the earn-out provisions of the Purchase Agreement. On March 25, 2022, the arbitration claim was settled for \$26.7 million. As a result, Teradyne has no remaining earn-out obligations.

Guarantees and Indemnification Obligations

Teradyne provides indemnification, to the extent permitted by law, to its officers, directors, employees and agents for liabilities arising from certain events or occurrences, while the officer, director, employee, or agent, is or was serving, at Teradyne's request in such capacity. Teradyne may enter into indemnification agreements with certain of its officers and directors. With respect to acquisitions, Teradyne provides indemnifications to or assumes indemnification obligations for the current and former directors, officers and employees of the acquired companies in accordance with the acquired companies' by-laws and charter. As a matter of practice, Teradyne has maintained directors' and officers' liability insurance coverage including coverage for directors and officers of acquired companies.

Teradyne enters into agreements in the ordinary course of business with customers, resellers, distributors, integrators and suppliers. Most of these agreements require Teradyne to defend and/or indemnify the other party against intellectual property infringement claims brought by a third party with respect to Teradyne's products. From time to time, Teradyne also indemnifies customers and business partners for damages, losses and liabilities they may suffer or incur relating to personal injury, personal property damage, product liability, breach of confidentiality obligations and environmental claims relating to the use of Teradyne's products and services or resulting from the acts or omissions of Teradyne, its employees, authorized agents or subcontractors. On occasion, Teradyne has also provided guarantees to customers regarding the delivery and performance of its products in addition to the warranty described below.

As a matter of ordinary course of business, Teradyne warrants that its products will substantially perform in accordance with its standard published specifications in effect at the time of delivery. Most warranties have a one-year duration commencing from installation. A provision is recorded upon revenue recognition to cost of revenues for estimated warranty expense based upon historical experience. When Teradyne receives revenue for extended warranties beyond the standard duration, the revenue is deferred and recognized on a straight-line basis over the contract period. Related costs are expensed as incurred. As of December 31, 2024 and 2023, Teradyne had a product warranty accrual of \$13.0 million and \$15.7 million, respectively, included in other accrued liabilities, and revenue deferrals related to extended warranties of \$41.6 million and \$34.9 million, respectively, included in short and long-term deferred revenue and customer advances.

In addition, in the ordinary course of business, Teradyne provides minimum purchase guarantees to certain vendors to ensure continuity of supply against the market demand. Although some of these guarantees provide penalties for cancellations and/or modifications to the purchase commitments as the market demand decreases, most of the guarantees do not. Therefore, as the market demand decreases, Teradyne re-evaluates these guarantees and determines what charges, if any, should be recorded.

With respect to its agreements covering product, business or entity divestitures and acquisitions, Teradyne provides certain representations, warranties and covenants to purchasers and agrees to indemnify and hold such purchasers harmless against breaches of such representations, warranties and covenants. Many of the indemnification claims have a definite expiration date while some remain in force indefinitely. With respect to its acquisitions, Teradyne may, from time to time, assume the liability for certain events or occurrences that took place prior to the date of acquisition.

As a matter of ordinary course of business, Teradyne occasionally guarantees certain indebtedness obligations of its subsidiary companies, limited to the borrowings from financial institutions, purchase commitments to certain vendors, and lease commitments to landlords.

Based on historical experience and information known as of December 31, 2024, and 2023, except for product warranty, Teradyne has not recorded any liabilities for these guarantees and obligations because the amount would be immaterial.

O. NET INCOME PER COMMON SHARE

The following table sets forth the computation of basic and diluted net income per common share:

	2024	2023	2022
	(in thousands, except per share amounts)		
Net income for basic and diluted net income per share	\$ 542,372	\$ 448,752	\$ 715,501
Weighted average common shares-basic	159,083	154,310	158,434
Effect of dilutive potential common shares:			
Convertible note hedge warrant shares (1)	3,563	8,897	8,806
Restricted stock units	651	423	657
Stock options	11	34	52
Employee stock purchase rights	6	7	22
Incremental shares from assumed conversion of convertible notes (2)	—	633	1,763
Dilutive potential common shares	4,231	9,994	11,300
Weighted average common shares-diluted	163,314	164,304	169,734
Net income per common share-basic	\$ 3.41	\$ 2.91	\$ 4.52
Net income per common share-diluted	\$ 3.32	\$ 2.73	\$ 4.22

- (1) Convertible notes hedge warrant shares were calculated using the difference between the average Teradyne stock price for the period and the warrant price, multiplied by the number of warrant shares. The result of this calculation, representing the total intrinsic value of the warrant, was divided by the average Teradyne stock price for the period.
- (2) Incremental shares from the assumed conversion of the convertible notes was calculated using the difference between the average Teradyne stock price for the period and the conversion price, multiplied by the number of convertible notes shares. The result of this calculation, representing the total intrinsic value of the convertible debt, was divided by the average Teradyne stock price for the period.

The computation of diluted net income per common share for 2024 and 2023 excludes the effect of the potential exercise of stock options to purchase approximately 0.1 million shares and restricted stock units to purchase approximately 0.1 million shares because the effect would have been anti-dilutive.

P. RESTRUCTURING AND OTHER

During the year ended December 31, 2024, Teradyne recorded \$5.2 million of severance charges related to headcount reductions of 98 people primarily in Robotics and Semiconductor Test, which included charges related to a voluntary early retirement program for employees meeting certain conditions, \$3.6 million of acquisition and divestiture expenses, and \$1.3 million of charges related to lease terminations.

During the year ended December 31, 2023, Teradyne recorded \$14.7 million of severance charges related to headcount reductions of 215 people primarily in Semiconductor Test and Robotics, which included charges related to a voluntary early retirement program for employees meeting certain conditions, \$3.1 million of acquisition and divestiture expenses related to Technoprobe transaction, a \$1.5 million contract termination charge, and a charge of \$1.1 million for an increase in environmental liabilities.

During the year ended December 31, 2022, Teradyne recorded a charge of \$14.7 million related to the arbitration claim filed against Teradyne and AutoGuide related to an earn-out dispute, which was settled on March 25, 2022 for \$26.7 million, \$2.9 million of severance charges primarily in Robotics, and a charge of \$2.7 million for an increase in environmental and legal liabilities, partially offset by a \$3.4 million gain on sale of asset.

Q. RETIREMENT PLANS

ASC 715, “*Compensation—Retirement Benefits*,” requires an employer with defined benefit plans or other postretirement benefit plans to recognize an asset or a liability on its balance sheet for the overfunded or underfunded status of the plans as defined by ASC 715. The pension asset or liability represents a difference between the fair value of the pension plan’s assets and the projected benefit obligation at December 31. Teradyne uses a December 31 measurement date for all of its plans.

Defined Benefit Pension Plans

Teradyne has defined benefit pension plans covering a portion of domestic employees and employees of certain non-U.S. subsidiaries. Benefits under these plans are based on employees' years of service and compensation. Teradyne's funding policy is to make contributions to the plans in accordance with local laws and to the extent that such contributions are tax deductible. The assets of these plans consist primarily of fixed income and equity securities. In addition, Teradyne has an unfunded supplemental executive defined benefit plan in the United States to provide retirement benefits in excess of levels allowed by the Employment Retirement Income Security Act ("ERISA") and the Internal Revenue Code (the "IRC"), as well as unfunded qualified foreign plans.

In 2024, Teradyne purchased a group annuity contract for its retiree participants in the U.S. qualified pension plan. Under the group annuity, the accrued pension obligation for 132 retiree participants were transferred to an insurance company. The reduction in the pension benefit obligation and pension assets was \$23.4 million. During the year ended December 31, 2024, Teradyne recorded settlement expense of \$0.4 million related to the retiree group annuity transaction.

In 2024, Teradyne's projected benefit obligations decreased primarily due to the \$23.4 million purchase of a group annuity contract for its retiree participants in the U.S. qualified pension plan, actuarial gains of \$8.0 million across all pension plans from increases in discount rates, and \$2.0 million of gains from foreign exchange effects for foreign plans. In 2023, Teradyne's projected benefit obligations increased primarily due to actuarial losses of approximately \$6.0 million across all pension plans from increases in discount rates, and approximately \$1.0 million of losses from foreign exchange effects for foreign plans.

The December 31 balances of these defined benefit pension plans assets and obligations are shown below:

	2024		2023	
	United States	Foreign	United States	Foreign
(in thousands)				
Assets and Obligations				
Change in benefit obligation:				
Projected benefit obligation:				
Beginning of year	\$ 144,187	\$ 33,984	\$ 143,814	\$ 29,935
Service cost	881	446	1,063	446
Interest cost	6,292	953	6,888	1,057
Actuarial (gain) loss	(6,014)	(1,972)	3,229	2,738
Benefits paid	(11,658)	(955)	(10,807)	(947)
Retiree annuity purchase	(23,386)	—	—	—
Liability (gain) loss due to settlement	394	(195)	—	(254)
Non-U.S. currency movement	—	(1,988)	—	1,009
End of year	<u>110,696</u>	<u>30,273</u>	<u>144,187</u>	<u>33,984</u>
Change in plan assets:				
Fair value of plan assets:				
Beginning of year	112,617	1,929	111,760	2,087
Actual return on plan assets	779	77	8,613	43
Company contributions	3,065	1,024	3,051	1,028
Benefits paid	(11,658)	(955)	(10,807)	(947)
Retiree annuity purchase	(23,386)	—	—	—
Settlements gain	—	(195)	—	(254)
Non-U.S. currency movement	—	108	—	(28)
End of year	<u>81,417</u>	<u>1,988</u>	<u>112,617</u>	<u>1,929</u>
Funded status	<u>\$ (29,279)</u>	<u>\$ (28,285)</u>	<u>\$ (31,570)</u>	<u>\$ (32,055)</u>

The following table provides amounts recorded within the account line items of the statements of financial position as of December 31:

[Table of Contents](#)

	2024		2023	
	United States	Foreign	United States	Foreign
	(in thousands)			
Retirement plans assets	\$ 11,994	\$ —	\$ 11,504	\$ —
Accrued employees' compensation and withholdings	(3,263)	(969)	(3,110)	(1,255)
Retirement plans liabilities	(38,010)	(27,316)	(39,964)	(30,800)
Funded status	<u>\$ (29,279)</u>	<u>\$ (28,285)</u>	<u>\$ (31,570)</u>	<u>\$ (32,055)</u>

The accumulated benefit obligation for the United States defined benefit pension plans was \$109.0 million and \$142.2 million at December 31, 2024 and 2023, respectively. The accumulated benefit obligation for foreign defined benefit pension plans was \$29.1 million and \$32.6 million at December 31, 2024 and 2023, respectively.

Information for pension plans with an accumulated benefit obligation in excess of plan assets as of December 31:

	2024		2023	
	United States	Foreign	United States	Foreign
	(in millions)			
Projected benefit obligation	\$ 41.3	\$ 30.3	\$ 43.1	\$ 34.0
Accumulated benefit obligation	41.1	29.1	42.6	32.5
Fair value of plan assets	—	2.0	—	1.9

Expense

For the years ended December 31, 2024, 2023, and 2022, Teradyne's net periodic pension cost (income) was comprised of the following:

	2024		2023		2022	
	United States	Foreign	United States	Foreign	United States	Foreign
	(in thousands)					
Components of Net Periodic Pension Cost (Income):						
Service cost	\$ 881	\$ 446	\$ 1,063	\$ 446	\$ 1,588	\$ 784
Interest cost	6,292	953	6,888	1,057	4,886	482
Expected return on plan assets	(4,865)	(77)	(5,194)	(45)	(2,927)	(75)
Net actuarial (gain) loss	(1,929)	(1,948)	18	2,735	(11,170)	(13,259)
Settlement (gain) loss	394	(24)	(209)	5	—	—
Total net periodic pension cost (income)	<u>\$ 773</u>	<u>\$ (650)</u>	<u>\$ 2,566</u>	<u>\$ 4,198</u>	<u>\$ (7,623)</u>	<u>\$ (12,068)</u>

Weighted Average Assumptions to Determine Net Periodic Pension Cost at January 1:

	2024		2023		2022	
	United States	Foreign	United States	Foreign	United States	Foreign
Discount rate	4.7 %	3.0 %	3.5 %	3.5 %	2.5 %	1.1 %
Expected return on plan assets	4.7	2.5	4.8	1.8	2.0	4.0
Salary progression rate	2.5	2.4	2.4	2.1	2.4	2.2

Weighted Average Assumptions to Determine Pension Obligations at December 31:

	2024		2023	
	United States	Foreign	United States	Foreign
Discount rate	5.4 %	3.3 %	4.7 %	3.0 %
Salary progression rate	2.5	2.4	2.5	2.4

In developing the expected return on plan assets assumption, Teradyne evaluates input from its investment manager and pension consultants, including their forecast of asset class return expectations. Teradyne believes that 4.8% was an appropriate rate to use for fiscal year 2024 for the U.S. Qualified Pension Plan ("U.S. Plan").

[Table of Contents](#)

Teradyne recognizes net actuarial gains and losses and the change in the fair value of the plan assets in its operating results in the year in which they occur or upon any interim remeasurement of the plans. Teradyne calculates the expected return on plan assets using the fair value of the plan assets. Actuarial gains and losses are generally measured annually as of December 31 and, accordingly, recorded during the fourth quarter of each year or upon any interim remeasurement of the plans.

The discount rate utilized to determine future pension obligations for the U.S. Plan is based on FTSE Pension Index adjusted for the plan's expected cash flows and was 5.4% at December 31, 2024, up from 4.7% at December 31, 2023.

Plan Assets

As of December 31, 2024, the fair value of Teradyne's pension plans' assets totaled \$83.4 million, of which \$81.4 million was related to the U.S. Plan and \$2.0 million was related to the Taiwan defined benefit pension plan. Substantially all of Teradyne's pension plans' assets are held in individual trusts, which were established for the investment of assets of Teradyne's sponsored retirement plans.

The following table provides weighted average pension asset allocation by asset category at December 31, 2024 and 2023:

	2024		2023	
	United States	Foreign	United States	Foreign
Fixed income securities	94.0 %	— %	94.0 %	— %
Equity securities	5.0	—	5.0	—
Other	1.0	100.0	1.0	100.0
	<u>100.0 %</u>	<u>100.0 %</u>	<u>100.0 %</u>	<u>100.0 %</u>

The assets of the U.S. Plan are overseen by the Teradyne Fiduciary Committee which is comprised of members of senior management drawn from appropriate diversified levels of the management team. The Fiduciary Committee is responsible for setting the policy that provides the framework for management of the U.S. Plan assets. In accordance with its responsibilities, the Fiduciary Committee meets on a regular basis to review the performance of the U.S. Plan assets and compliance with the investment policy. The policy sets forth an investment structure for managing U.S. Plan assets, including setting the asset allocation ranges, which are expected to provide an appropriate level of overall diversification required to maximize the long-term return on plan assets for a prudent and reasonable level of risk given prevailing market conditions, total investment return over the long term, and preservation of capital, while maintaining sufficient liquidity to pay the benefits of the U.S. Plan. The investment portfolio will not, at any time, have a direct investment in Teradyne stock. It may have indirect investment in Teradyne stock, if one of the funds selected by the investment manager invests in Teradyne stock. In developing the asset allocation ranges, third party asset allocation studies are periodically performed that consider the current and expected positions of the plan assets and funded status. Based on this study and other appropriate information, the Fiduciary Committee establishes asset allocation ranges taking into account acceptable risk targets and associated returns. The investment return objectives are to avoid excessive volatility and produce a rate of return that at least matches the Policy Index identified below. The manager's investment performance is reviewed at least annually. Results for the total portfolio and for each major category of assets are evaluated in comparison with appropriate market indices and the Policy Index.

The target asset allocation and the index for each asset category for the U.S. Plan, per the investment policy, are as follows:

<u>Asset Category:</u>	<u>Policy Index:</u>	<u>Target Allocation</u>
U.S. corporate fixed income	Bloomberg U.S. Corporate A or Better Index, 20+ Year Index	66 %
U.S. corporate fixed income	Bloomberg U.S. Intermediate Corporate ex Baa Index	9
U.S. government fixed income	Bloomberg U.S. 3 - 10 year Treasury Bond Index	12
U.S. government fixed income	Bloomberg U.S. Government Bond Index	2
Global equity	MSCI World Index	5
High yield fixed income	ICE BofA BB-B U.S. High Yield Constrained Index	5
Cash	ICE BofA 3-Month Treasury Bill Index	1

Teradyne's U.S. Plan invests primarily in common trust funds. Units held in the common trust funds are valued at the unit price as reported by the investment manager based on the asset value of the underlying investments; underlying investments in equity securities are valued at the last reported sales price, and underlying investments in fixed-income securities are generally valued using methods based upon market transactions for comparable securities.

[Table of Contents](#)

During the years ended December 31, 2024 and December 31, 2023, there were no transfers of pension assets in or out of Level 1, Level 2, and Level 3.

The fair value of pension plan assets by asset category and by level at December 31, 2024 and December 31, 2023 were as follows:

	December 31, 2024							
	United States				Foreign			
	Level 1	Level 2	Level 3	Total	Level 1	Level 2	Level 3	Total
	(in thousands)							
Fixed income securities:								
Corporate debt securities	\$ —	\$ 65,160	\$ —	\$ 65,160	\$ —	\$ —	\$ —	\$ —
U.S. government securities	—	11,414	—	11,414	—	—	—	—
Global equity	—	4,025	—	4,025	—	—	—	—
Other	—	—	—	—	—	1,988	—	1,988
Cash and cash equivalents	818	—	—	818	—	—	—	—
Total	\$ 818	\$ 80,599	\$ —	\$ 81,417	\$ —	\$ 1,988	\$ —	\$ 1,988

	December 31, 2023							
	United States				Foreign			
	Level 1	Level 2	Level 3	Total	Level 1	Level 2	Level 3	Total
	(in thousands)							
Fixed income securities:								
Corporate debt securities	\$ —	\$ 89,971	\$ —	\$ 89,971	\$ —	\$ —	\$ —	\$ —
U.S. government securities	—	15,817	—	15,817	—	—	—	—
Global equity	—	5,691	—	5,691	—	—	—	—
Other	—	—	—	—	—	1,929	—	1,929
Cash and cash equivalents	1,138	—	—	1,138	—	—	—	—
Total	\$ 1,138	\$ 111,479	\$ —	\$ 112,617	\$ —	\$ 1,929	\$ —	\$ 1,929

Contributions

Teradyne’s funding policy is to make contributions to the plans in accordance with local laws and to the extent that such contributions are tax deductible. During 2024, Teradyne contributed \$3.1 million to the U.S. supplemental executive defined benefit pension plan and \$1.0 million to certain qualified plans for non-U.S. subsidiaries. During 2023, Teradyne contributed \$3.1 million to the U.S. supplemental executive defined benefit pension plan and \$1.0 million to certain qualified plans for non-U.S. subsidiaries. In 2025, contributions to the U.S. supplemental executive defined benefit pension plan and certain qualified plans from non-U.S. subsidiaries will be approximately \$3.3 million and \$1.1 million, respectively.

Contributions to the U.S. supplemental executive defined benefit pension plan and certain non-U.S. subsidiaries qualified plans will be approximately \$7.4 million and \$2.4 million, respectively, in 1 to 3 years, \$7.4 million and \$2.5 million, respectively, in 3 to 5 years and \$16.8 million and \$7.8 million, respectively, thereafter.

Expected Future Pension Benefit Payments

Future benefit payments are expected to be paid as follows:

	United States		Foreign	
	(in thousands)			
2025	\$	9,202	\$	1,077
2026		8,152		1,208
2027		9,043		1,245
2028		9,135		1,253
2029		9,040		1,422
2030-2034		42,009		8,561

Postretirement Benefit Plans

In addition to receiving pension benefits, U.S. Teradyne employees who meet early retirement eligibility requirements as of their termination dates may participate in Teradyne's Welfare Plan, which includes medical and dental benefits up to age 65. Death benefits provide a fixed sum to retirees' survivors and are available to all retirees. Substantially all of Teradyne's current U.S. employees could become eligible for these benefits, and the existing benefit obligation relates primarily to those employees. During the twelve months ended December 31, 2024, Teradyne recorded special termination benefit charges associated with a voluntary early retirement program.

The December 31 balances of the postretirement assets and obligations are shown below:

	2024	2023
	(in thousands)	
Assets and Obligations		
Change in benefit obligation:		
Projected benefit obligation:		
Beginning of year	\$ 6,933	\$ 5,345
Service cost	37	34
Interest cost	289	299
Actuarial (gain) loss	(445)	155
Benefits paid	(1,685)	(1,413)
Special termination benefits	462	2,513
End of year	<u>5,591</u>	<u>6,933</u>
Change in plan assets:		
Fair value of plan assets:		
Beginning of year	—	—
Company contributions	1,685	1,413
Benefits paid	(1,685)	(1,413)
End of year	—	—
Funded status	<u>\$ (5,591)</u>	<u>\$ (6,933)</u>

The following table provides amounts recorded within the account line items of financial position as of December 31:

	2024	2023
	(in thousands)	
Accrued employees' compensation and withholdings	\$ (938)	\$ (1,508)
Retirement plans liabilities	(4,653)	(5,425)
Funded status	<u>\$ (5,591)</u>	<u>\$ (6,933)</u>

The following table provides amounts recognized in accumulated other comprehensive income (loss) as of December 31:

	2024	2023
	(in thousands)	
Prior service credit, before tax	\$ (14)	\$ (23)
Deferred taxes	(1,693)	(1,691)
Total recognized in other comprehensive income (loss), net of tax	<u>\$ (1,707)</u>	<u>\$ (1,714)</u>

Expense

For the years ended December 31, 2024, 2023, and 2022, Teradyne's net periodic postretirement benefit cost (income) was comprised of the following:

	2024	2023	2022
	(in thousands)		
Components of Net Periodic Postretirement Benefit Cost (income):			
Service cost	\$ 37	\$ 34	\$ 64
Interest cost	289	299	177
Amortization of prior service credit	(9)	(9)	(9)
Net actuarial (gain) loss	(445)	155	(1,155)
Special termination benefits	462	2,513	—
Total net periodic postretirement benefit cost (income)	<u>334</u>	<u>2,992</u>	<u>(923)</u>
Changes in Plan Assets and Benefit Obligations Recognized in Other Comprehensive Income:			
Reversal of amortization items:			
Prior service credit	9	9	9
Total recognized in other comprehensive income	<u>9</u>	<u>9</u>	<u>9</u>
Total recognized in net periodic postretirement cost (income) and other comprehensive income	<u>\$ 343</u>	<u>\$ 3,001</u>	<u>\$ (914)</u>

Weighted Average Assumptions to Determine Net Periodic Postretirement Benefit Income as of January 1:

	2024	2023	2022
Discount rate	4.7 %	5.0 %	2.6 %
Initial health care cost trend rate	7.7	7.2	7.3
Ultimate health care cost trend rate	4.5	4.5	4.5
Year in which ultimate health care cost trend rate is reached	2033	2032	2029

Weighted Average Assumptions to Determine Postretirement Benefit Obligation as of December 31:

	2024	2023	2022
Discount rate	5.4 %	4.7 %	5.0 %
Initial health care trend	8.6	7.7	7.2
Ultimate health care trend	4.5	4.5	4.5
Medical cost trend rate decrease to ultimate rate in year	2035	2033	2032

Contributions

Contributions to the U.S. postretirement benefit plan will be approximately \$0.9 million in 2025, \$1.3 million in 1 to 3 years, \$0.9 million in 3 to 5 years and \$1.7 million, thereafter.

Expected Future Benefit Payments

Future benefit payments are expected to be paid as follows:

	Benefit Payments (in thousands)
2025	\$ 938
2026	671
2027	585
2028	510
2029	414
2030-2034	1,719

R. STOCK-BASED COMPENSATION

Stock Compensation Plans

On February 1, 2023 (the "Retirement Date"), Mark E. Jagiela retired as Chief Executive Officer of Teradyne and a member of Teradyne's Board of Directors, and Teradyne entered into an agreement (the "Retirement Agreement") with Mr. Jagiela. Under the Retirement Agreement, Mr. Jagiela's unvested time-based restricted stock units and stock options granted prior to his Retirement Date were modified to allow continued vesting; and any vested options or options that vest during that period may be exercised for the remainder of the applicable option term. During 2023, Teradyne recorded a stock-based compensation expense of \$5.9 million related to the Retirement Agreement.

Under Teradyne's stock compensation plans, Teradyne grants time-based restricted stock units, performance-based restricted stock units and stock options, and employees are eligible to purchase Teradyne's common stock through its Employee Stock Purchase Plan ("ESPP").

Service-based restricted stock unit awards granted to employees vest in equal annual installments over four years. Restricted stock unit awards granted to non-employee directors vest after a one-year period, with 100% of the award vesting on the earlier of (a) the first anniversary of the grant date or (b) the date of the following year's Annual Meeting of Shareholders. Teradyne expenses the cost of the restricted stock unit awards subject to time-based vesting, which is determined to be the fair market value of the shares at the date of grant, ratably over the period during which the restrictions lapse.

Performance-based restricted stock units ("PRSUs") granted to Teradyne's executive officers may have a performance metric based on relative total shareholder return ("TSR"). Teradyne's three-year TSR performance is measured against the New York Stock Exchange ("NYSE") Composite Index. The final number of TSR PRSUs that vest will vary based upon the level of performance achieved from 0% to 200% of the target shares. The TSR PRSUs will vest upon the three-year anniversary of the grant date. The TSR PRSUs are valued using a Monte Carlo simulation model. The number of units expected to be earned, based upon the achievement of the TSR market condition, is factored into the grant date Monte Carlo valuation. Compensation expense is recognized on a straight-line basis over the shorter of the three-year service period or the period from the grant to the date described in the retirement provisions below. Compensation expense for executive officers meeting the retirement provisions prior to the grant date is recognized during the year following the grant. Compensation expense is recognized regardless of the eventual number of units that are earned based upon the market condition, provided the executive officer remains an employee at the end of the three-year period. Compensation expense is reversed if at any time during the three-year service period the executive officer is no longer an employee, subject to the retirement and termination eligibility provisions noted below.

PRSUs granted to Teradyne's executive officers may also have a performance metric based on three-year cumulative non-GAAP profit before interest and tax ("PBIT") as a percent of Teradyne's revenue. Non-GAAP PBIT is a financial measure equal to GAAP income from operations less restructuring and other, net; amortization of acquired intangible assets; acquisition and divestiture related charges or credits; pension actuarial gains and losses; non-cash convertible debt interest expense; and other non-recurring gains and charges. The final number of PBIT PRSUs that vest will vary based upon the level of performance achieved from 0% to 200% of the target shares. The PBIT PRSUs will vest upon the three-year anniversary of the grant date. Compensation expense is recognized on a straight-line basis over the shorter of the three-year service period or the period from the grant date to the date described in the retirement provisions below. Compensation expense for executive officers meeting the retirement provisions prior to the grant date is recognized during the year following the grant. Compensation expense is recognized based on the number of units that are earned based upon the three-year Teradyne PBIT as a percent of Teradyne's revenue, provided the executive officer remains an employee at the end of the three-year period subject to the retirement and termination eligibility provisions noted below.

If a PRSU recipient's employment ends prior to the determination of the performance percentage due to (1) death or (2) after attaining both at least age sixty and at least ten years of service, retirement or termination other than for cause, then all or a portion of the recipient's PRSUs (based on the actual performance percentage achieved on the determination date) will vest on the date the performance percentage is determined. Except as set forth in the preceding sentence, no PRSUs will vest if the executive officer is no longer an employee at the end of the three-year period. Stock options to purchase Teradyne's common stock at 100% of the fair market value on the grant date vest in equal annual installments over four years from the grant date and have a maximum term of seven years.

On January 22, 2024, the Board enacted the Executive Retirement Policy for Restricted Stock Unit and Option Vesting (the "Retirement Policy"). Under the Retirement Policy, an executive officer that is over the age of 65 and has 10 or more years of service as of the effective date of his or her retirement will be eligible for continued vesting of his or her unvested time-based restricted stock units and stock options granted prior to his or her retirement date.

[Table of Contents](#)

During 2024, 2023 and 2022, Teradyne granted 0.6 million, 0.5 million and 0.4 million of service-based restricted stock unit awards to employees at a weighted average grant date fair value of \$96.72, \$102.45, and \$109.42, respectively.

During 2024, 2023 and 2022, Teradyne granted 0.1 million of service-based restricted stock unit awards to non-employee directors at a weighted average grant date fair value of \$121.29, \$90.50, and \$105.93, respectively.

During 2024, 2023 and 2022, Teradyne granted 0.1 million of PBIT PRSUs with a grant date fair value of \$94.51, \$102.91 and \$110.84, respectively.

During 2024, 2023 and 2022, Teradyne granted 0.1 million TSR PRSUs, with a grant date fair value of \$102.51, \$139.04, and \$101.06, respectively. The fair value was estimated using the Monte Carlo simulation model with the following assumptions:

	2024	2023	2022
Risk-free interest rate	3.9 %	4.0 %	1.4 %
Teradyne volatility-historical	42.4 %	49.7 %	47.1 %
NYSE Composite Index volatility-historical	15.6 %	24.1 %	22.7 %
Dividend yield	0.5 %	0.4 %	0.4 %

Expected volatility was based on the historical volatility of Teradyne's stock and the NYSE Composite Index for each of the 2024, 2023 and 2022 grants over the most recent three-year period. The risk-free interest rate was determined using the U.S. Treasury yield curve in effect at the time of each of the grants. Dividend yield was based upon an estimated annual dividend amount of \$0.48 per share for 2024, \$0.44 per share for 2023, and \$0.44 per share for 2022, divided by Teradyne's stock price on the grant date of \$95.83 for the 2024 grants, \$104.12 for the 2023 grants, and \$112.12 for the 2022 grants.

During 2024, 2023 and 2022, Teradyne granted 0.1 million of service-based stock options to executive officers at a weighted average grant date fair value of \$37.50, \$41.23, and \$39.01, respectively.

The fair value of stock options was estimated using the Black-Scholes option-pricing model with the following assumptions:

	2024	2023	2022
Expected life (years)	4.0	4.0	4.0
Risk-free interest rate	4.0 %	3.8 %	1.6 %
Volatility-historical	46.3 %	46.6 %	43.7 %
Dividend yield	0.5 %	0.4 %	0.4 %

Teradyne determined the stock options' expected life based upon historical exercise data for executive officers, the age of the executive officers and the terms of the stock option grant. Volatility was determined using historical volatility for a period equal to the expected life. The risk-free interest rate was determined using the U.S. Treasury yield curve in effect at the time of grant. Dividend yield was based upon an estimated annual dividend amount of \$0.48 per share divided by Teradyne's stock on the grant date of \$95.14 for the 2024 grant, and \$0.44 per share divided by Teradyne's stock price on the grant date of \$104.15 for the 2023 grant, and \$0.44 per share divided by Teradyne's stock price on the grant date of \$112.12 for the 2022 grants.

Stock compensation plan activity for the years 2024, 2023 and 2022, is as follows:

	2024	2023	2022
	(in thousands)		
Restricted Stock Units:			
Non-vested at January 1	1,378	1,317	1,417
Awarded	703	728	660
Vested	(492)	(609)	(709)
Forfeited	(62)	(58)	(51)
Non-vested at December 31	<u>1,527</u>	<u>1,378</u>	<u>1,317</u>
Stock Options:			
Outstanding at January 1	171	188	171
Granted	49	41	42
Exercised	(77)	(56)	(25)
Forfeited	(2)	(2)	—
Expired	—	—	—
Outstanding at December 31	<u>141</u>	<u>171</u>	<u>188</u>
Vested and expected to vest at December 31	<u>141</u>	<u>171</u>	<u>188</u>
Exercisable at December 31	<u>34</u>	<u>68</u>	<u>69</u>

Total shares available for the years 2024, 2023 and 2022:

	2024	2023	2022
	(in thousands)		
Shares available:			
Available for grant at January 1	4,353	5,062	5,713
Options granted	(49)	(41)	(42)
Options forfeited	2	2	—
Restricted stock units awarded	(703)	(728)	(660)
Restricted stock units forfeited	62	58	51
Available for grant at December 31	<u>3,665</u>	<u>4,353</u>	<u>5,062</u>

Weighted average restricted stock unit award date fair value information for the years 2024, 2023 and 2022, is as follows:

	2024	2023	2022
Non-vested at January 1	\$ 101.00	\$ 88.71	\$ 67.97
Awarded	97.06	105.05	108.74
Vested	93.12	75.55	54.27
Forfeited	103.81	102.12	85.71
Non-vested at December 31	\$ 101.17	\$ 101.00	\$ 88.71

Restricted stock unit awards aggregate intrinsic value information at December 31 for the years 2024, 2023 and 2022 is as follows:

	2024	2023	2022
	(in thousands)		
Vested	\$ 54,235	\$ 62,001	\$ 95,408
Outstanding	192,324	149,504	115,087
Expected to vest	177,878	135,238	108,666

Restricted stock units weighted average remaining contractual terms (in years) information at December 31 for the years 2024, 2023 and 2022 is as follows:

	2024	2023	2022
Outstanding	1.19	1.13	0.99
Expected to vest	1.19	1.13	0.99

Weighted average stock options exercise price information for the year ended December 31, 2024 is as follows:

	2024
Outstanding at January 1	\$ 94.85
Options granted	95.14
Options exercised	86.02
Options forfeited	112.58
Options cancelled	112.80
Outstanding at December 31	99.51
Exercisable at December 31	91.27

The total cash received from employees as a result of employee stock options exercised during the years ended December 31, 2024, 2023 and 2022, was \$6.6 million, \$2.2 million, and \$0.9 million, respectively. In connection with these exercises, the tax benefit realized by Teradyne for the years ended December 31, 2024, 2023 and 2022, was \$0.2 million, \$0.2 million, and \$0.1 million, respectively.

Stock option aggregate intrinsic value information for the years ended December 31, 2024, 2023 and 2022 is as follows:

	2024	2023	2022
		(in thousands)	
Exercised	\$ 2,783	\$ 3,901	\$ 2,030
Outstanding	3,709	2,647	3,963
Expected to vest	2,531	696	1,583
Vested and exercisable	1,178	1,950	2,380

Stock options weighted average remaining contractual terms (in years) information at December 31, for the years 2024, 2023 and 2022 is as follows:

	2024	2023	2022
Outstanding	4.8	4.4	4.2
Expected to vest	5.2	5.1	4.8
Vested and exercisable	3.3	3.4	3.1

As of December 31, 2024, total unrecognized expense related to non-vested restricted stock unit awards and stock options was \$82.6 million and is expected to be recognized over a weighted average period of 2.5 years.

Employee Stock Purchase Plan

Under the ESPP, eligible employees may purchase shares of common stock through regular payroll deductions of up to 10% of their compensation, to a maximum of shares with a fair market value of \$25,000 per calendar year, not to exceed 6,000 shares. Under the plan, the price paid for the common stock is equal to 85% of the stock price on the last business day of the six-month purchase period.

In July 2024, 0.1 million shares of common stock were issued to employees who participated in the plan during the first half of 2024 at the price of \$126.05 per share. In January 2025, Teradyne issued 0.1 million shares of common stock to employees who participated in the plan during the second half of 2024 at the price of \$107.04 per share.

In July 2023, 0.2 million shares of common stock were issued to employees who participated in the plan during the first half of 2023 at the price of \$94.64 per share. In January 2024, Teradyne issued 0.2 million shares of common stock to employees who participated in the plan during the second half of 2023 at the price of \$92.25 per share.

In July 2022, 0.2 million shares of common stock were issued to employees who participated in the plan during the first half of 2022 at the price of \$76.12 per share. In January 2023, Teradyne issued 0.2 million shares of common stock to employees who participated in the plan during the second half of 2022 at the price of \$74.25 per share.

As of December 31, 2024, there were 3.2 million shares available for grant under the ESPP.

The following table provides the effect to income from operations for recording stock-based compensation for the years ended December 31, 2024, 2023, and 2022:

	2024	2023 (in thousands)	2022
Cost of revenues	\$ 4,922	\$ 4,208	\$ 4,050
Engineering and development	12,531	10,659	9,992
Selling and administrative	42,669	42,815	34,186
Stock-based compensation	60,122	57,682	48,228
Income tax benefit	(10,472)	(10,397)	(11,493)
Total stock-based compensation expense after income taxes	<u>\$ 49,650</u>	<u>\$ 47,285</u>	<u>\$ 36,735</u>

S. SAVINGS PLAN

Teradyne sponsors a defined contribution employee retirement savings plan (“Savings Plan”) covering substantially all U.S. employees. Under the Savings Plan, employees may contribute up to 20% of their compensation (subject to Internal Revenue Service limitations). The Savings Plan provides for a discretionary employer match that is determined each year. In 2024, 2023 and 2022, Teradyne matched 100% of eligible employee contributions up to 4% of their compensation for employees not accruing benefits in the U.S. Qualified Pension Plan. There was no match for employees still actively accruing benefits in the U.S. Qualified Pension Plan. Teradyne’s contributions vest 25% per year for the first four years of employment, and contributions for those employees with four years of service vest immediately.

In addition, Teradyne sponsors an unfunded U.S. Supplemental Savings Plan to provide savings benefits in excess of those allowed by the Employee Retirement Income Security Act of 1974 and the Internal Revenue Code. The provisions of this plan are the same as the Savings Plan. The liability for the U.S. Supplemental Savings Plan at December 31, 2024 and 2023, was \$63.4 million and \$55.9 million, respectively, and is included in retirement plan liabilities. Teradyne contributes to defined contributions savings plans for its foreign employees. Under Teradyne’s savings plans, amounts charged to the statements of operations for the years ended December 31, 2024, 2023, and 2022 were \$29.7 million, \$30.5 million, and \$30.1 million, respectively.

T. INCOME TAXES

The components of income before income taxes and the provision (benefit) for income taxes as shown in the consolidated statements of operations were as follows:

	2024	2023 (in thousands)	2022
Income before income taxes:			
U.S.	\$ 231,346	\$ 307,997	\$ 385,968
Non-U.S.	377,740	217,575	454,417
	<u>\$ 609,086</u>	<u>\$ 525,572</u>	<u>\$ 840,385</u>
Provision (benefit) for income taxes:			
Current:			
U.S. Federal	\$ 40,296	\$ 58,063	\$ 86,692
Non-U.S.	62,851	54,037	74,204
State	2,716	2,362	2,681
	<u>105,863</u>	<u>114,462</u>	<u>163,577</u>
Deferred:			
U.S. Federal	(33,195)	(27,459)	(36,739)
Non-U.S.	(9,003)	(8,584)	1,232
State	(4,162)	(1,599)	(3,186)
	<u>(46,360)</u>	<u>(37,642)</u>	<u>(38,693)</u>
Total provision for income taxes:	<u>\$ 59,503</u>	<u>\$ 76,820</u>	<u>\$ 124,884</u>

Income tax expense for 2024, 2023 and 2022 totaled \$59.5 million, \$76.8 million, and \$124.9 million, respectively. The effective tax rate for 2024, 2023 and 2022 was 9.8%, 14.6% and 14.9%, respectively.

At December 31, 2024, Teradyne’s remaining tax liability resulting from the U.S. one-time transition tax on the mandatory deemed repatriation of foreign earnings amounts to \$44.3 million. Teradyne will pay approximately \$19.7 million related to the transition tax in 2025, and \$24.6 million in one to three years.

Teradyne has made an accounting policy election to account for global intangible low-taxed income (“GILTI”) as a component of tax expense in the period in which Teradyne is subject to the rules and therefore did not provide any deferred tax impacts of GILTI in its consolidated financial statements.

The decrease in the effective tax rate from 2023 to 2024 is primarily attributable to a shift in the geographic distribution of income which resulted in a reduction in income in higher tax rate foreign jurisdictions, the benefit of the release of reserves for uncertain tax positions as a result of the expiration of statute and a decrease in non-deductible officer’s compensation. These rate benefits were partially offset by reductions in benefits from foreign tax credits, U.S. research and development credits and the U.S. foreign derived intangible income deduction.

The decrease in the effective tax rate from 2022 to 2023 is primarily attributable to benefit from tax credits and the U.S. foreign derived intangible income deduction. These decreases in expense were partially offset by a shift in the geographic distribution of income, which increased the income subject to taxation in higher tax rate jurisdictions relative to lower tax rate jurisdictions and a reduction in benefit from equity compensation.

A reconciliation of the effective tax rate for the years 2024, 2023 and 2022 is as follows:

	2024	2023	2022
U.S. statutory federal tax rate	21.0 %	21.0 %	21.0 %
U.S. global intangible low-taxed income	1.2	0.8	1.2
Non-deductible officers’ compensation	0.3	1.1	1.3
Equity compensation	—	(0.4)	(1.1)
U.S. foreign derived intangible income	(3.1)	(3.9)	(3.1)
U.S. research and development credit	(3.0)	(4.2)	(1.8)
Foreign taxes	(2.7)	2.5	(1.9)
Uncertain tax positions	(1.9)	0.7	0.1
Foreign tax credits	(1.3)	(3.3)	(1.0)
State income taxes, net of federal tax benefit	(0.1)	0.1	(0.1)
Other, net	(0.6)	0.2	0.3
	<u>9.8 %</u>	<u>14.6 %</u>	<u>14.9 %</u>

Teradyne qualifies for a tax holiday in Singapore by fulfilling the requirements of an agreement with the Singapore Economic Development Board under which certain headcount and spending requirements must be met. The tax savings attributable to the Singapore tax holiday for the years ended December 31, 2024, 2023 and 2022 were \$17.1 million or \$0.10 per diluted share, \$1.4 million or \$0.01 per diluted share, and \$16.0 million or \$0.09 per diluted share, respectively. In November 2020, Teradyne entered into an agreement with the Singapore Economic Development Board which extended our Singapore tax holiday under substantially similar terms to the agreement which expired on December 31, 2020. The new tax holiday is scheduled to expire on December 31, 2025.

Significant components of Teradyne's deferred tax assets (liabilities) as of December 31, 2024 and 2023 were as follows:

	2024	2023
	(in thousands)	
Deferred tax assets:		
Tax credits	\$ 121,635	\$ 112,571
Research and development	116,746	82,571
Pension liabilities	25,202	24,997
Accruals	23,946	25,644
Inventory valuations	18,688	19,289
Lease liability	17,828	21,167
Net operating loss carryforwards	16,894	5,737
Deferred revenue	14,562	13,807
Equity compensation	8,901	7,179
Vacation accrual	6,847	6,096
Intangible assets	4,720	2,323
Investment impairment	3,328	3,292
Marketable securities	—	128
Other	322	953
Gross deferred tax assets	379,619	325,754
Less: valuation allowance	(117,254)	(109,251)
Total deferred tax assets	\$ 262,365	\$ 216,503
Deferred tax liabilities:		
Depreciation	\$ (18,788)	\$ (16,681)
Right of use assets	(16,257)	(19,016)
Contingent consideration	(5,270)	(5,214)
Marketable securities	(650)	—
Total deferred tax liabilities	\$ (40,965)	\$ (40,911)
Net deferred assets	\$ 221,400	\$ 175,592

As of December 31, 2024 and 2023, Teradyne evaluated the likelihood that it would realize deferred income taxes to offset future taxable income and concluded that it is more likely than not that the majority of its deferred tax assets will be realized through consideration of both the positive and negative evidence. At December 31, 2024 and 2023, Teradyne maintained a valuation allowance for certain deferred tax assets of \$117.3 million and \$109.3 million, respectively, primarily related to state net operating losses and state tax credit carryforwards, due to the uncertainty regarding their realization. Adjustments could be required in the future if Teradyne estimates that the amount of deferred tax assets to be realized is more or less than the net amount recorded.

At December 31, 2024, Teradyne had tax effected operating loss carryforwards that expire in the following years:

	State Operating Loss Carryforwards	Foreign Operating Loss Carryforwards
	(in thousands)	
2025	\$ 4	\$ —
2026	—	—
2027	—	—
2028	10	80
2029	49	465
2030-2034	62	34
2035-2039	37	—
Beyond 2039	19	—
Non-expiring	54	16,079
Total	\$ 235	\$ 16,658

Teradyne has approximately \$158.2 million of tax credit carryforwards including federal business tax credits of approximately \$4.3 million which expire in 2028 through 2034, and state tax credits of \$153.9 million, of which \$81.5 million do not expire and the remainder expire in the years 2025 through 2043.

Teradyne’s gross unrecognized tax benefits for the years ended December 31, 2024, 2023 and 2022 were as follows:

	<u>2024</u>	<u>2023</u>	<u>2022</u>
	(in thousands)		
Beginning balance as of January 1	\$ 18,606	\$ 15,608	\$ 14,465
Additions:			
Tax positions for current year		—	1,398
Tax positions for prior years		3,024	13
Reductions:			
Tax positions for prior years	(2,696)	(26)	(56)
Expiration of statutes	(8,247)	—	(212)
Ending balance as of December 31	<u>\$ 7,663</u>	<u>\$ 18,606</u>	<u>\$ 15,608</u>

Current year reductions primarily relate to foreign transfer pricing and research credits.

Of the \$7.7 million of unrecognized tax benefits as of December 31, 2024, \$2.3 million would impact the consolidated income tax rate if ultimately recognized. The remaining \$5.4 million would impact deferred taxes if recognized.

As of December 31, 2024, Teradyne estimates that it is reasonably possible that the balance of unrecognized tax benefits may decrease approximately \$0.7 million in the next twelve months as a result of a lapse of statutes of limitation. The estimated decrease relates to federal research credits.

Teradyne records all interest and penalties related to income taxes as a component of income tax expense. Accrued interest and penalties related to income tax items at December 31, 2024 and 2023 amounted to \$0.3 million and \$1.3 million, respectively. For the years ended December 31, 2024, 2023 and 2022, benefit of \$1.0 million, expense of \$0.9 million, and expense of \$0.1 million, respectively, was recorded for interest and penalties related to income tax items.

Teradyne is subject to U.S. federal income tax, as well as income tax in multiple state, local and foreign jurisdictions. As of December 31, 2024, all material state and local income tax matters have been concluded through 2019, all material federal income tax matters have been concluded through 2020 and all material foreign income tax matters have been concluded through 2017. However, in some jurisdictions, including the United States, operating losses and tax credits may be subject to adjustment until such time as they are utilized and the year of utilization is closed to adjustment.

As of December 31, 2024, Teradyne is not permanently reinvested with respect to the unremitted earnings of non-U.S. subsidiaries to the extent that those earnings exceed local statutory and operational requirements. Remittance of those earnings is not expected to result in material income tax.

On August 16, 2022, the Inflation Reduction Act of 2022 (“IRA”) was signed into law. The IRA introduced a 15% alternative minimum tax based on the financial statement income of certain large corporations (“CAMT”), effective January 1, 2023. Teradyne currently does not expect the CAMT to have a material impact on its financial results.

The Organization for Economic Cooperation and Development (the “OECD”) has introduced a framework to implement a global minimum tax of 15% for certain multinational companies, referred to as Pillar Two. While it is uncertain whether the United States will enact legislation to adopt Pillar Two, certain countries in which Teradyne operates have enacted Pillar Two legislation, and other countries are in the process of introducing draft Pillar Two legislation. Teradyne is closely monitoring these developments and evaluating the potential future impact on our effective tax rate. As of December 31, 2024, the effective tax rate impact from Pillar Two was not material to our consolidated financial statements.

U. SEGMENT, GEOGRAPHIC AND SIGNIFICANT CUSTOMER INFORMATION

Teradyne historically has had four reportable segments (Semiconductor Test, System Test, Wireless Test and Robotics). Each of the reportable segments represented an individual operating segment.

In the fourth quarter of 2024, Teradyne observed a shift in forecasted revenue generating activities within Integrated System Test, a historical component of System Test, to activities that more closely align with the Semiconductor Test segment. In response, beginning in the fourth quarter of 2024, Teradyne made changes to the operational structure of the business to better align the components within the operating segments based on the chief operating decision maker's ("CODM") conclusion that it would be more appropriate to include Integrated System Test results within Semiconductor Test results. This was a primary consideration for including Integrated System Test within Semiconductor Test and will allow for better informed decisions related to evaluating segment performance. This change does not result in a change in the identified operating segments. However, the System Test segment no longer meets the requirements for individual disclosure. Wireless Test also does not meet the requirements for individual disclosure. As such, System Test and Wireless Test will be included within the "All other" segments category.

As of December 31, 2024, Teradyne has two reportable segments (Semiconductor Test and Robotics). Each of the reportable segments continues to represent an individual operating segment.

The Semiconductor Test segment includes operations related to the design, manufacturing and marketing of semiconductor test products and services inclusive of storage and system level test products. The Robotics segment includes operations related to the design, manufacturing and marketing of collaborative robotic arms and autonomous mobile robots. Each reportable segment has a segment manager who is accountable to and maintains regular contact with Teradyne's CODM (Teradyne's chief executive officer) to discuss operating activities, financial results, forecasts, and plans for the segment.

The CODM uses business segment income (loss) before income taxes predominantly in the annual budgeting and forecasting process. The CODM also uses this measure when making decisions about the allocation of operating and capital resources to each segment. The accounting policies of the business segments are the same as those described in Note B: "Accounting Policies."

Segment information for the years ended December 31, 2024, 2023 and 2022 is as follows:

	Semiconductor Test	Robotics	Reportable Segments	All Other	Corporate and Eliminations	Consolidated
	(in thousands)					
2024						
Revenues	\$ 2,123,920	\$ 364,848	\$ 2,488,768	\$ 331,112	\$ —	\$ 2,819,880
Less:						
Cost of revenues	866,353	155,080	1,021,433	120,400	—	1,141,833
Engineering and development	295,614	67,306	362,920	46,556	—	409,476
Selling and marketing	187,384	113,327	300,711	50,317	—	351,028
General and administrative	89,952	54,328	144,280	21,282	—	165,562
Other segment items (1)(2)	126,449	52,359	178,808	26,833	(62,746)	142,895
Income (loss) before taxes (2)	558,168	(77,552)	480,616	65,724	62,746	609,086
Total assets (3)	1,287,219	742,017	2,029,236	213,749	1,465,730	3,708,714
Property additions	168,130	22,275	190,405	7,690	—	198,095
Depreciation and amortization expense	85,737	27,668	113,405	6,336	—	119,741
2023						
Revenues	\$ 1,957,188	\$ 375,183	\$ 2,332,371	\$ 343,927	\$ —	\$ 2,676,298
Less:						
Cost of revenues	846,570	151,833	998,403	118,040	—	1,116,443
Engineering and development	257,387	68,668	326,055	44,538	—	370,593
Selling and marketing	162,068	107,157	269,225	50,131	—	319,356
General and administrative	77,786	56,483	134,269	25,104	—	159,373
Other segment items (1)(2)	114,873	45,294	160,167	26,657	(1,863)	184,961
Income (loss) before taxes (2)	498,504	(54,252)	444,252	79,457	1,863	525,572
Total assets (3)	1,388,842	737,323	2,126,165	191,055	1,169,605	3,486,824
Property additions	113,664	40,739	154,403	5,239	—	159,642
Depreciation and amortization expense	78,568	25,527	104,095	7,021	(230)	110,886
2022						
Revenues	\$ 2,350,603	\$ 403,138	\$ 2,753,741	\$ 401,053	\$ 251	\$ 3,155,045
Less:						
Cost of revenues	970,972	161,383	1,132,355	125,522	—	1,257,877
Engineering and development	272,296	64,670	336,966	44,111	—	381,077
Selling and marketing	156,520	101,584	258,104	51,888	—	309,992
General and administrative	75,544	57,845	133,389	20,785	—	154,174
Other segment items (1)(2)	131,464	33,785	165,249	34,587	11,704	211,540
Income (loss) before taxes (2)	743,807	(16,129)	727,678	124,160	(11,453)	840,385
Total assets (3)	1,435,766	665,638	2,101,403	207,079	1,192,769	3,501,252
Property additions	126,899	25,711	152,610	10,639	—	163,249
Depreciation and amortization expense	76,922	25,339	102,261	7,836	578	110,675

- (1) For each reportable segment, the other segment items category includes equity and variable compensation, acquired intangible assets amortization, and restructuring and other charges.
- (2) Included in Corporate and Eliminations are interest income, interest expense, net foreign exchange gains (losses), intercompany eliminations, acquired intangible amortization, gain on the sale of a business, pension and postretirement plan actuarial gains (losses), legal and environmental fees, contingent consideration adjustments, acquisition and divestiture related expenses, contract termination settlement charge, and an expense for the modification of Teradyne's former chief executive officer's outstanding equity awards.
- (3) Total assets are attributable to each segment. In 2023, Semiconductor Test includes \$34.8 million of total assets classified as assets held for sale. See Note E: "Dispositions" for additional information. Corporate assets consist of cash and cash equivalents, marketable securities and certain other assets.

Information as to Teradyne's revenues by country is as follows:

	<u>2024</u>	<u>2023</u>	<u>2022</u>
	(in thousands)		
Revenues from customers (1):			
Korea	\$ 695,669	\$ 394,690	\$ 544,816
Taiwan	601,997	384,842	626,424
China	375,186	314,899	491,798
United States	374,333	433,661	469,948
Europe	251,285	273,784	268,384
Japan	159,827	281,742	162,920
Singapore	90,113	116,969	99,503
Malaysia	62,376	89,197	142,203
Philippines	53,636	189,419	124,107
Thailand	49,268	91,818	137,356
Rest of the World	106,190	105,277	87,586
	<u>\$ 2,819,880</u>	<u>\$ 2,676,298</u>	<u>\$ 3,155,045</u>

(1) Revenues attributable to a country are based on location of customer site.

In 2024, revenues from Samsung, a customer of our Semiconductor Test segment, accounted for 12.5% of our consolidated revenues. In 2023, revenues from Texas Instruments Inc., a customer of our Semiconductor Test segment, accounted for 10% of our consolidated revenues. Teradyne estimates consolidated revenues driven by Qualcomm, a customer of our Semiconductor Test, System Test, and Wireless Test segments, combining direct and indirect sales, accounted for approximately 11% of its consolidated revenues in 2022.

Long-lived assets by geographic area:

	<u>United States</u>	<u>Foreign (1)</u>	<u>Total</u>
	(in thousands)		
December 31, 2024	\$ 328,733	\$ 249,623	\$ 578,356
December 31, 2023 (2)	\$ 322,445	\$ 207,995	\$ 530,440

- (1) As of December 31, 2024 and December 31, 2023, long-lived assets attributable to Denmark were \$85.1 million and \$78.1 million, respectively. Long-lived assets attributable to Singapore were \$74.8 million as of December 31, 2024.
- (2) Includes \$11.5 million of long-lived assets classified as assets held for sale. See Note E: "Dispositions" for additional information.

V. STOCK REPURCHASE PROGRAM

In January 2023, Teradyne's Board of Directors cancelled the January 2021 repurchase program and approved a new repurchase program for up to \$2.0 billion of common stock. In 2024, Teradyne repurchased 1.7 million shares of common stock for a total cost of \$199.4 million, exclusive of tax, at an average price of \$114.63 per share. In 2023, Teradyne repurchased 3.9 million shares of common stock for \$400.5 million at an average price of \$102.47 per share. The cumulative repurchases under the January 2023 repurchase program as of December 31, 2024 were 5.6 million shares of common stock for \$599.9 million at an average price per share of \$106.21.

The total cost of shares acquired includes commissions and related excise tax and is recorded as a reduction to retained earnings.

W. SUBSEQUENT EVENTS

In January 2025, Teradyne's Board of Directors declared a quarterly cash dividend of \$0.12 per share to be paid on March 14, 2025 to shareholders of record as of February 14, 2025.

While Teradyne declared a quarterly cash dividend and authorized a share repurchase program, it may reduce or eliminate the cash dividend or share repurchase program in the future. Future cash dividends and stock repurchases are subject to the discretion of Teradyne's Board of Directors which will consider, among other things, Teradyne's earnings, capital requirements and financial condition.

SUPPLEMENTARY INFORMATION
(Unaudited)

Item 9: Changes in and disagreements with accountants on accounting and financial disclosure

None.

Item 9A: Controls and procedures

Disclosure Controls and Procedures

As of the end of the period covered by this report, our management, with the participation of our CEO and CFO, evaluated the effectiveness of our disclosure controls and procedures pursuant to Rule 13a-15(b) promulgated under the Exchange Act. Based upon that evaluation, our CEO and CFO concluded that, as of the end of the period covered by this report, our disclosure controls and procedures were effective in ensuring that material information required to be disclosed by us in the reports that we file or submit under the Exchange Act is recorded, processed, summarized and reported within the time periods specified in the SEC's rules and forms, including ensuring that such material information is accumulated and communicated to our management, including our CEO and CFO, as appropriate to allow timely decisions regarding required disclosure.

Changes in Internal Control over Financial Reporting

There was no change in our internal control over financial reporting during the fourth fiscal quarter ended December 31, 2024 that has materially affected, or is reasonably likely to materially affect, our internal control over financial reporting.

Management's Annual Report on Internal Control over Financial Reporting

Our management is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Exchange Act Rule 13a-15(f). Under the supervision and with the participation of our management, including our CEO and CFO, we conducted an evaluation of the effectiveness of our internal control over financial reporting based on the framework in *Internal Control—Integrated Framework* (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission. Based on our evaluation under the framework in *Internal Control—Integrated Framework* (2013), our management concluded that our internal control over financial reporting was effective as of December 31, 2024.

The effectiveness of our internal control over financial reporting as of December 31, 2024 has been audited by PricewaterhouseCoopers LLP, our independent registered public accounting firm, as stated in their report which is included under Item 8 of this Annual Report.

Inherent Limitations on Effectiveness of Controls

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Item 9B: Other Information

Our officers (as defined in Rule 16a-1(f) under the Securities Exchange Act of 1934, as amended (the "Exchange Act")) ("Section 16 Officers") and directors from time to time enter into contracts, instructions or written plans for the purchase or sale of our securities that are intended to satisfy the conditions specified in Rule 10b5-1(c) under the Exchange Act for an affirmative defense against liability for trading in securities on the basis of material nonpublic information. We refer to these contracts, instructions, and written plans as "Rule 10b5-1 trading plans" and each one as a "Rule 10b5-1 trading plan." During our fiscal quarter ended December 31, 2024, no Section 16 Officer or director adopted, modified or terminated a Rule 10b5-1 trading plan.

Item 9C: Disclosure Regarding Foreign Jurisdictions that Prevent Inspections

Not applicable.

PART III

Item 10: *Directors, Executive Officers and Corporate Governance*

The information required by this Item 10 will be included in our definitive Proxy Statement in connection with our 2025 Annual Meeting of Shareholders to be filed with the SEC no later than 120 days after the close of the fiscal year covered by this Annual Report and is incorporated herein by reference.

We have adopted a written code of business conduct that applies to all of our employees, officers and directors, including our principal executive officer, principal financial officer and principal accounting officer. Our Code of Conduct is available on our investor relations website at investors.teradyne.com under the section entitled "Governance Policies" in the "Governance" menu. If we make any substantive amendments to our Code of Conduct or grant any of our directors or executive officers any waiver, including any implicit waiver, from a provision of our Code of Conduct, we will disclose the nature of the amendment or waiver on our website or in a Current Report on Form 8-K.

Item 11: *Executive Compensation*

The information required by this Item 11 will be included in our definitive Proxy Statement in connection with our 2025 Annual Meeting of Shareholders to be filed with the SEC not later than 120 days after the close of the fiscal year covered by this Annual Report and is incorporated herein by reference. For this purpose, the Compensation Committee Report included in such proxy statement is specifically not incorporated herein.

Item 12: *Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters*

The information required by this Item 12 will be included in our definitive Proxy Statement in connection with our 2025 Annual Meeting of Shareholders to be filed with the SEC not later than 120 days after the close of the fiscal year covered by this Annual Report and is incorporated herein by reference. Also see "Item 7: Management's Discussion and Analysis of Financial Condition and Results of Operations—Equity Compensation Plans."

Item 13: *Certain Relationships and Related Transactions, and Director Independence*

The information required by this Item 13 will be included in our definitive Proxy Statement in connection with our 2025 Annual Meeting of Shareholders to be filed with the SEC not later than 120 days after the close of the fiscal year covered by this Annual Report and is incorporated herein by reference.

Item 14: *Principal Accountant Fees and Services*

The information required by this Item 14 will be included in our definitive Proxy Statement in connection with our 2025 Annual Meeting of Shareholders to be filed with the SEC not later than 120 days after the close of the fiscal year covered by this Annual Report and is incorporated herein by reference.

PART IV

Item 15: Exhibits and Financial Statement Schedule.

15(a)(1) Financial Statements

The following consolidated financial statements are included in Item 8:

	<u>Page</u>
Report of Independent Registered Public Accounting Firm (PricewaterhouseCoopers LLP, PCAOB ID No 238)	36
Consolidated Balance Sheets as of December 31, 2024, and 2023	38
Consolidated Statements of Operations for the years ended December 31, 2024, 2023 and 2022	39
Consolidated Statements of Comprehensive Income for the years ended December 31, 2024, 2023 and 2022	40
Consolidated Statements of Convertible Common Shares and Shareholders' Equity for the years ended December 31, 2024, 2023 and 2022	41
Consolidated Statements of Cash Flows for the years ended December 31, 2024, 2023 and 2022	42

15(a)(2) Financial Statement Schedule

The following consolidated financial statement schedule is included in Item 15(c):

Schedule II—Valuation and Qualifying Accounts

Schedules other than those listed above have been omitted since they are either not required or information is otherwise included.

15(a)(3) Listing of Exhibits

The Exhibits which are filed with this report or which are incorporated by reference herein are set forth in the Exhibit Index.

15(c) Financial Statement Schedules

TERADYNE, INC.

SCHEDULE II—VALUATION AND QUALIFYING ACCOUNTS

Column A	Column B	Column C	Column D	Column E	Column F
Description	Balance at Beginning of Period	Additions Charged to Cost and Expenses	Other (in thousands)	Deductions	Balance at End of Period
Valuation reserve deducted in the balance sheet from the asset to which it applies:					
Accounts receivable:					
2024 Allowance for credit losses	\$ 1,988	\$ 149	\$ (36)	\$ (10)	\$ 2,111
2023 Allowance for credit losses	\$ 1,955	\$ 301	\$ 23	\$ 291	\$ 1,988
2022 Allowance for credit losses	\$ 2,012	\$ 500	\$ (6)	\$ 551	\$ 1,955

Column A	Column B	Column C	Column D	Column E	Column F
Description	Balance at Beginning of Period	Additions Charged to Cost and Expenses	Other (in thousands)	Deductions	Balance at End of Period
Valuation reserve deducted in the balance sheet from the asset to which it applies:					
Deferred taxes:					
2024 Valuation allowance	\$ 109,251	\$ 8,809	\$ (41)	\$ 765	\$ 117,254
2023 Valuation allowance	\$ 103,807	\$ 5,759	\$ 59	\$ 374	\$ 109,251
2022 Valuation allowance	\$ 97,170	\$ 7,652	\$ 21	\$ 1,036	\$ 103,807

Item 16: Form 10-K Summary

Not applicable.

EXHIBIT INDEX

The following designated exhibits are, as indicated below, either filed herewith or have heretofore been filed with the Securities and Exchange Commission and are referred to and incorporated by reference to such filings.

Exhibit No.	Description	SEC Document Reference
3.1	Restated Articles of Organization.	Appendix B to Teradyne's Definitive Proxy Statement Pursuant to Section 14(a) of the Securities Exchange Act of 1934 filed on March 29, 2024.
3.2	Amended and Restated By-laws, as amended.	Exhibit 3.1 to Teradyne's Current Report on Form 8-K filed on January 29, 2024.
4.1	Indenture dated as of December 12, 2016, between Teradyne, Inc. and Wilmington Trust, National Association, as trustee.	Exhibit 4.1 to Teradyne's Current Report on Form 8-K filed on December 12, 2016.
4.2	First Supplemental Indenture dated as of November 4, 2021 between Teradyne, Inc. and Wilmington Trust, National Association, as trustee.	Exhibit 4.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended October 3, 2021.
4.3	Description of Teradyne, Inc. Securities Registered under Section 12 of the Exchange Act.	Filed herewith.
10.1†	Standard Manufacturing Agreement entered into as of November 24, 2003 by and between Teradyne and Solectron.	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 30, 2007.
10.2†	Second Amendment to Standard Manufacturing Agreement, dated as of August 27, 2007, by and between Teradyne and Solectron.	Exhibit 10.3 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 30, 2007.
10.3†	Sixth Amendment to Standard Manufacturing Agreement, dated as of July 27, 2009, by and between Teradyne and Flextronics Corporation.	Exhibit 10.5 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2009.
10.4	Addendum to Standard Manufacturing Agreement (Authorized Purchase Agreement)—Revised July 1, 2010.	Exhibit 10.6 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2010.
10.5	Eighth Amendment to Standard Manufacturing Agreement, dated as of April 13, 2012, by and between Teradyne and Flextronics Sales & Marketing North Asia (L) LTD.	Exhibit 10.7 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2012.
10.6†	Ninth Amendment to Standard Manufacturing Agreement, dated as of September 17, 2012, by and between Teradyne and Flextronics Sales & Marketing North Asia (L) LTD.	Exhibit 10.8 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2012.
10.7	2006 Equity and Cash Compensation Incentive Plan, as amended. *	Exhibit 10.2 to Teradyne's Current Report on Form 8-K filed on May 13, 2021.
10.8	Danish Sub-Plan to the 2006 Equity and Cash Compensation Incentive Plan.	Exhibit 10.10 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2018.
10.9	Form of Performance-Based Restricted Stock Unit Agreement for Executive Officers under 2006 Equity and Cash Compensation Incentive Plan.*	Exhibit 10.9 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2020.
10.10	Form of Time-Based Restricted Stock Unit Agreement for Executive Officers under 2006 Equity and Cash Compensation Incentive Plan.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the fiscal quarter ended March 31, 2024.
10.11	Form of Executive Officer Stock Option Agreement under 2006 Equity and Cash Compensation Incentive Plan, as amended. *	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the fiscal quarter ended March 31, 2024.
10.12	Form of Restricted Stock Unit Agreement for Directors under 2006 Equity and Cash Compensation Incentive Plan.*	Exhibit 10.12 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2016.

Table of Contents

10.13	1996 Employee Stock Purchase Plan, as amended.*	Exhibit 10.13 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2022.
10.14	Danish Sub-Plan to the 1996 Employee Stock Purchase Plan.	Exhibit 10.15 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2019.
10.15	Deferral Plan for Non-Employee Directors, as amended.*	Exhibit 10.1 to Teradyne's Quarterly Report on form 10-Q for the quarter ended October 3, 2021.
10.16	Supplemental Savings Plan, as amended and restated.*	Exhibit 10.18 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2008.
10.17	Supplemental Executive Retirement Plan, as restated.*	Exhibit 10.19 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2008.
10.18	Agreement Regarding Termination Benefits dated January 31, 2023 between Teradyne and Gregory S. Smith.*	Exhibit 10.18 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2022.
10.19	Employment Agreement dated May 7, 2004 between Teradyne and Mark Jagiela.*	Exhibit 10.37 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended July 4, 2004.
10.20	Executive Officer Retirement Agreement dated July 17, 2019 between Teradyne and Gregory R. Beecher.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended June 30, 2019.
10.21	Executive Officer Agreement dated January 31, 2023 between Teradyne and Mark Jagiela.*	Exhibit 10.21 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2022.
10.22	Amended and Restated Executive Officer Change in Control Agreement dated May 26, 2009 between Teradyne and Charles J. Gray, as amended.*	Exhibit 10.30 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2012.
10.23	Employment Agreement dated July 24, 2009 between Teradyne and Charles J. Gray.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended April 4, 2010.
10.24	Executive Officer Agreement dated January 25, 2024 between Teradyne and Charles J. Gray.*	Exhibit 10.1 to Teradyne's Current Report on Form 8-K/A filed January 29, 2024
10.25	Amended and Restated Executive Officer Change in Control Agreement dated June 30, 2012 between Teradyne and Walter G. Vahey, as amended.*	Exhibit 10.32 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2012.
10.26	Employment Agreement dated February 6, 2013 between Teradyne and Walter G. Vahey.*	Exhibit 10.33 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2012.
10.27	Executive Officer Change in Control Agreement dated September 1, 2014 between Teradyne, Inc. and Bradford Robbins.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 28, 2014.
10.28	Employment Agreement dated September 1, 2014 between Teradyne, Inc. and Bradford Robbins.*	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 28, 2014.
10.29	Executive Change in Control Agreement dated February 8, 2016 between Teradyne, Inc. and Gregory S. Smith.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended April 3, 2016.
10.30	Employment Agreement dated February 8, 2016 between Teradyne, Inc. and Gregory S. Smith.*	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended April 3, 2016.
10.31	Teradyne Offer of Employment dated February 8, 2019 for Sanjay Mehta.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019.
10.32	Executive Officer Change in Control Agreement dated April 25, 2019 between Teradyne, Inc. and Sanjay Mehta.*	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019.
10.33	Employment Agreement dated April 25, 2019 between Teradyne, Inc. and Sanjay Mehta.*	Exhibit 10.3 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019.
10.34	Agreement Regarding Termination Benefits dated April 25, 2019 between Teradyne, Inc. and Sanjay Mehta.*	Exhibit 10.4 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019.

Table of Contents

10.35	Executive Officer Change in Control Agreement dated October 1, 2020 between Teradyne, Inc. and Richard Burns.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 27, 2020.
10.36	Executive Officer Change in Control Agreement dated August 21, 2023 between Teradyne, Inc. and Ujjwal Kumar.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended October 1, 2023.
10.37	Employment Agreement dated June 27, 2023 between Teradyne, Inc. and Ujjwal Kumar.*	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended October 1, 2023.
10.38	Executive Officer Change in Control Agreement dated February 2, 2024 between Teradyne, Inc. and Ryan Driscoll.*	Exhibit 10.38 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2023.
10.39	Employment Agreement dated October 1, 2020 between Teradyne, Inc. and Richard Burns.*	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 27, 2020.
10.40	Executive Officer Change in Control Agreement dated November 14, 2023 between Teradyne, Inc. and John Wood.*	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 29, 2024.
10.41	Executive Officer Change in Control Agreement dated August 23, 2024 between Teradyne, Inc. and John Lukez.*	Exhibit 10.2 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended September 29, 2024.
10.42	Time-Based Restricted Stock Unit Agreement dated May 1, 2019 for Sanjay Mehta under 2006 Equity and Cash Compensation Plan.*	Exhibit 10.5 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019.
10.43	Form of Indemnification Agreement.*	Exhibit 10.24 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2006.
10.44	LitePoint Corporation 2002 Stock Plan.	Exhibit 10.43 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2011.
10.45	Credit Agreement dated May 1, 2020 among Teradyne, Inc., Truist Bank, as the administrative agent, issuing bank and swingline lender, and other lenders party thereto.	Exhibit 10.1 to Teradyne's Current Report on Form 8-K filed May 5, 2020.
10.46	First Amendment to Credit Agreement dated December 10, 2021 among Teradyne, Inc., Truist Bank, as the administrative agent, issuing bank and swingline lender, and other lenders party thereto.	Exhibit 10.52 to Teradyne's Annual Report on Form 10-K for the fiscal year ended December 31, 2021.
10.47	Second Amendment to Credit Agreement dated October 5, 2022 among Teradyne, Inc., Truist Bank, as the administrative agent, issuing bank and swingline lender, and other lenders party thereto.	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended October 2, 2022.
10.48	Third Amendment to Credit Agreement dated November 7, 2023 among Teradyne, Inc., Truist Bank, as the administrative agent, issuing bank and swingline lender, and other lenders party thereto	Exhibit 10.1 to Teradyne's Quarterly Report on Form 10-Q for the quarter ended June 30, 2024.
21.1	Subsidiaries of Teradyne.	Filed herewith.
23.1	Consent of PricewaterhouseCoopers LLP.	Filed herewith.
31.1	Rule 13a-14(a) Certification of Principal Executive Officer.	Filed herewith.
31.2	Rule 13a-14(a) Certification of Principal Financial Officer.	Filed herewith.
32.1	Section 1350 Certification of Principal Executive Officer.	Furnished herewith.
32.2	Section 1350 Certification of Principal Financial Officer.	Furnished herewith.
97.1	Policy for Recoupment of Incentive Compensation.	Filed herewith.
101	The following financial information from Teradyne, Inc.'s Annual Report on Form 10-K for the fiscal year ended December 31, 2023, formatted in Inline XBRL (eXtensible Business Reporting Language): (i) Consolidated Balance Sheets as of December 31, 2023 and December 31, 2022, (ii)	

[Table of Contents](#)

Consolidated Statements of Operations for the years ended December 31, 2023, 2022 and 2021, (iii) Consolidated Statements of Comprehensive Income (Loss) for the years ended December 31, 2023, 2022 and 2021 (iv) Consolidated Statements of Shareholders' Equity for the years ended December 31, 2023, 2022 and 2021, (v) Consolidated Statements of Cash Flows for the years ended December 31, 2023, 2022 and 2021, and (vi) the Notes to Consolidated Financial Statements.

104 The cover page of the Annual Report on Form 10-K formatted in Inline XBRL (included in Exhibit 101).

† -Confidential treatment granted.

* -Management contract or compensatory plan.

SIGNATURES

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized this 20th day of February 2025.

TERADYNE, INC.

By: _____
/S/ SANJAY MEHTA
Sanjay Mehta,
Vice President, Chief Financial Officer and
Treasurer

Pursuant to the requirements of the Securities Exchange Act of 1934, this report has been signed below by the following persons on behalf of the registrant and in the capacities and on the dates indicated.

<u>Signature</u>	<u>Title</u>	<u>Date</u>
<u>/S/ PAUL J. TUFANO</u> Paul J. Tufano	Chair of the Board	February 20, 2025
<u>/S/ GREGORY SMITH</u> Gregory Smith	Chief Executive Officer (Principal Executive Officer) and Director	February 20, 2025
<u>/S/ SANJAY MEHTA</u> Sanjay Mehta	Vice President, Chief Financial Officer and Treasurer (Principal Financial and Accounting Officer)	February 20, 2025
<u>/S/ PETER HERWECK</u> Peter Herweck	Director	February 20, 2025
<u>/S/ MERCEDES JOHNSON</u> Mercedes Johnson	Director	February 20, 2025
<u>/S/ ERNEST E. MADDOCK</u> Ernest E. Maddock	Director	February 20, 2025
<u>/S/ MARILYN MATZ</u> Marilyn Matz	Director	February 20, 2025
<u>/S/ FOUAD TAMER</u> Fouad Tamer	Director	February 20, 2025
<u>/S/ BRIDGET VAN KRALINGEN</u> Bridget van Kralingen	Director	February 20, 2025

DESCRIPTION OF COMMON STOCK

As of December 31, 2024, Teradyne, Inc. (“Teradyne” or the “Company”) has its common stock as the only class of securities under Section 12 of the Securities Exchange Act of 1934, as amended.

The following is a description of the material terms and provisions of the Company’s common stock and may not contain all the information that is important to you. Please refer to the Company’s Restated Articles of Organization (the “Articles of Organization”) and Amended and Restated Bylaws (the “Bylaws”) for complete information.

Under the Company’s Articles of Organization, it has authority to issue 1,000,000,000 shares of common stock, par value \$0.125 per share. As of December 31, 2024, there were 161,931,047 shares of common stock outstanding.

Common Stock

Holders of Teradyne common stock are entitled to one vote for each share held on all matters submitted to a vote of stockholders. Since holders of Teradyne common stock do not have cumulative voting rights, the holders of more than 50% of Teradyne common stock can elect all the directors if they so choose. Holders of Teradyne common stock are entitled to receive ratably dividends, if any, as may be declared by the Teradyne board of directors out of funds legally available for payment of dividends. Upon the liquidation, dissolution or winding up of Teradyne, holders of Teradyne common stock are entitled to receive ratably the net assets of Teradyne available after the payment of all debts and other liabilities of Teradyne. Holders of Teradyne common stock have no preemptive, subscription, redemption or conversion rights, nor are they entitled to the benefit of any sinking fund. The outstanding shares of common stock are fully paid and non-assessable.

The transfer agent and registrar for the common stock is Broadridge Corporate Issuer Solutions, Inc., P.O. Box 1342, Brentwood, NY 11717. The common stock is listed on the Nasdaq Global Select Market under the trading symbol “TER.”

Anti-Takeover Effects of Massachusetts Law and Provisions of our Charter Documents

Certain provisions in the Massachusetts General Laws, the Articles of Organization and the Bylaws may have the effect of delaying, deferring or preventing a change in control of Teradyne, including:

Special Meetings of Stockholders. Special meetings of our stockholders may be called only by the Chief Executive Officer, the President, by the directors or by the Secretary, or in case of the death, absence, incapacity or refusal of the Secretary, by any other officer, upon written application of one or more stockholders who hold at least a majority of the shares of our capital stock entitled to vote at such a meeting (or such lesser percentage in interest as shall be the maximum percentage permitted under Massachusetts law).

Advance Notice Procedures. The Bylaws establish an advance notice procedure for stockholder proposals to be brought before an annual meeting of the Company’s stockholders, including proposed nominations of persons for election to the board of directors. Stockholders at an annual meeting may only consider proposals or nominations specified in the written notice of meeting or brought before the meeting by or at the direction of the board of directors, the Chief Executive Officer or the President or by a stockholder who was a stockholder of record on the record date for the meeting, who is entitled to vote at the meeting and who has given our Secretary timely written notice, in proper form, of the stockholder’s intention to bring that business before the meeting, or pursuant to the proxy access nomination procedures in the Bylaws.

Proxy Access Nominations. Under the Bylaws, the Company will include in its proxy statement for an annual meeting the name, together with certain other required information, of any person nominated for the election of to the board of directors in compliance with specified provisions in the Bylaws by a single stockholder that satisfies (or by a group of no more than 20 stockholders that satisfy) various notice and other requirements specified in the Bylaws. Among other requirements in the Bylaws, such stockholder or group of stockholders would need to provide evidence verifying that the stockholder or group owns, and has owned continuously for the preceding three years, at

least 3% of the issued and outstanding voting shares of the Company. The Bylaws contain limitations on the maximum number of nominees submitted by stockholders that the Company would be required to include in its proxy statement for an annual meeting.

Removal of Directors and Vacancies. The Bylaws provide that any director may be removed from office only (a) for cause as defined in the Massachusetts General Laws and by the affirmative vote of a majority of our outstanding shares and entitled to vote in the election of directors or (b) for cause by vote of a majority of the directors then in office. Vacancies and newly created directorships, whether resulting from an increase in the size of the board of directors, from the death, resignation, disqualification or removal of a director or otherwise, shall be filled solely by the affirmative vote of a majority of the remaining directors then in office, even though less than a quorum of the board of directors.

Indemnification of Directors, Officers and Employees. Pursuant to the Articles of Organization and Bylaws, Teradyne shall indemnify, to the full extent authorized by law, any person made or threatened to be made a party to an action, suit or proceeding, whether criminal, civil, administrative or investigative, by reason of the fact that he or she is or was a director, officer, employee or agent of Teradyne or is or was serving, at the request of the Teradyne, as a director, officer, employee or agent of another organization. The board of directors may, without stockholder approval, authorize Teradyne to enter into agreements, including any amendments or modifications thereto, with any of its directors, officers, employees or other agents providing for indemnification of such persons to the maximum extent permitted under applicable law and Teradyne's Articles of Organization and Bylaws.

Business Combinations with Interested Stockholders. The Massachusetts General Laws contain anti-takeover provisions regarding, among other things, business combinations with an affiliated stockholder. In general, the Massachusetts General Laws prevent a publicly held Massachusetts corporation from engaging in a business combination, as defined in the Massachusetts General Laws, with an interested stockholder for a period of three years after the date of the transaction in which the person became an interested stockholder, unless:

- before the date on which the person became an interested stockholder, the board of directors of the corporation approved either the business combination or the transaction in which the person became an interested stockholder;
- the interested stockholder acquires at least 90% of the outstanding voting stock of the corporation at the time it becomes an interested stockholder; or
- the business combination is approved by the board of directors and the holders of at least two-thirds of the outstanding voting stock of the corporation voting at a meeting, excluding the voting stock owned by the interested stockholder.

An interested stockholder is generally a person owning 5% or more of the outstanding voting stock of the corporation. A business combination includes mergers, consolidations, stock and asset sales and other transactions with the interested stockholder that result in a financial benefit to the interested stockholder.

Control Share Acquisitions. Teradyne has elected to opt out of the control share acquisitions provisions of the Massachusetts General Laws. Teradyne could, however, opt into these control share acquisitions provisions at any time by amending our Bylaws.

In general, the control share acquisitions provisions of the Massachusetts General Laws provide that any person, including his, her or its affiliates, who acquires shares of a corporation that are subject to the control share acquisitions statute and whose shares represent one-fifth or more, one-third or more, or a majority or more of the voting power of the corporation in the election of directors cannot exercise any voting power with respect to those shares, or any shares acquired by the person within 90 days before or after an acquisition of this nature, unless these voting rights are authorized by the stockholders of the corporation.

The authorization of voting rights requires the affirmative vote of the holders of a majority of the outstanding voting shares, excluding shares owned by:

- the person making an acquisition of this nature;
-

- any officer of the corporate; and
- any employee who is also a director of the corporation.

There are several other types of share acquisitions that are not subject to these provisions of the Massachusetts General Laws, including acquisitions of shares under a tender offer, merger or consolidation which is made in connection with an agreement to which the corporation is a party and acquisitions of shares directly from the corporation or a wholly owned subsidiary of the corporation.

Present Subsidiaries

Entity Name:	State or Jurisdiction Of Incorporation	Percentage of Voting Securities Owned
Teradyne (Asia) Pte., Ltd.	Singapore	100 %*
Teradyne Canada Limited	Canada	100 %
Teradyne de Costa Rica S.R.L.	Costa Rica	100 %
Teradyne GmbH	Germany	100 %*
Teradyne Holdings Denmark ApS	Denmark	100%*
Teradyne International Holdings B.V.	The Netherlands	100 %
Teradyne International UK Holdings Ltd.	United Kingdom	100%*
Teradyne Israel Limited	Israel	100%
Teradyne Italia SrL	Italy	100 %*
Teradyne K.K.	Japan	100 %
Teradyne Korea Ltd.	Korea	100 %*
Teradyne Limited	United Kingdom	100 %*
Teradyne Malaysia Sdn. Bhd.	Malaysia	100%*
Teradyne Philippines Limited	Delaware	100 %
Teradyne SAS	France	100 %
Teradyne (Shanghai) Co., Ltd	Peoples Republic of China	100 %*
Teradyne Taiwan LLC	Delaware	100 %*
Teradyne Thailand Limited.	Delaware	100 %
GenRad, LLC	Delaware	100 %
Herco Technology Corp.	California	100 %
P.L.S.T., Inc. (f/k/a Perception Laminates, Inc.)	California	100 %
Eagle Test Systems, Inc.	Delaware	100 %
Nextest Systems Corporation	Delaware	100 %
Lemsys SA	Switzerland	100%*
LitePoint Corporation	Delaware	100 %
LitePoint Europe A/S	Denmark	100 %*
LitePoint Technology Limited	Hong Kong	100 %*
LitePoint Technology (Shanghai) Company Ltd.	Peoples Republic of China	100 %*
LitePoint Vietnam Limited	Socialist Republic of Vietnam	100%*
Mobile Industrial Robots, Inc.	Delaware	100%*
Teradyne Robotics, Inc. (f/k/a MiR Global, Inc.)	Delaware	100%
MiR Robots (Shanghai) Co. Ltd.	Peoples Republic of China	100%*
Teradyne Robotics A/S (successor to merger between Universal Robots A/S and Mobile Industrial Robots A/S)	Denmark	100%*
Universal Robots (India) Pte. Ltd.	India	100%*
Universal Robots (Shanghai) Co. Ltd.	Peoples Republic of China	100%*
Universal Robots (USA), Inc.	Delaware	100%*
Teradyne Robotics (Germany) GmbH	Germany	100%*
Teradyne Robotics (Spain) S.L.	Spain	100%*
Universal Robots Mexico S.A. de C.V.	Mexico	100%*
Universal Robots (UK) Ltd.....	United Kingdom	100%*
UR Technology (Shanghai) Co. Ltd.	People Republic of China	100%*

* Indirect subsidiaries whose voting securities are 100% controlled by Teradyne, Inc.

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We hereby consent to the incorporation by reference in the Registration Statements on Form S-8 (Nos. 333-256136; 333-188824; 333-159723; 333-143231; 333-134519; 333-116632; 333-101983; 333-56373; and 333-07177) of Teradyne, Inc. of our report dated February 20, 2025 relating to the financial statements, financial statement schedule and the effectiveness of internal control over financial reporting, which appears in this Form 10-K.

/s/ PricewaterhouseCoopers LLP
Boston, Massachusetts
February 20, 2025

CERTIFICATIONS

I, Gregory Smith, certify that:

1. I have reviewed this annual report on Form 10-K of Teradyne, Inc.;
2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;
3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this report;
4. The registrant's other certifying officers and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:
 - (a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;
 - (b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;
 - (c) Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures as of the end of the period covered by this report based on such evaluation; and
 - (d) Disclosed in this report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of an annual report) that has materially affected, or is reasonably likely to materially affect, the registrant's internal control over financial reporting; and
5. The registrant's other certifying officers and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of the registrant's board of directors (or persons performing the equivalent functions):
 - (a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and
 - (b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal control over financial reporting.

Date: February 20, 2025

By: _____
/s/ GREGORY SMITH
Gregory Smith
Chief Executive Officer

**CERTIFICATION PURSUANT TO
18 U.S.C SECTION 1350,
AS ADOPTED PURSUANT TO
SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002**

In connection with the Annual Report of Teradyne, Inc. (the "Company") on Form 10-K for the period ending December 31, 2024 as filed with the Securities and Exchange Commission on the date hereof (the "Report"), I, Gregory Smith, Chief Executive Officer of the Company, certify pursuant to 18 U.S.C Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that to the best of my knowledge:

- (1) The Report fully complies with the requirements of section 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended; and
- (2) The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

/S/ GREGORY SMITH

Gregory Smith
Chief Executive Officer

February 20, 2025

**CERTIFICATION PURSUANT TO
18 U.S.C SECTION 1350,
AS ADOPTED PURSUANT TO
SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002**

In connection with the Annual Report of Teradyne, Inc. (the "Company") on Form 10-K for the period ending December 31, 2024 as filed with the Securities and Exchange Commission on the date hereof (the "Report"), I, Sanjay Mehta, Chief Financial Officer of the Company, certify pursuant to 18 U.S.C Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that to the best of my knowledge:

- (1) The Report fully complies with the requirements of section 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended; and
- (2) The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

/s/ SANJAY MEHTA

Sanjay Mehta
Chief Financial Officer

February 20, 2025

TERADYNE, INC.
POLICY FOR RECOUPMENT OF INCENTIVE COMPENSATION

1. Introduction

In accordance with Section 10D of the Securities Exchange Act of 1934, as amended, and the regulations thereunder, the Board of Directors (the "**Board**") of Teradyne, Inc. (the "**Company**") has adopted a policy (the "**Policy**") providing for the Company's recoupment of certain incentive-based compensation received by Covered Executives (as defined below) in the event that the Company is required to prepare an accounting restatement due to its material noncompliance with any financial reporting requirement under the securities laws. This Policy is designed to comply with, and shall be construed and interpreted to be consistent with, Section 10D of the Exchange Act, Rule 10D-1 promulgated under the Exchange Act and Listing Rule 5608 of the corporate governance rules of The Nasdaq Stock Market.

2. Administration

Administration and enforcement of this Policy is delegated to the Compensation Committee of the Board (as constituted from time to time, and including any successor committee, the "**Committee**"). The Committee shall make all determinations under this Policy in its sole discretion. Determinations of the Committee under this Policy need not be uniform with respect to any or all Covered Executives and will be final and binding.

3. Effective Date

This Policy shall be effective as of October 2, 2023 (the "**Effective Date**") and shall apply only to Covered Compensation (as defined below) that is received by Covered Executives on or after the Effective Date.

4. Covered Executives

This Policy covers each current or former officer of the Company subject to Section 16 of the Securities Exchange Act of 1934, as amended (each, a "**Covered Executive**").

5. Covered Compensation

This Policy applies to any compensation, including cash-based and equity-based incentive compensation, that are received by a Covered Executive and that were based, wholly or in part, upon the attainment of any financial reporting measure ("**Covered Compensation**"). For the avoidance of doubt, none of the following shall be deemed to be Covered Compensation: base salary, a bonus that is paid solely at the discretion of the Committee or Board and not paid from a bonus pool determined by satisfying a financial reporting measure performance goal, cash or equity-based awards that are earned solely upon satisfaction of one or more subjective, operational or strategic standards, and equity awards for which the grant is not contingent upon achieving any financial reporting measure performance goal and vesting is contingent solely upon completion of a specified employment period and/or attaining one or more nonfinancial reporting measures. This Policy shall apply to any Covered Compensation received by an employee who served as a Covered Executive at any time during the performance period for that Covered Compensation, even if the payment or vesting occurs after the end of that period. For purposes of this Policy, financial reporting measures are measures that are determined and presented in accordance with the accounting principles used in preparing the Company's financial statements, and any measures that are derived wholly or in part from such measures. Stock price and total shareholder return (TSR) are also financial reporting measures.

6. Financial Restatements; Recoupment

In the event that the Company is required to prepare an accounting restatement due to the material noncompliance of the Company with any financial reporting requirement under the securities laws, including any required accounting restatement to correct an error in previously issued financial statements that is material to the previously issued financial statements, or that would result in a material misstatement if the error were corrected in the current period or left uncorrected in the current period (such an accounting restatement, a "**Restatement**"), the Committee shall review

the Covered Compensation received by a Covered Executive during the three completed fiscal years preceding the fiscal year that includes the Required Financial Restatement Date as well as any transition period that results from a change in the Company's fiscal year within or immediately following those three completed fiscal years. Regardless of whether the Company filed the restated financial statements, the Committee shall, to the full extent permitted by governing law, seek recoupment, reasonably promptly, of any such Covered Compensation (computed without regard to any taxes paid), if and to the extent

- a. the amount of the Covered Compensation was calculated based upon the achievement of certain financial results that were subsequently the subject of a Restatement; and
- b. the amount of the Covered Compensation that would have been received by the Covered Executive had the financial results been properly reported would have been lower than the amount actually awarded (any such amount, "Erroneously-Awarded Compensation").

To the extent Covered Compensation was based on the achievement of a financial reporting measure, but the amount of such Covered Compensation was not awarded or paid on a formulaic basis, the Committee shall determine the amount, if any, of such Covered Compensation that is deemed to be Erroneously-Awarded Compensation. For incentive-based compensation based on stock price or TSR, where the amount of Erroneously-Awarded Compensation is not subject to mathematical recalculation directly from the information in an accounting restatement, the Committee shall determine the amount based on a reasonable estimate of the effect of the accounting restatement on the stock price or TSR upon which the incentive-based compensation was received.

For purposes of this Policy, the "Required Financial Restatement Date" is the earlier to occur of:

- a. the date the Board, a committee of the Board, or any officer or officers authorized to take such action if Board action is not required, concludes, or reasonably should have concluded, that the Company is required to prepare a Restatement; or
- b. the date a court, regulator, or other legally authorized body directs the Company to prepare a Restatement.

For the avoidance of doubt, a Covered Executive will be deemed to have received Covered Compensation in the Company's fiscal period during which the financial reporting measure specified in the award is attained, even if the Covered Executive remains subject to additional payment conditions with respect to such award.

7. Method of Recoupment

The Committee will determine, in its sole discretion, the method for recouping Erroneously-Awarded Compensation, which may include, without limitation:

- a. requiring reimbursement of cash incentive compensation previously paid;
- b. cancelling or rescinding some or all outstanding vested or unvested equity (and/or equity-based) awards;
- c. adjusting or withholding from unpaid compensation or other set-off to the extent permitted by applicable law;
- d. reducing or eliminating future salary increases, cash-based or equity-based incentive compensation, bonuses, awards or severance; and/or
- e. taking any other remedial and recovery action permitted by law, as determined by the Committee.

8. Impracticability Exceptions

The Committee may determine not to seek recoupment of any Erroneously-Awarded Compensation to the extent it determines it would be impracticable because:

- a. after a reasonable attempt to recover any Erroneously-Awarded Compensation is made, the direct expense paid to a third party to assist in enforcing this Policy would exceed the amount of Erroneously-Awarded Compensation to be recovered;
- b. recovery would violate home country law where that law was adopted prior to November 28, 2022 based on an opinion of home country counsel; and/or
- c. recovery would likely cause an otherwise tax-qualified retirement plan, under which benefits are broadly available to Company employees, to fail to meet the requirements of Sections 401(a)(13) and 411(a) of the Internal Revenue Code of 1986, as amended, and the regulations thereunder.

9. No Indemnification

For the avoidance of doubt, the Company shall not indemnify any Covered Executive against the loss of any Erroneously-Awarded Compensation or any Covered Compensation that is recouped pursuant to the terms of this Policy, or any claims relating to the Company's enforcement of its rights under this Policy.

10. Severability

If any provision of this Policy or the application of any such provision to any Covered Executive shall be adjudicated to be invalid, illegal or unenforceable in any respect, such invalidity, illegality or unenforceability shall not affect any other provisions of this Policy, and the invalid, illegal or unenforceable provisions shall be deemed amended to the minimum extent necessary to render any such provision or application enforceable.

11. Amendments

The Committee may amend, modify or terminate this Policy in whole or in part at any time and may adopt such rules and procedures that it deems necessary or appropriate to implement this Policy or to comply with applicable laws and regulations.

12. No Impairment of Other Remedies

The remedies under this Policy are in addition to, and not in lieu of, any legal and equitable claims the Company may have, the Company's ability to enforce, without duplication, the recoupment provisions set forth in any separate Company policy or in any Company plan, program or agreement (each, a "Separate Recoupment Policy" and collectively, the "Separate Recoupment Policies"), or any actions that may be imposed by law enforcement agencies, regulators or other authorities. Notwithstanding the foregoing, in the event that there is a conflict between the application of this Policy to a Covered Executive in the event of a Restatement and any additional recoupment provisions set forth in a Separate Recoupment Policy to which a Covered Executive is subject, the provisions of this Policy shall control. The Company may also adopt additional Separate Recoupment Policies in the future or amend existing requirements as required by law or regulation.
