

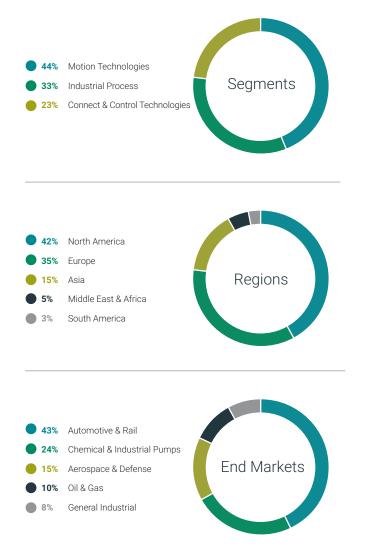
annual report 2019



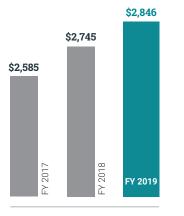
ABOUT US

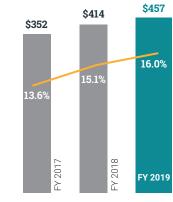
At ITT, we have a clear purpose as a company and a team – to partner with our customers in key global end markets to solve their most critical problems. That vision is core to who we are, and over the past few years it has driven our focus on continually building our foundation, capabilities and track record as a growth-oriented, multi-industrial manufacturing company.

REVENUE PROFILE



FINANCIAL HIGHLIGHTS (in millions, except per share data)

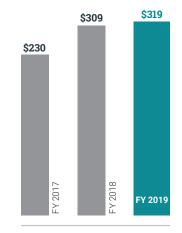




Revenue

Adjusted Segment Operating Income & Adjusted Segment Operating Margin*





Adjusted Free Cash Flow*

* For a reconciliation of non-GAAP to GAAP results, please refer to the section titled "Key Performance Indicators and Non-GAAP Measures" or to "Non-GAAP Reconciliations" on our website at itt.com/investors/earnings.

CEO LETTER

ANNUAL REPORT

DEAR SHAREHOLDERS, CUSTOMERS AND EMPLOYEES,

I am honored and humbled to share the results of the hard work our ITTers delivered each and every day in 2019. First and foremost, I would like to thank our valued customers, who continued to trust us across industries and across the world, to deliver critical solutions that helped them achieve their goals.

This year marked the third year of ITT's transformation journey. A journey that started in January 2017 and that elevated the strategic standing of Execution at ITT. In the face of ever-changing market conditions, we gained market share across industries thanks to ITT's superior customer experience – which was powered by our intense focus on execution. This translated into record ITT results and segment operating margin growth of 300 basis points driven by solid improvements at all three segments.

At the start of 2019 we established three very clear priorities:

- Customer Centricity
- Operational Excellence
- Effective Capital Deployment

CUSTOMER CENTRICITY:

Our focus on creating value for our customers and on helping them to win drove organic growth across our businesses. In Motion Technologies (MT), we continued to gain share in key strategic markets, including MT Friction, where Original Equipment Platform awards increased nearly 30 percent, through our focus on quality, delivery, and customer engagement. The superior customer experience in the Friction OE market enabled ITT to outgrow the market by 1,600 basis points in 2019. At Industrial Process (IP), we enhanced our service to customers and distributors, we improved project execution, and we delivered on our commitments with on time delivery above 90 percent in the last four months of 2019 enabling us to produce 10 percent organic revenue growth.

OPERATIONAL EXCELLENCE

In 2019, every ITTer "walked the talk"; we rolled up our sleeves and maintained a laser focus on execution. We improved adjusted operating margins in every segment while creating value for our customers by becoming more costcompetitive. In Connect and Control Technologies (CCT), we successfully executed 14 product line transfers from high-cost regions to our facilities in Nogales, Mexico and Shenzhen, China, Additionally, CCT in-sourced critical plating processes to enhance our competitiveness and to improve our lead times to our customers. At IP, our relentless focus on operational excellence delivered improvements in shop floor efficiency, reductions in production bottlenecks, and increases in our equipment utilization. To further cost-savings actions across ITT, we took a hard look at our corporate expenses and were able to generate efficiencies and eliminate waste that helped us deliver savings of 24 percent on an adjusted basis over the previous year.

EFFECTIVE CAPITAL DEPLOYMENT:

In 2019, we deployed capital with discipline and precision. Long term value creation has been the mantra for each and every investment decision we made. We invested in core capabilities, equipment improvements, and technology across all of our businesses, focusing on productivity, process modernization and innovation, always with the goal of improving support to our customers. We also executed two close-to-core acquisitions, Matrix Composites in CCT and Rheinhütte Pumpen Group in IP. These newest members of the ITT family are progressing well toward our long-term strategic expectations while already being accretive to our adjusted results in year one. In addition to Organic and Inorganic Capital Deployment, in 2019, we immunized our United States pension plan at more than 107 percent funded status level and we returned \$94 million to our shareholders.

During 2019, ITT proved and improved its resilience and ITTers all around the world delivered on our commitments as each and every one of us lived our strategic priorities every day. "Actions speak louder than words" – and in 2019 our actions were loud. The journey continues in the uniquely challenging year ahead, and with hard work, and a laser focus on our priorities and our people, we will strive to continue to create value for all our stakeholders.

Sincerely,

Luca Savi Chief Executive Officer & President, ITT Inc.



OUR TEAM

ITT BOARD OF DIRECTORS

Frank T. MacInnis Chairman of the ITT Board of Directors and Former Chairman and Chief Executive Officer, EMCOR Group, Inc.

Luca Savi Chief Executive Officer and President, ITT Inc.

Orlando D. Ashford President, Holland America Line

Geraud Darnis Former President and Chief Executive Officer, UTC Building & Industrial Systems

Donald DeFosset, Jr. Former Chairman, Chief Executive Officer and President, Walter Industries, Inc.

Luca Savi Chief Executive Officer and President

Farrokh Batliwala Senior Vice President and President, Connect and Control Technologies

Ryan Flynn Senior Vice President and President, Asia Pacific Nicholas C. Fanandakis Former Executive Vice President, Dow DuPont

Christina A. Gold Former Chief Executive Officer and President, The Western Union Company, Inc.

Richard P. Lavin Former Chief Executive Officer and President, Commercial Vehicle Group, Inc.

Mario Longhi Former President and Chief Executive Officer, United States Steel Corporation

Rebecca A. McDonald Former Chief Executive Officer, Laurus Energy, Inc.

Carlo Ghirardo Senior Vice President and President, Motion Technologies

Mary Beth Gustafsson Senior Vice President, General Counsel and Corporate Secretary

George Hanna Senior Vice President and President, Industrial Process Former Chairman, Chief Executive Officer and President, Hubbell, Incorporated

Timothy H. Powers

Cheryl L. Shavers Chairman and Chief Executive Officer, Global Smarts, Inc.

Sabrina Soussan Chief Executive Officer, Siemens Mobility

Maurine Lembesis Senior Vice President and Chief Human Resources Officer

Francesco Lucciola Vice President, Strategy and Business Development

Thomas M. Scalera Executive Vice President and Chief Financial Officer

SHAREHOLDER INFORMATION

LEADERSHIP

ITT

TEAM

INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

Deloitte & Touche LLP 695 East Main Street Stamford, CT 06901

TRANSFER AGENT & REGISTRAR

Computershare 462 South 4th Street, Suite 1600 Louisville, KY 40202 (888) 217-2614

ANNUAL MEETING OF SHAREHOLDERS

The annual meeting will be held at 9 a.m. EDT on Friday, May 15, 2020 at ITT Inc. Headquarters, 1133 Westchester Avenue, White Plains, NY 10604.

CORPORATE GOVERNANCE

Copies of the ITT Code of Conduct, Corporate Governance Principles and Committee charters are available on our website: www.itt.com. ETHICS CHAMPION PROGRAM The ITT Ethics Champion Program encourages employees

to report possible violations of our Code of Corporate Conduct or other misconduct. The ITT Ethics Champion can be contacted at: (800) 777-1738.

FOR GENERAL CORPORATE INFORMATION, CONTACT:

Lisa Wolfe, Communications lisa.wolfe@itt.com

FOR FINANCIAL AND INDUSTRY INFORMATION, CONTACT:

Emmanuel Caprais, Investor Relations emmanuel.caprais@itt.com

CEO & PRESIDENT Luca Savi WORLDWIDE EMPLOYEES 10.000+ FOUNDED 1920 NYSE ITT

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

FORM 10-K

(Mark One)

 \checkmark

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

For the fiscal year ended December 31, 2019

OR

TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

For the Transition period from to Commission File No. 001-05672

ITT INC.

Incorporated in the State of Indiana

(State or Other Jurisdiction of Incorporation or Organization)

1133 Westchester Avenue White Plains, NY 10604 (Principal Executive Office) Telephone Number: (914) 641-2000 81-1197930

(I.R.S. Employer Identification No.)

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 \$1 per share	ІТТ	New York Stock Exchange

Securities registered pursuant to Section 12(g) of the Act: None.

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 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 \square No \square

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

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

☑ Large accelerated filer □ Accelerated filer □ Non-accelerated filer □ Smaller reporting company

□ Emerging growth company

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 is a shell company (as defined in Rule 12b-2 of the Act). Yes 🗆 No 🗹

The aggregate market value of the common stock of the registrant held by non-affiliates of the registrant on June 30, 2019 was approximately \$5.7 billion. As of February 19, 2020, there were outstanding 87.8 million shares of common stock, \$1 par value, of the registrant.

DOCUMENTS INCORPORATED BY REFERENCE

Portions of the registrant's Definitive Proxy Statement to be filed with the Securities and Exchange Commission pursuant to Regulation 14A for its 2020 Annual Meeting of Shareholders are incorporated by reference in Part II and Part III of this Form 10-K.

TABLE OF CONTENTS

ITE	Λ	PAGE
PAF	RT I	
1	Description of Business	1
1A	Risk Factors	8
1B	Unresolved Staff Comments	17
2	Properties	17
3	Legal Proceedings	18
4	Mine Safety Disclosures	18
*	Executive Officers of the Registrant	19
PAF		
5	Market for Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities	21
6	Selected Financial Data	23
7	Management's Discussion and Analysis of Financial Condition and Results of Operations	24
7A	Quantitative and Qualitative Disclosures About Market Risk	45
8	Financial Statements and Supplementary Data	45
9	Changes in and Disagreements with Accountants on Accounting and Financial Disclosure	45
9A	Controls and Procedures	46
9B	Other Information	47
PAF		
10	Directors, Executive Officers and Corporate Governance	49
11	Executive Compensation	49
12	Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters	49
13	Certain Relationships and Related Transactions, and Director Independence	49
14	Principal Accounting Fees and Services	49
PAF		
15	Exhibits and Financial Statement Schedule	50
16	Form 10-K Summary	50
Exh	ibit Index	II-1
Sig	natures	11-4
*	Included pursuant to Instruction 3 to Item 401(b) of Regulation S-K.	

WHERE YOU CAN FIND MORE INFORMATION

We file annual, quarterly and current reports, proxy statements and other information with the U.S. Securities and Exchange Commission (the SEC). The SEC maintains a website at www.sec.gov on which you may access our SEC filings. In addition, we make available free of charge at www.itt.com/investors copies of materials we file with, or furnish to, the SEC as soon as reasonably practical after we electronically file or furnish these reports, as well as other important information that we disclose from time to time. Information contained on our website, or that can be accessed through our website, does not constitute a part of this Annual Report on Form 10-K. We have included our website address only as an inactive textual reference and do not intend it to be an active link to our website.

Our corporate headquarters are located at 1133 Westchester Avenue, White Plains, New York 10604 and the telephone number of this location is (914) 641-2000.

FORWARD-LOOKING AND CAUTIONARY STATEMENTS

Some of the information included herein includes forward-looking statements intended to qualify for the safe harbor from liability established by the Private Securities Litigation Reform Act of 1995. These forward-looking statements are not historical facts, but rather are based on current expectations, estimates, assumptions and projections about our business, future financial results and the industry in which we operate, and other legal, regulatory and economic developments. These forward-looking statements include, but are not limited to, future strategic plans and other statements that describe the company's business strategy, outlook, objectives, plans, intentions or goals, and any discussion of future events and future operating or financial performance.

We use words such as "anticipate," "estimate," "expect," "project," "intend," "plan," "believe," "target," "future," "may," "will," "could," "should," "potential," "continue," "guidance" and other similar expressions to identify such forward-looking statements. Forward-looking statements are uncertain and to some extent unpredictable, and involve known and unknown risks, uncertainties and other important factors that could cause actual results to differ materially from those expressed or implied in, or reasonably inferred from, such forward-looking statements.

Where in any forward-looking statement we express an expectation or belief as to future results or events, such expectation or belief is based on current plans and expectations of our management, expressed in good faith and believed to have a reasonable basis. However, there can be no assurance that the expectation or belief will occur or that anticipated results will be achieved or accomplished.

Among the factors that could cause our results to differ materially from those indicated by forward-looking statements are risks and uncertainties inherent in our business including, without limitation:

- uncertainties regarding our exposure to pending and future asbestos claims and related liabilities and insurance recoveries;
- uncertain global economic and capital markets conditions, including trade disputes between the U.S. and its trading partners;
- risks due to our operations and sales outside the U.S. and in emerging markets;
- fluctuations in foreign currency exchange rates;
- uncertainty surrounding the impact of the recent 2019 novel coronavirus outbreak;
- fluctuations in customers' levels of capital investment and maintenance expenditures, especially in the oil and gas, chemical, and mining markets, or changes in our customers' anticipated production schedules, such as the shifts in production of Boeing's 737 MAX;
- failure to compete successfully in our markets;
- the extent to which there are quality problems with respect to manufacturing processes or finished goods;
- · failure to integrate acquired businesses or achieve expected benefits from such acquisitions;
- risks related to government contracting, including changes in levels of government spending and regulatory and contractual requirements applicable to sales to the U.S. government;
- · volatility in raw material prices and our suppliers' ability to meet quality and delivery requirements;
- failure to manage the distribution of products and services effectively;
- · loss of or decrease in sales from our most significant customer;
- fluctuations in our effective tax rate;
- failure to retain existing senior management, engineering and other key personnel and attract and retain new qualified personnel;
- failure to protect our intellectual property rights or violations of the intellectual property rights of others;
- the risk of material business interruptions, particularly at our manufacturing facilities;

- the risk of cybersecurity breaches;
- changes in laws relating to the use and transfer of personal and other information;
- failure of portfolio management strategies, including cost-saving and revenue growth initiatives, to meet expectations;
- changes in environmental laws or regulations, discovery of previously unknown or more extensive contamination, or the failure of a potentially responsible party to perform;
- failure to comply with the U.S. Foreign Corrupt Practices Act or other applicable anti-corruption legislation, export controls and trade sanctions, including recently announced tariffs;
- risk of product liability claims and litigation; and
- risk of liabilities from past divestitures and spin-offs.

Refer to Item 1A, "Risk Factors" for more information on factors that could cause actual results or events to differ materially from those anticipated and disclosed within this Annual Report on Form 10-K, our Quarterly Reports on Form 10-Q and in other documents we file from time to time with the SEC. The forward-looking statements included in this report speak only as of the date of this report. We undertake no obligation to update any forward-looking statements, whether as a result of new information, future events or otherwise.

PART I

ITEM 1. DESCRIPTION OF BUSINESS

(Amounts reported in this Annual Report on Form 10-K, except per share amounts, are stated in millions unless otherwise specified. References herein to "ITT," "the Company," and such words as "we," "us," and "our" include ITT Inc. and its subsidiaries on a consolidated basis, unless the context otherwise indicates.)

COMPANY OVERVIEW

ITT is a diversified manufacturer of highly engineered critical components and customized technology solutions for the transportation, industrial, and oil and gas markets. We manufacture components that are integral to the operation of systems and manufacturing processes in these key markets. Our products provide enabling functionality for applications where reliability and performance are critically important to our customers and the users of their products.

BUSINESS OVERVIEW

Sales in Approximately 125 Countries	Strategic Proximity to Customers
 2019 Revenue of \$2.85 Billion 	 65% of Revenue Outside the U.S.
Approx. 10,500 Employees in 35 Countries	 Balanced & Diversified Portfolio
3 Segments: Motion Technologies (MT), Indu	strial Process (IP), and Connect & Control Technologies (CCT)

2019 Segment Revenue Profile



MT produces friction, and shock and vibration isolation equipment; IP delivers industrial flow equipment and services; and CCT produces electronic connectors, fluid handling, motion control, composite materials, and noise and energy absorption products.

Our businesses share a common, repeatable operating model centered on our engineering capabilities. Each business applies its technology and engineering expertise to solve our customers' most pressing challenges. Our applied engineering provides a valuable business relationship with our customers given the critical nature of our applications. This in turn provides us with unique insight into our customers' requirements and enables us to develop solutions to better assist our customers to achieve their business goals. Our technology and customer intimacy together produce opportunities to capture recurring revenue streams, aftermarket opportunities, and long-lived platforms from original equipment manufacturers (OEMs).

		OUR KEY BRANDS	
MT	 ITT Friction Technologies 	• KONI	 Wolverine Advanced Materials
	Axtone	Novitek	
IP	Goulds Pumps	Bornemann	 Engineered Valves
	 PRO Services 	C'treat	• i-ALERT
	 Rheinhütte Pumpen* 		
CCT	Cannon	• VEAM	 BIW Connector Systems
	 Aerospace Controls 	Enidine	 Compact Automation
	 Neo-Dyn Process Controls 	Conoflow	 Matrix Composites*

* Acquired in 2019

These brands are associated with quality, reliability, durability, and engineering excellence. Our brands have a strong international presence and participate in many emerging markets, including China, Mexico, Brazil, Saudi Arabia, and Russia.

We are committed to continue creating long-term sustainable value for our stakeholders with our strategic framework of customer centricity, operational excellence, and effective capital deployment. Our strategy is designed to achieve premier financial performance by combining profitable growth with operational improvements, and share gains in all our businesses while keeping our customers at the center of everything we do.

The main focus of our strategy is expanding in global markets and investing in new products that leverage our deep engineering capabilities, combined with operational improvements that optimize safety, quality, on time delivery, and productivity. We are on a journey to establish a high performance culture that goes beyond the factory floor to improve the efficiency and effectiveness of all critical processes in the value chain and in all functions. These initiatives encompass not only continuous improvement principles, but also leadership, talent, and cultural aspects.

We believe that we have the opportunity to continue to expand geographically, broaden our product lines, improve our market position, and increase earnings through organic growth and targeted acquisitions. We continue to prioritize acquisitions in close-to-core businesses that have unique and differentiated products, services, and technologies. Effective capital deployment, including resource optimization and a disciplined focus on cash flow management are a major part of how we plan to achieve our financial performance goals and deliver strong shareholder return.

Segment Information

See Note 3, Segment Information, to the Consolidated Financial Statements for financial information about each of our segments.

Motion Technologies (MT)

The Motion Technologies segment, MT, is a manufacturer of brake pads, shims, shock absorbers, energy absorption components, and sealing technologies primarily for the transportation industry, including passenger cars, light- and heavy-duty commercial and military vehicles, buses, and rail. MT consists of three main business units: Friction Technologies, Wolverine, and KONI & Axtone.

Friction Technologies

Friction Technologies manufactures a range of brake pads installed as original equipment (OE) on passenger cars and light- and heavy-duty commercial vehicles. Demand for MT's products stem from a variety of end customers and automotive platforms around the world. OE pads are sold either directly to OEMs or to Tier-1 brake manufacturers. Our OE pads are designed to meet customer specifications and environmental regulations, and to satisfy an array of performance standards across multiple geographies. Most automotive OEM platforms (car models) require specific brake pad formulations and have demanding quality, delivery, and volume schedules.

Friction Technologies also manufactures aftermarket brake pads designed for the automotive service and repairs market. This market consists of both OE dealers, also referred to as original equipment service (OES) networks, and independent aftermarket (AM) networks. Brake pads sold within the OES network generally match the specifications of an original auto platform OE brake pad, while our catalog of AM pads feature technology designed to provide a range of braking performance levels. Within the service and repairs market, pads are sold either directly to OE manufacturers or to Tier-1 brake manufacturers (such as Continental) or indirectly through independent distributor channels.

Sales to Continental, MT's largest customer, represent 22% of 2019 MT revenue. A significant portion of the OEM revenue, typically about half, is derived at the automakers' direction to use an ITT brake pad in Continental's braking systems (calipers), generally through supply agreements signed directly with automakers. The remaining Continental revenue is generated from a long term aftermarket agreement.

Wolverine

Wolverine is a manufacturer of customized damping technologies for automotive braking systems and specialized gasket sealing solutions for harsh operating environments. Brake shims are thin metal and rubber adhesive dampeners that fit onto the brake pad and against the brake caliper to prevent excessive noise and vibration. Gaskets are an antivibration and sealing solution that prevent fluid spillage in applications such as engines, transmissions, exhaust systems, fuel systems, and a variety of pneumatic systems.

KONI & Axtone

The KONI and Axtone businesses service three main product groups: railway rolling stock; car & racing; and bus, truck & trailer.

- *Railway Rolling Stock* provides a wide range of equipment for passenger rail, locomotives, freight cars, high speed trains, and light rail. Offerings include customized energy absorption solutions, hydraulic shock absorbers (primary, lateral, and inter-car), yaw dampers, springs, visco-elastic and hydraulic buffers, coupler components, and crash mitigation. Revenue from for our rail damping systems are balanced between OE and AM customers. Sales are either directly to train manufacturers, train operators carrying out scheduled train maintenance programs, or indirectly through distributors.
- Car & Racing features performance shock absorbers often using our Frequency Selective Damping (FSD) technology. FSD products generally have been used by car and racing enthusiasts who desire to modify their cars for increased handling performance and comfort, and are now also being incorporated into new OEM platform designs. KONI aftermarket car shock absorbers are sold around the world, directly to customers and through a distribution network that markets KONI products into specific geographies or customer groups.

Bus, Truck & Trailer manufactures shock absorbers and dampers, for sale to both OEM and AM customers.

Other Information

Due to many years of investment in our core capabilities and our collaboration with major OEMs, today's MT is known for customer satisfaction, quality and on-time delivery. MT has a global manufacturing footprint with advanced automation capabilities, with production facilities in Europe, China, and North America.

MT competes in markets primarily served by large and well-established national and global companies. Key competitive drivers within the brake pad and brake shim business include technical expertise, formulation development capabilities, scale production, product performance, high-quality standards, customer intimacy, reputation, and the ability to meet demanding delivery and volume schedules in a reduced amount of time. OE and OES brake pad customers usually require long-lasting and well-established relationships based on mutual trust, local proximity, and a wide range of cooperative activities, starting from the design, to the sampling, prototyping and testing phases of brake pads. Within the independent AM pads market, MT is a leading European provider in a highly fragmented global market.

Competitive drivers in the rail damping systems business include price, technical expertise and product performance. Rail damping systems are considered critical components because of safety requirements and thus they have to be specifically designed according to many different train applications, and must satisfy strict compliance requirements. MT is a leader in the rail dampers component of the complete rail damper system in Europe and continues to gain market share in China.

Industrial Process (IP)

The Industrial Process segment, IP, is an original equipment manufacturer, and an aftermarket parts and service provider offering an extensive portfolio of industrial pumps, valves, and plant optimization systems and services. IP's products serve an extensive base of customers from large multi-national companies and engineering, procurement and construction (EPC) firms to regional distributors and to various other end-user customers. IP has a global manufacturing footprint with significant operations in the United States, South Korea, and Germany. IP's customers operate in global infrastructure and natural resource markets such as oil and gas, chemical and petrochemical, pharmaceutical, general industrial, mining, pulp and paper, food and beverage, and power generation. Brands include Goulds Pumps, Bornemann, Rheinhütte Pumpen, Engineered Valves, PRO Services, C'treat, and i-ALERT.

Industrial Pumps

Industrial pumps serve a wide array of customers and applications primarily in the chemical, oil and gas, mining, general industrial, pharmaceutical, and power generation markets. IP designs and manufactures configured-to-order industry standards-based industrial pumps that are highly engineered and customized to our customer's needs. These products include a broad portfolio of API (American Petroleum Institute), ANSI (American National Standards Institute), ATEX (ATmosphere EXplosible, European Directive 2014/34/EC), IECEx (IEC standards), and ISO (International Organization for Standardization) centrifugal process pumps, and twin screw, axial, and positive displacement pumps, and water systems. Our project pumps are generally part of larger and more complex capital projects, have longer lead times than baseline pumps, and are generally managed by EPC firms.

Valves

Valves are manufactured to handle a wide variety of materials and solve unique challenges in the biopharmaceutical, mining, power generation, pulp and paper, and general industrial markets and include industrial knife-gate valves, ball valves, and sanitary diaphragm valves. Valves generally have shorter lead times.

Aftermarket

Our aftermarket solutions, which represent approximately 40% of IP's revenue, provide customers with replacement parts, services, and plant optimization solutions that reduce total cost of ownership for pumps and rotating equipment. In addition to providing standard repairs and upgrades, the business also develops engineered solutions for specific customer process issues. Examples include innovative technologies like PumpSmart Smart Control & Protection Technology and i-ALERT Equipment Health Monitoring Devices to control and monitor pumps and other rotating equipment in an industrial environment.

Other Information

IP goes to market via a global and diversified sales channel structure. End-users are serviced by an extensive network of independent distributors, which account for approximately one-third of revenue, and by representatives which complement our customer-focused direct sales and service organization. We also have focused channels dedicated to supporting EPC firms, as their needs are often distinct from those of other distributors and end-user customers.

The pump and valve markets served are highly competitive, due to supplier capacity and uncertainty and volatility in the oil and gas and industrial markets. For most of our products there are hundreds of regional competitors and a limited number of larger global peers. Primary customer purchase decision drivers include price, delivery terms, and on-time performance, brand recognition and reputation, quality, breadth of product and service offerings, commercial terms, technical support and localization. Pricing can be very competitive for large projects because of overcapacity, fewer investment projects, and aftermarket opportunities for the original equipment provider.

Connect & Control Technologies (CCT)

The Connect & Control Technologies segment, CCT, designs and manufactures a range of highly engineered connectors and specialized products for critical applications supporting various markets including aerospace and defense, industrial, transportation, medical, and oil and gas. CCT's products are often components on long-lived platforms that generate recurring aftermarket and replacement opportunities. CCT has organized its business around product offerings and end-user markets, with dedicated teams that specialize in solutions for their specific markets, providing focused customer support and expertise.

Connector Products

The connector product portfolio includes high performance electrical connectors of the following types: Circular, Rectangular, Radio Frequency, Fiber Optic, D-sub Miniature, Micro-Miniature, and cable assemblies. Brands include Cannon, VEAM, and BIW Connector Systems, which deliver solutions to enable the transfer of data, signal, and power into various end-user markets including aerospace, defense, industrial, transportation, medical, and oil and gas. These brands are known for high-performance, high-reliability solutions which withstand high vibrations and are resistant to dirt and fluids. In certain harsh environment niche markets, our connector products are considered market leaders because of our technological capabilities, cost performance, and global footprint.

Products for the aerospace and defense markets include industry standards-based connectors and customized solutions for most segments of the commercial aviation and defense industries. These products are designed to withstand the extreme shock, exposure, and vibration environments that are typical in aviation and military applications and where reliability and safety are critical factors.

Products for the industrial markets include connectors for industrial production equipment, industrial electronics and instruments, and other industrial and medical applications. Products for the transportation markets include connectors for passenger rail, heavy-duty vehicles, and electric vehicle applications.

Products for the oil and gas markets include connectors that provide power for electric submersible pumps in oil wells, reservoir monitoring instruments, and electrical downhole heaters. Oil and gas product applications include electrical power penetrations for wellheads, packers, and pods that are able to accommodate various sizes and provide for multiple sealing strategies and ratings.

Control Products

The control product portfolio provides actuation, fuel management, noise and energy absorption, and environmental control systems, and precision composites, with a specialized set of design and engineering skills and capabilities that enable CCT to deliver custom solutions for unique applications for the aerospace and defense, and industrial markets.

Control products for the aerospace and defense markets consist of fuel and water pumps, valves, electromechanical rotary and linear actuators, and pressure, temperature, limit, and flow switches for various aircraft systems. These products also include stowage bin rate controls, rotary hinge dampers and actuators, seat recline locks and control cables, electromechanical seat actuation, a variety of engineered elastomer isolators to protect equipment and keep the interior of the aircraft quiet, certain energy absorption products and other aerospace components. Other control products for this market include environmental control systems such as climate control and ice protection heaters, composite conveyance ducting and acoustically engineered inlets and exhausts for auxiliary power units and precision composites used in aerospace and defense engine and airframe applications. Brands include Aerospace Controls, Enidine, and Matrix Composites.

Control products for the industrial markets include large and small bore shock absorbers, linear and rotary actuators, and process control instrumentation, such as high and low pressure regulators and flow, temperature, and pressure switches. The shock absorbers and actuators serve a wide range of applications in a diverse set of end-markets including production, packaging, factory automation, and infrastructure. The process control products primarily serve the chemical, petrochemical, and energy segments of the industrial market. Brands include Enidine and Compact Automation.

Other Information

CCT has a global production footprint, including facilities in the United States, Mexico, Germany, China, Italy, and Japan, which provide close geographic proximity to key customers. CCT competes with a large number of competitors in highly fragmented industries. CCT's competitors can range from large public multi-national corporations to small privately held local firms, depending on the product line and region. CCT's ability to compete successfully depends upon numerous factors, including quality, price, availability, performance, brand recognition, customer service, innovation, application expertise, and previous installation history. In addition, collaboration with customers to deliver a wide range of product offerings has allowed CCT to compete effectively, to cultivate and maintain customer relationships, and to expand into new markets. CCT products are sold directly and through numerous channels including distributors. CCT has long-lasting relationships with distributors, as many have been selling certain CCT products for decades. Sales to distributors represented approximately 30% of 2019 CCT revenue.

Other Company Information

Materials

All of our businesses require various manufactured components and raw materials, the availability and prices of which may fluctuate.

MANUFACTURED COMPONENTS ASSEMBLED INTO OUR PRODUCTS								
Motors	Castings							
 Mechanical Seals 	Machined Castings							
Metal Fabrications	Miscellaneous Metal, Plastic, and Electronic Components							

ED COMPONENTO ACCEMPLED INTO OUD DDO

PRIMARY RAW MATERIALS										
 Steel 	Gold	Copper	Nickel							
• Iron	 Aluminum 	• Tin	Rubber							
 Specialty Alloys, 	including Titanium									

Raw materials are purchased in various forms, such as sheet, bar, rod and wire stock, pellets, and metal powders. We also use various specialty resins and adhesives. Raw materials, supplies and product subassemblies are purchased from third-party suppliers, contract manufacturers, and commodity dealers. For most of our products, we have existing alternate sources of supply, or such materials are readily available. However, in some instances we depend on a single source of supply, manufacturing or assembly, or participate in commodity markets that may be subject to a limited number of suppliers.

We continually monitor the business conditions of our supply chain to maintain our market position and to avoid potential supply disruptions. There have been no raw material shortages that have had a material adverse impact on any such business as a whole, and we have been able to develop a robust supply chain such that we do not anticipate shortages of raw materials in the future. However, there can be no assurance that the Company will not be adversely affected by price volatility or the availability of supplies to meet our demands in the future.

Although some cost increases may be recovered through increased prices to customers, our operating results are generally exposed to fluctuations in the prices of raw materials and commodities due to inflation, and most recently, tariffs imposed by the U.S. and other countries. When practical, we attempt to control such costs through fixed-priced contracts with suppliers. We typically acquire materials and components through a combination of blanket and scheduled purchase orders to support our materials requirements for an average of four to eight weeks, with the exception of some specialty materials. From time to time, we experience price volatility or supply constraints for raw materials based on market supply and demand dynamics. In limited circumstances, we may have to obtain scarce components for higher prices on the spot market, which may have a negative impact on gross margin and can periodically create a disruption to production and delivery. We also acquire certain inventory in anticipation of supply constraints or enter into longer-term pricing commitments with vendors to improve the priority, price, and availability of supply. We evaluate hedging opportunities to mitigate or minimize the risk of operating margin erosion resulting from the volatility of commodity prices.

Manufacturing Methods

Our businesses utilize two primary methods to fulfill demand for products, build-to-order and engineer-to-order.

- Build-to-order consists of assembling a group of products with the same pre-defined specifications, generally for our OEM customers. We employ build-to-order capabilities to maximize manufacturing and logistics efficiencies by producing high volumes of basic product configurations.
- Engineer-to-order consists of assembling a customized system according to a customer's individual order specifications. Engineering products-to-order permits the configuration of units to meet the customized requirements of our customers.

In both cases, we offer design, integration, test, and other production value-added services. Our inventory management and distribution practices in both build-to-order and engineer-to-order seek to improve customer delivery performance and minimize inventory holding periods.

Backlog

Our backlog generally represents firm orders that have been received, acknowledged, and entered into our production systems. However, within certain businesses in MT, our customers include automotive OEMs and we may win an award on an automotive platform several years in advance based on estimated levels of future automotive production. These awards allow for the customer to adjust their production levels at any time, therefore these awards are not considered firm orders. Within these businesses we believe orders are firm upon receipt of the customer purchase order, which may require us to fulfill the order in as little as one week. As such, our backlog at any point in time for these businesses is not believed to be significant and therefore has been excluded from the table below. MT's backlog primarily relates to our rail business.

Our backlog may vary due to market volatility or other changes in macroeconomic conditions. Large complex projects in specialized markets such as oil and gas, chemical, and mining at IP require longer lead times and production cycles. In addition, delivery delays could arise from supply chain limitations, internal production challenges, changes in the customer's requirements, or technical difficulties. We expect to satisfy approximately 90% of backlog commitments within the next 12 months. The following table illustrates our total backlog by segment as of December 31, 2019 and 2018, respectively:

	2019	2018
Motion Technologies ^(a)	\$ 167.4	\$ 152.4
Industrial Process	395.4	444.2
Connect & Control Technologies	290.8	273.7
ITT Inc.	\$ 853.6	\$ 870.3

(a) In 2019, we updated our methodology for quantifying backlog for certain businesses within MT as described above. As a result, our 2018 backlog has been restated to conform with the current year presentation.

Intellectual Property

Where appropriate, we seek patent protection for inventions and improvements that are likely to be incorporated into our products or where proprietary rights are expected to improve our competitive position. The highly customized application engineering embedded within our products, our proprietary rights, our knowledge capabilities, and our brand recognition all contribute to enhancing our competitive position.

While we own and control a significant number of patents, trade secrets, confidential information, trademarks, trade names, copyrights, and other intellectual property rights which, in the aggregate, are of material importance to our business, management believes that our Company, as a whole, as well as each of our core segments, is not materially dependent on any one intellectual property right or related group of such rights. Patents, patent applications, and license agreements will expire or terminate over time by operation of law, in accordance with their terms or otherwise. As the portfolio of our patents, patent applications, and license agreements has evolved over a long period of time, we do not expect the expiration of any specific patent or other intellectual property right to have a material adverse effect on our financial statements.

Research and Development

Research and Development (R&D) is key to our strategy and is generally focused on the design of highly engineered solutions. R&D focuses on developing solutions that bring a competitive offering that address clear needs in the market segments we serve. In addition, we work closely with our customers to address their needs by engineering a solution to fit their particular application and enable our customers to achieve their results. We believe R&D is a source of competitive advantage and in recent years, we have invested in new innovation centers of excellence and plan to continue this effort in the future.

Cyclicality and Seasonality

Many of the businesses in which we operate are subject to specific industry and general economic cycles. We consider our connector products in our CCT segment to be an early cycle business, meaning it generally is impacted in the early portion of an economic cycle compared to our other businesses, while the automotive and aerospace components businesses tend to be impacted in the middle portion of the cycle and the industrial pump business typically is impacted late in the economic cycle.

Our businesses experience limited seasonal variations. Revenue impacts from the limited seasonal variations are typically mitigated by our backlog of orders that allow us to adjust levels of production across different periods.

Environmental Matters

We are subject to stringent federal, state, local, and foreign environmental laws and regulations concerning air emissions, water discharges and waste disposal. In the U.S., these include, but are not limited to, the Federal Clean Air Act, the Clean Water Act, the Resource, Conservation and Recovery Act, and the Comprehensive Environmental Response, Compensation and Liability Act. Environmental requirements are significant factors affecting our operations. We have established an internal program to assess compliance with applicable environmental requirements at our facilities. The program, which includes periodic audits of many of our locations, including our major operating facilities, is designed to identify problems in a timely manner, correct deficiencies and prevent future noncompliance.

We closely monitor our environmental responsibilities, together with trends in environmental laws. In addition, we have purchased insurance protection against certain environmental risks arising from our business activities. Environmental laws and regulations are subject to change, however, and the nature and timing of such changes, if any, is difficult to predict. As actual costs incurred at identified sites in future periods may vary from our current estimates given the inherent uncertainties in evaluating environmental exposures, management believes it is possible that the outcome of these uncertainties may have a material adverse effect on our financial statements. See "Critical Accounting Estimates" within Item 7, Management's Discussion and Analysis, as well as Note 20, Commitments and Contingencies, to the Consolidated Financial Statements for additional information regarding environmental matters.

Employees

As of December 31, 2019, we had approximately 10,500 employees, of which approximately 3,000 were located in the U.S. Approximately 20% of our U.S. employees are represented by unions. No one unionized facility accounts for more than 12% of ITT's total revenues. In addition, many of our global employees are covered by collective agreements or represented by works councils or other groups. Although our relations with our employees are strong and we have not experienced any material strikes or work stoppages recently, we can provide no assurance that we will not experience these or other types of conflict with groups representing our employees or our employees generally. In addition, we can provide no assurance that our labor costs will not significantly increase in the future, whether as a result of negotiations with labor unions representing our employees or otherwise.

General Developments of the Business

Acquisitions

Date of Acquisition	Segment	Business Acquired	Description
July 3, 2019	ССТ	Matrix Composites (Matrix)	Manufacturer of precision composite components in the aerospace and defense market
April 30, 2019	IP	Rheinhütte Pumpen Group (Rheinhütte)	Designer and manufacturer of highly engineered pumps suited for harsh and corrosive environments for the industrial market primarily in Europe
January 26, 2017	MT	Axtone Railway Components (Axtone)	Manufacturer of highly engineered and customized components for railway and other harsh-environment industrial markets
October 5, 2015	MT	Wolverine Automotive Holdings Inc. (Wolverine)	Manufacturer of customized technologies for automotive braking systems and specialized sealing solutions
March 31, 2015	CCT	Environmental Control Systems (f/k/a Hartzell Aerospace)	Designer and manufacturer of products to support aerospace applications

See Note 22, Acquisitions, to the Consolidated Financial Statements for additional information.

ITEM 1A. RISK FACTORS

We are subject to a wide range of factors that could materially affect future developments and performance. Because of these factors, past performance may not be a reliable indicator of future results. Set forth below and elsewhere in this document are descriptions of the risks and uncertainties that could cause our actual results to differ materially from the results contemplated by the forward-looking statements contained in this document. The most significant factors affecting our business and operations include the following:

Our exposure to pending and future asbestos claims and related liabilities, assets, and cash flows is subject to significant uncertainties.

Subsidiaries of ITT, ITT LLC (f/k/a ITT Corporation) and Goulds Pumps LLC (f/k/a Goulds Pumps, Inc.), have been sued, along with many other companies, in numerous lawsuits in which the plaintiffs claim damages for personal injury arising from exposure to asbestos from component parts of certain products sold or distributed by various defendants, including certain ITT subsidiaries. We expect they will be sued in similar actions in the future. As such, we record an estimated liability related to pending claims and similar claims that we estimate will be filed over the next 10 years based on a number of key assumptions, including the likelihood of suits being filed, claim acceptance rates, disease type, settlement values and defense costs. These assumptions are derived from ITT's recent experience and reflect our expectations about future claim activities. Although it is probable that the Company will incur additional costs for asbestos claims filed beyond the next 10 years, we do not believe that there is a reasonable basis for estimating those costs at this time.

In addition, we record an asset that represents our best estimate of probable recoveries from our insurers for the estimated asbestos liabilities. There are significant assumptions made in developing estimates of asbestos-related recoveries, such as policy triggers, policy or contract interpretation, the methodology for allocating claims to policies, and the continued solvency of the Company's insurers. All of our primary insurance policies are exhausted, which may result in higher net cash outflows until excess carriers begin accepting claims for reimbursement. Performance by our insurers could differ from the assumptions underlying the recognized asset and could result in lower collections of receivables than are currently expected to reduce the Company's asbestos costs. In addition, insurance recoveries may vary significantly from period to period, and the recovery rate is expected to decline over time due to gaps in our insurance coverage, reflecting uninsured periods, the insolvency of certain insurers, prior settlements with our insurers and our expectation that certain insurance policies will exhaust within the next 10 years.

Due to these uncertainties, as well as our inability to reasonably estimate any additional asbestos liability for claims that may be filed beyond the next 10 years, it is difficult to predict the ultimate cost, including potential recoveries, of resolving pending and unasserted asbestos claims. Changes in estimates related to these uncertainties may result in increases or decreases to the net asbestos liability, particularly if the quality, number of claims, or settlement or defense costs change significantly, if there are significant developments in the trend of case law or court procedures, or if

legislation or another alternative solution is implemented. The resolution of asbestos claims may take many years. We believe it is possible that the future events affecting the key factors and other variables within the next 10 years, as well as the cost of asbestos claims filed beyond the next 10 years, net of expected recoveries, could have a material adverse effect on our financial condition, results of operations, or cash flows in any given period.

Our operating results and our ability to maintain liquidity or procure capital may be adversely affected by unfavorable or uncertain global economic and capital market conditions.

We have experienced and expect to continue to experience volatility in revenues, operating results and profitability due to uncertain global economic and capital market conditions. We have undertaken measures to reduce the impact of this volatility through diversification of markets and expansion of the geographic regions in which we operate. The end markets we serve include automotive, aerospace, oil and gas, industrial, mining, chemical, and defense, each of which is impacted by specific industry and general economic cycles. Important factors impacting our businesses include, but are not limited to, the overall strength of the global economy and our customers' confidence in local and global macroeconomic conditions, industrial spending, tax rates, interest rates, the availability of commercial financing, and regulations and tariffs in the jurisdictions in which we operate. Instability in the global economic and market conditions, or economic conditions in key markets or regions deteriorate, we may experience material impacts on our financial statements.

We closely monitor the credit-worthiness of our insurers and customers and evaluate their ability to meet their obligations. However, adverse changes to financial conditions could jeopardize these counterparty obligations. A tightening of credit markets may reduce funds available to our customers to pay for our products and services for a prolonged and perhaps unknown period of time. Restrictive credit markets may also result in customers extending terms for payment and may result in our having higher customer receivables with increased risk of default.

Should market conditions deteriorate, this may also adversely affect our ability to manage inventory levels and maintain current levels of profitability. If, for any reason, we lose access to commercial paper markets or our currently available lines of credit, or if we are required to raise additional capital, we may be unable to do so, or we may be able to do so only on unfavorable terms. Deteriorating market conditions could also indicate an impairment in the value of our goodwill and intangible assets in one or more of our reporting units which would require us to recognize a non-cash charge to our Statement of Operations. We test both goodwill and intangible assets for impairment on an annual basis and whenever events or changes in circumstances indicate the carrying value of an asset may not be recoverable.

We are subject to inherent business risks due to our operations and sales outside the U.S. and in emerging markets.

Our international operations, including U.S. exports, comprise a growing portion of our operations and are a strategic focus for continued future growth. Our strategy calls for increasing sales in overseas markets, including emerging markets such as Mexico, South America, China, Russia, and the Middle East. In 2019, 68% of our total sales were to customers operating outside of the United States. Our sales from international operations and export sales are subject to varying degrees of risks inherent in doing business outside of the United States. These risks include the following, some of which could be impacted by changes in international trade agreements or the imposition or increase of tariffs or trade sanctions between the United States and other countries:

- · possibility of unfavorable circumstances arising from host country laws or regulations;
- · restrictions, regulations, or tax liabilities on currency repatriation;
- · potential negative consequences from changes to taxation policies;
- the disruption of operations from labor and political disturbances;
- · our ability to hire and maintain qualified staff in these regions; and
- changes in tariffs and trade barriers, sanctioned countries and individuals, and import and export licensing requirements.

Our operations in emerging markets could involve additional uncertainties, including risks that governments may impose limitations on our ability to repatriate funds, impose or increase withholding or other taxes on remittances and other payments to us, seek to nationalize our assets, or impose or increase investment barriers or other restrictions that may adversely affect our business. In addition, emerging markets pose other uncertainties, including challenges to our ability to protect our intellectual property, pressure on the pricing of our products, and risks of political instability.

The cost of compliance with increasingly complex and often conflicting regulations worldwide can also impair our flexibility in modifying product, marketing, pricing, or other strategies for growing our businesses, as well as our ability to improve productivity and maintain acceptable profit margins.

Significant movements in foreign currency exchange rates may adversely affect our financial statements.

A significant portion of our sales are to customers operating outside the U.S.; therefore, we are exposed to fluctuations in foreign currency exchange rates which could adversely affect our results of operations. The primary currencies to which we have exposure are the Euro, Mexican peso, Polish zloty, South Korean won, Chinese renminbi, and the Czech koruna. From time to time, we may enter into derivative contracts to hedge some of these foreign currency exposures. However, our hedging strategy may fail to reduce our exposure or could result in unfavorable impact to our operating results.

As we continue to grow our business internationally, our operating results could be affected by the relative strength or weakness of global economies and the impact of foreign currency exchange rate fluctuations. Any significant change in the value of currencies of the countries in which we do business relative to the value of the U.S. dollar could affect our ability to sell products competitively and control our cost structure, which could have a material adverse effect on our financial statements. Accordingly, fluctuations in foreign currency exchange rates may also impact our results when the currency of a transaction differs from the functional currency of our operating unit, or when financial statements in the functional currency of non-U.S. operating units are translated into U.S. dollars.

Recently announced tariffs remain uncertain and may continue to have a negative impact to our business.

Beginning in 2018, the U.S. government undertook a series of actions to increase tariffs on certain goods imported into the U.S., including steel and aluminum, and in response governments in Europe and China have imposed retaliatory tariffs on various goods, including on certain goods we sell into those countries. These tariffs have negatively impacted the price of certain parts and materials we purchase to be included in the finished products we sell in the U.S., as well as the cost of the final product when re-exported. Since announced, we have been managing these impacts and will continue attempting to mitigate the impact of these tariffs by lowering input costs through pricing and supply chain actions, efficient utilization of our global manufacturing footprint, and supplier and customer negotiations and diversification strategies. However, we expect that continued trade disputes between the U.S. and Europe, China, and other countries, and other governmental actions related to tariffs or international trade agreements or policies may continue to adversely impact demand for our products, our costs, customers and suppliers.

Our business is impacted by our customers' levels of capital investment and maintenance expenditures, particularly in the oil and gas, chemical, and mining markets.

Demand for certain industrial products and services depends on the level of capital investment and planned maintenance expenditures of our customers. Our customers' levels of capital expenditures depend, in turn, on general economic conditions, availability of credit, economic conditions within their respective industries and expectations of future market behavior. Additionally, volatility in commodity prices can negatively affect the level of these activities and can result in postponement of capital spending decisions or the delay or cancellation of existing orders. The ability of our customers to finance capital investment and maintenance may also be affected by factors independent of the conditions in their industries, such as the condition of global credit and capital markets.

The businesses of many of our customers, particularly those in the oil and gas, chemical, and mining industries, which represent approximately 10%, 9%, and 3%, respectively, of our 2019 revenue, are to varying degrees cyclical and have experienced, and may in the future experience, periodic downturns of varying severity. Our customers in these industries, particularly those whose demand for our products and services is primarily profit-driven, historically have tended to delay large capital projects, including expensive maintenance and upgrades, during economic downturns. Additionally, fluctuating energy demand forecasts and commodity pricing and other macroeconomic factors may cause our customers to be more conservative in their capital planning, which could reduce demand for our products and services. Reduced demand for our products and services could result in the delay or cancellation of existing orders or lead to excess manufacturing capacity, which unfavorably impacts our absorption of fixed manufacturing costs. This reduced demand may also erode average selling prices in our industry. Any of these results could adversely affect our business and financial results.

Additionally, some of our industrial products customers may choose to postpone capital investment and maintenance, even during favorable conditions in their industries or markets, which could lead to the delay or cancellation of orders. Despite these favorable conditions, the general health of global credit and capital markets and our customers' ability to access such markets may significantly impact investments in large capital projects, as well as necessary maintenance and upgrades. In addition, the liquidity and financial position of our customers, which are

typically directly linked to the economies in which they operate, could impact capital investment decisions and their ability to pay in full and/or on a timely basis. Any of these factors, whether individually or in the aggregate, could have a material adverse effect on our customers and, in turn, our business and financial results.

Failure to compete successfully in our markets could adversely affect our business.

We provide products and services to competitive markets. We believe the principal points of competition in our markets are product performance, reliability and innovation, application expertise, brand reputation, energy efficiency, product life cycle cost, timeliness of delivery, proximity of service centers, effectiveness of distribution channels and price.

Maintaining and improving our competitive position will require continued investment by us in manufacturing, research and development, engineering, marketing, customer service and support, and our distribution networks. We may not be successful in maintaining our competitive position. Our competitors may develop products that are superior to our products, or may develop more efficient or effective methods of providing products and services or may adapt more quickly than we do to new technologies or evolving customer requirements. Pricing pressures also could cause us to adjust the prices of certain products to stay competitive. We may not be able to compete successfully with existing or new competitors.

Our operating costs are subject to fluctuations, particularly due to changes in commodity prices, raw materials, energy and related utilities, freight, tariffs, and cost of labor. In order to remain competitive, we may not be able to recoup all or a portion of these higher costs from our customers through product price increases. Further, our ability to realize financial benefits from efficiency initiatives may not be able to mitigate these manufacturing and operating cost increases and, as a result, could negatively impact our profitability.

Quality problems with our manufacturing processes or finished goods could harm our reputation for producing high-quality products and erode our competitive advantage, sales, and market share.

We manufacture key components that are integral to the operation of systems and manufacturing processes in the automotive, aerospace, rail, oil and gas, industrial, mining, chemical, and defense markets. The reliability and performance of our products are critically important to our customers and the users of their products. Accordingly, quality is extremely important to us and our customers due to the potentially costly consequences of product failure. Our quality certifications, including products manufactured to military specifications, are critical to the marketing success of our goods and services. If we fail to meet these standards, our reputation could be damaged, we could lose customers or the ability to sell certain products, and our revenue and results of operations could be materially adversely affected. Our success in part depends on our ability to manufacture to exact tolerances precision-engineered components, subassemblies, and finished devices from multiple materials. If our components fail to meet these standards or fail to adapt to evolving standards, our reputation as a manufacturer of high-quality components will be harmed, our competitive advantage could be damaged, and we could lose customers, market share or our ability to sell certain products.

We are subject to risks related to government contracting, including changes in levels of government spending and regulatory and contractual requirements applicable to sales to the U.S. government.

Our Connect & Control Technologies and Motion Technologies segments derive a portion of their revenue from sales to U.S. government customers and higher tier contractors who sell to the U.S. government. The government's expenditures are subject to political and budgetary fluctuations and constraints, which may result in significant unexpected changes in levels of demand for our products. In addition, the award, administration and performance of government contracts is subject to regulatory and contractual requirements that differ significantly from the terms and conditions that apply to contracts with our non-governmental customers. We have in the past and may in the future be subject to audits and investigations to evaluate our compliance with these requirements. If we are found to have failed to comply with requirements applicable to government contractors, we may be subject to various actions, including but not limited to fines or penalties, reductions in the value of our government contracts. Failure to comply with applicable requirements also could harm our reputation and our ability to compete for future government contracts or sell equivalent commercial products. Any of these outcomes could have a material adverse effect on our business, results of operations and financial condition.

Our business could be adversely affected by raw material price volatility and the inability of suppliers to meet quality and delivery requirements.

Our business relies on third-party suppliers for raw materials, components and contract manufacturing services to produce our products. The supply of raw materials to the Company and to its component parts suppliers could be interrupted for a variety of reasons, including availability and pricing. Commodity prices and the prices for other raw materials necessary for production have fluctuated significantly in the past, impacting our operating results and significant future increases in commodity prices could adversely affect our results of operations and profit margins. Due to pricing pressure or other factors, we may not be able to pass along increased raw material and component prices to our customers in the form of price increases or our ability to do so could be delayed. Consequently, our results of operations and financial condition may be adversely affected.

For most of our products, we have existing alternate sources of supply, or the required materials are readily available. In limited instances we depend on a single source of supply, manufacturing or assembly or participate in commodity markets that may be subject to a limited number of suppliers. While we believe we could obtain and qualify alternative sources for most sole and limited source supplier materials, if necessary, the transition to an alternative source could be complex, costly, and protracted, especially if the change requires us to redesign our systems. Delays in obtaining supplies may result from a number of factors affecting our suppliers, including production interruptions at suppliers, capacity constraints, labor disputes, the impaired financial condition of a particular supplier, the ability of suppliers to meet regulatory requirements and suppliers' allocations to other purchasers. Any delay in our suppliers' abilities to provide us with sufficient quality or flow of materials or any supplier price increases, or decreased availability of raw materials or commodities could impair our ability to deliver products to our customers and, accordingly, could have an adverse effect on our business, results of operations and financial position.

If we fail to manage the distribution of our products and services effectively, our revenue, gross margin and profitability could suffer. A significant portion of our revenue is derived from a single customer.

We use a variety of sales channels to sell our products and services. Successfully managing these sales channels is a complex process as we sell a broad mix of products through a network of approximately 700 distributors, agents, and value-added resellers. Moreover, since each distribution method has distinct risks and profit margins, our failure to implement the most advantageous balance in the delivery model for our products and services could adversely affect our revenue and profit margins. In addition, changes to the sales channels could introduce additional complexity to our sales and inventory management processes and could cause disruptions to customer service or create channel conflicts.

Further, we must manage inventory effectively, particularly with respect to sales to distributors, which involves forecasting demand and potential pricing issues. Distributors may increase orders during periods of product shortages, cancel orders if their inventory is too high or delay orders in anticipation of new products. Our reliance on indirect distribution methods may reduce visibility to end-customer demand, generating a time lag to the market trend with potential negative impacts on inventory levels and strategic decisions, including pricing, capital deployment, and operational decisions.

Our financial results could be adversely affected by the loss of or delays caused by a distributor, the loss or deterioration of some distribution or reseller arrangements, channel conflicts, including the consolidation of third-party distributors, or if the financial conditions of our channel partners were to weaken. Some of our distributors may have insufficient financial resources and may not be able to withstand changes in business conditions, including economic weakness, leading to a slowness or difficulty in the cash collection process.

Sales to Continental, ITT's largest customer, were approximately 10% of our total revenue in 2019. A significant portion of the OEM revenue, typically about half, is derived at the automakers' direction to use an ITT brake pad in Continental's braking systems (calipers), generally through supply agreements signed directly with automakers. The remaining Continental revenue is generated from a long term aftermarket agreement. The loss of this customer could have a material adverse effect on our business, results of operations, or financial condition.

Changes in our effective tax rates as a result of changes in the realizability of our deferred tax assets, the geographic mix of earnings, tax examinations or disputes, tax authority rulings, or changes in the tax laws, may adversely affect our financial results.

The Company is subject to taxes in the U.S. and in various foreign jurisdictions. We exercise significant judgment in calculating our provision for income taxes and other tax liabilities. In the ordinary course of our business, there are many transactions and calculations where the ultimate tax determination is uncertain. Furthermore, changes in domestic or foreign tax laws and regulations, or their interpretation, could result in higher or lower tax rates assessed or changes in the taxability of certain income or the deductibility of certain expenses, thereby affecting our tax expense and profitability.

Any significant increase in our future effective tax rates could reduce net income in future periods. Given the global nature of our business, a number of factors may increase our future effective tax rates, including:

- changes in the geographic mix of our profits among jurisdictions with differing statutory income tax rates;
- sustainability of historical income tax rates in the jurisdictions in which we conduct business;
- · changes in tax laws applicable to us;
- · expiration, renewal, or application of tax holidays;
- · the resolution of issues arising from tax audits with various tax authorities; or
- changes in the valuation of our deferred tax assets, deferred tax liabilities, and deferred tax asset valuation allowances.

The amount of income taxes and other taxes we have paid are subject to ongoing audits by U.S. federal, state and local tax authorities and by non-U.S. authorities. If these audits result in assessments different from amounts paid or reserved, future financial results may include unfavorable tax adjustments. We are currently under routine examination by the U.S. Internal Revenue Service and other tax authorities, and we may be subject to additional examinations in the future. The tax authorities may disagree with our tax treatment of certain material items and thereby increase our tax liability. Failure to sustain our position in these matters could result in a material adverse effect on our financial statements.

Failure to retain our existing senior management, engineering and other key personnel or the inability to attract and retain new qualified personnel could negatively impact our ability to operate or grow our business.

Our success will continue to depend to a significant extent on our ability to retain or attract a significant number of employees in senior management and engineering and other key personnel. The ability to attract or retain employees will depend on our ability to offer competitive compensation, training and cultural benefits. We will need to continue to develop a roster of qualified talent to support business growth and replace departing employees. A failure to retain or attract highly skilled personnel could adversely affect our operating results or our ability to operate or grow our business.

Our inability to protect our own intellectual property rights, or unintentionally violating the intellectual property rights of others could negatively impact our business and financial results.

Obtaining, maintaining and enforcing our proprietary rights is critical to the success of our business. For certain products and manufacturing processes, we rely on patents, trademarks, trade secrets, non-disclosure agreements and other contracts to protect these rights. These contracts may be breached, or may not prevent competitors from independently developing or selling similar products, and therefore could have a negative impact on our business. In addition, during the normal course of business, we could unintentionally infringe or violate the proprietary rights of others. Intellectual property litigation could be time consuming for management, and could result in significant legal expense to either pursue claims against others, or to defend ourselves. If we are unable to protect our patents, trademarks, or other proprietary rights, or if we infringe or violate the rights of others, our business, results of operations, or financial condition could be materially adversely affected.

A material business interruption, particularly at one of our manufacturing facilities, could negatively impact our ability to generate sales and meet customer demand.

If operations at one of our manufacturing facilities were to be disrupted as a result of an equipment failure, natural disaster, power outage, fire, explosion, act of terrorism, war, IT system failure, cyber-attack, adverse weather conditions, labor disputes, epidemic illness (including without limitation, 2019 novel coronavirus), relocation of production location, or any other reason, our financial performance could be adversely affected as a result of our inability to meet customer demand for our products. We have business continuity plans in place to mitigate the effects of such interruptions, but these plans may not be sufficient to resolve the issues in a timely manner. A significant interruption in production capability could also require us to make substantial payments due to non-performance, which could negatively affect

our results of operations. We also have insurance for certain covered losses which we believe to be adequate to offset a significant portion of the costs for reconstruction of facilities and equipment, as well as certain financial losses resulting from any production interruption or shutdown. However, any recovery under our insurance policies would be subject to deductibles and, depending on the coverage, may not offset the lost revenues or increased expenses that may be experienced during the disruption of operations.

Recently, the outbreak of the 2019 novel coronavirus in China has caused temporary restrictions on travel and closures of plants and offices owned by ITT, our suppliers and customers, and other businesses in China while the country attempts to control the virus. At this time, it is unknown when the virus will be fully contained and therefore we may be negatively impacted by future closures, whether mandated by the government or at the discretion of senior management, or the virus may spread to our workforce causing a material business interruption.

Cyber security breaches could adversely affect our business and results of operations.

The efficient operation of our business is dependent on information technology systems, some of which are managed by third parties. In the ordinary course of business, we collect and store confidential information, including proprietary business information belonging to us, our customers, suppliers, business partners and other third parties and personally identifiable information of our employees. We have taken many steps to protect our information systems, including the installation of protective systems that monitor, test, and backup our systems, as well as annual employee training. For third parties that manage our confidential data on cloud-based servers, we have a robust process to ensure the third party has appropriate systems and controls in place to manage potential cyber threats.

Our information technology systems and those of third party service providers may be susceptible to damage, disruptions or shutdowns due to power outages, hardware failures, telecommunication failures, cyber-attacks, and user errors. If we experience a disruption in our information technology systems, it could result in the loss of sales and customers and significant incremental costs, which could materially adversely affect our business. Moreover, even the most well-protected information systems are vulnerable to internal and external security breaches including, but not limited to, those by computer hackers and cyber terrorists utilizing techniques such as phishing, ransomware or denial of service attacks. In addition, as a provider of products and services to government and commercial customers, and particularly as a government contractor, we are subject to a heightened risk of security breaches caused by computer viruses, illegal break-ins or hacking, sabotage, or acts of vandalism, including by foreign governments and cyber terrorists. Furthermore, information technology security threats are increasing in sophistication, intensity, and frequency. While we actively manage the risks to our information systems that are within our control, we can provide no assurance that our actions or those of our third party service providers will be successful in eliminating or mitigating risks to our systems, networks or data. Accordingly, a security breach may occur, including breaches that we may be unable to detect. The unavailability of our information systems, the failure of these systems to perform as anticipated for any reason or any significant breach of security could cause significant disruption to our business or could result in decreased performance and increased costs, causing an adverse effect on our reputation, business, financial condition and results of operations. If we are unable to protect sensitive information, our customers or governmental authorities could question the adequacy of our security processes and procedures and our compliance with evolving government cyber security requirements for government contractors, potentially causing us to lose business. A breach could also result in the loss of our intellectual property, potentially impacting our long-term capability to compete for sales of affected products. In addition, a breach of security of our information systems could result in litigation, regulatory action and potential liability, as well as increased costs to implement further information security measures. If we are unable to prevent, detect or adequately respond to cyber security breaches, our operations could be disrupted and our business could be materially and adversely affected.

Changes in laws relating to the use and transfer of personal and other information could adversely affect our business and results of operations.

The processing and storage of certain information is increasingly subject to privacy and data security regulations, and many such regulations are country-specific. The interpretation and application of data protection laws in the U.S., Europe, and elsewhere are uncertain, evolving and may be inconsistent among jurisdictions. Compliance with these (including California's Consumer PrivacyAct, which became effective on January 1, 2020) various laws may be onerous and require us to incur substantial costs or to change our business practices in a manner that adversely affects our business, while failure to comply with such laws may subject us to substantial penalties. For example, the European Union's General Data Protection Regulation (GDPR), which became effective in May 2018, imposed significant new requirements on how we collect, process and transfer personal data, as well as significant fines for non-compliance. The costs of compliance with the GDPR and the potential for fines and other related costs in the event of a breach of the GDPR or other information security or privacy requirements may have a material adverse effect on our financial results.

Portfolio management strategies for growth, including cost-saving initiatives, may not meet expectations.

We regularly review our portfolio of businesses and pursue growth through the acquisition of other companies, assets and product lines that either complement or expand our existing businesses. Although we conduct what we believe to be a prudent level of investigation regarding the operating and financial condition of the businesses we purchase, a level of risk remains regarding the actual operating condition of these businesses. Until we actually assume operating control of these businesses and their operations, we may not be able to ascertain the actual value or understand the potential liabilities of, or challenges facing, the acquired businesses and their operations. Acquisitions involve a number of risks and present financial, managerial and operational challenges that could have a material adverse effect on our reputation, financial results, and business, including that an acquired business could underperform relative to our expectations, the failure to realize expected synergies, difficulty in the integration of technology, operations, personnel and financial and other systems, the possibility that we have acquired substantial undisclosed liabilities, potentially insufficient internal controls over financial activities or financial reporting at an acquired company that could impact us on a consolidated basis, diversion of management attention from other businesses, loss of key employees of the acquired businesses, increased capital requirements and customer dissatisfaction.

Our portfolio reviews also include the potential for cost-saving initiatives through restructuring and other initiatives. We strive for and expect to achieve cost savings in connection with certain initiatives, including: (i) manufacturing process and supply chain rationalization; (ii) streamlining redundant administrative overhead and support activities; and (iii) restructuring and realignment actions. Cost savings expectations are inherently uncertain and, therefore, we cannot provide assurance that we will achieve any expected, or any actual cost savings. Our restructuring activities may place substantial demands on our management, which could lead to the diversion of management's attention from other business priorities and result in a reduced customer focus. In addition, restructuring activities may result in a loss of knowledge or expertise or could negatively impact employee performance and retention. If any of these outcomes occur, it could have a material adverse impact on our business or financial results.

Our business could be adversely affected by the inability of suppliers to provide us with certifications relating to conflict minerals.

Since our supply chain is complex, ultimately we may not be able to sufficiently discover the origin of the conflict minerals (generally defined as the minerals tin, tantalum, titanium and gold which have been extracted from the Democratic Republic of the Congo or adjoining countries) used in our products through the due diligence procedures that we implement, which may adversely affect our reputation with our customers, shareholders, and other stakeholders. We may also face difficulties in satisfying customers who require that all of our products are certified as conflict mineral free. If we are not able to meet such requirements, customers may choose not to purchase our products, which could adversely affect our sales and the value of portions of our inventory. Further, there may be only a limited number of suppliers offering conflict free minerals and, as a result, we cannot be sure that we will be able to obtain metals, if necessary, from such suppliers in sufficient quantities or at competitive prices. Any one or a combination of these various factors could harm our business, reduce market demand for our products, and adversely affect our financial results.

Changes in environmental laws or regulations, the discovery of previously unknown or more extensive contamination, or the failure of a potentially responsible party to perform may adversely affect our financial results.

We are subject to a variety of federal, state, local and foreign laws, rules and regulations related to the use, storage, handling, discharge or disposal of certain toxic, volatile or otherwise hazardous chemicals, gases and other substances used in manufacturing our products. Some of these laws in the United States include the Federal Clean Water Act, Clean Air Act, Resource Conservation and Recovery Act, Comprehensive Environmental Response, Compensation, and Liability Act, Toxic Substances Control Act, and similar state and foreign statutes and regulations. In the European Union (EU), we are subject to the EU regulation on Registration, Evaluation, Authorization and Restriction of Chemicals. Compliance with these laws and regulations could require us to incur substantial expenses. Environmental laws and regulations, and may require the installation of costly pollution control equipment or operational changes to limit emissions or discharges. In addition, the discovery of previously unknown or more extensive contamination at a site which the Company previously operated or currently operates could suddenly subject the Company to costly remediation efforts. We also could be affected by changes in environmental laws or regulations, including, for example, those imposed in response to vapor intrusion or climate change concerns.

Developments such as the adoption of new environmental laws and regulations, violations by us of such laws and regulations, discovery of previously unknown or more extensive contamination, litigation involving environmental impacts, the adequacy of insurance policies, our inability to recover costs associated with any such developments, or

financial insolvency of other potentially responsible parties could have a material adverse effect on our business, financial condition and results of operations.

Failure to comply with the U.S. Foreign Corrupt Practices Act or other applicable anti-corruption legislation, as well as export controls and trade sanctions, could result in fines or criminal penalties.

We operate in a number of countries throughout the world, including countries known to have a reputation for corruption. We are committed to doing business in accordance with applicable anti-corruption laws. However, we cannot provide assurance that our internal controls will always protect us from reckless or criminal acts committed by our employees, agents or business partners that would violate U.S. and/or applicable non-U.S. laws, including antibribery, competition, trade sanctions and regulation, and other laws including but not limited to, the U.S. Foreign Corrupt Practices Act of 1977 and the U.K. Bribery Act of 2010, as well as trade sanctions administered by the Office of Foreign Assets Control, the U.S. Department of State and the U.S. Department of Commerce. Any such violation could result in substantial fines, sanctions, civil and/or criminal penalties, suspension or debarment from government contracts, or curtailment of operations in certain jurisdictions, and might adversely affect our business, financial condition or results of operations or financial position. Furthermore, detecting, investigating, and resolving actual or alleged violations is expensive and can consume significant time and attention of our senior management. Even the allegation or appearance of our employees, agents or business partners acting improperly or illegally could damage our reputation and result in significant expenditures in investigating and responding to such actions.

We are subject to laws, regulations and potential liability relating to claims, complaints and proceedings, including those related to product liability and other matters.

Our business exposes us to potential product liability risks that are inherent in the design, manufacture, and marketing of products for the markets we serve. In addition, many of the devices we manufacture and sell are critical components designed to be used in harsh environments for long periods of time where the cost of failure is high. Component failures, manufacturing defects, design flaws, or inadequate disclosure of product-related risks or product-related information could result in an unsafe condition or injury to, or death of, an end-user of our products. The occurrence of such a problem could result in product liability claims or a recall of, or safety alert relating to, one or more of our products which could ultimately result, in certain cases, in the removal of such products from the marketplace and claims regarding costs associated therewith. Product liability claims or product recalls in the future, regardless of their ultimate outcome, could have a material adverse effect on our business and reputation and on our ability to attract and retain customers for our products.

We are subject to various laws, ordinances, regulations and other requirements of government authorities in the U.S. and in foreign countries. Any violations or failure to comply with securities laws, trade or tax rules or similar regulations could create a substantial liability for us, and also could cause harm to our reputation. Changes in laws, ordinances, regulations or other government policies, the nature, timing, and effect of which are uncertain, may significantly increase our expenses and liabilities.

From time to time we are involved in legal proceedings that are incidental to the operation of our businesses. Some of these proceedings allege damages relating to personal injury claims, employment and employee benefit matters and commercial or contractual disputes, sometimes related to acquisitions or divestitures. Additionally, we may become subject to significant claims of which we are currently unaware or the claims of which we are aware may result in our incurring a significantly greater liability than we anticipate or can estimate.

Past divestitures and spin-offs may expose us to potential liabilities.

We have divested a number of businesses, including as part of spin-offs in 1995 and 2011. With respect to some of these former businesses, we have contractually agreed to indemnify the counterparties against, or otherwise retain, certain liabilities, including, for example certain lawsuits, tax liabilities, product liability claims, asbestos claims, or environmental matters. Even without ongoing contractual indemnification obligations, we could be exposed to liabilities arising out of such divestitures. In addition, the counterparties to those divestitures may have agreed to indemnify us or assume certain liabilities relating to those divestitures. Similarly, there can be no assurance that the indemnity or assumption of liability by the counterparties will be sufficient to protect us against the full amount of these liabilities, or that a counterparty will be able to fully satisfy its obligations. Third parties also could seek to hold us responsible for any of the liabilities that a counterparty agreed to assume. Even if we ultimately succeed in recovering any amounts for which we were initially held liable, we may be temporarily required to bear these losses ourselves.

Anti-takeover provisions in our organizational documents and Indiana law could delay or prevent a change in control.

Certain provisions of our articles of incorporation and by-laws may delay or prevent a merger or acquisition that a shareholder may consider favorable. For example, the articles of incorporation authorize our Board of Directors to issue one or more series of preferred stock. In addition, the articles of incorporation and by-laws, among other things, do not permit action by written consent of the shareholders. These provisions may also discourage acquisition proposals or delay or prevent a change in control, which could harm our stock price. Indiana law also imposes some restrictions on mergers and other business combinations between any holder of 10% or more of our outstanding common stock and us as well as certain restrictions on the voting rights of "control shares" of an "issuing public corporation."

ITEM 1B. UNRESOLVED STAFF COMMENTS

None.

ITEM 2. PROPERTIES

We own or lease over 100 manufacturing plants, warehouses, service centers, and sales and administrative offices to support our operations. These properties are located in various regions including North America, Europe, Asia, South America and the Middle East, and are considered to be in good condition with sufficient capacity to accommodate the Company's needs. The following table summarizes the number and area (in thousands of square feet) of our material properties by region and business segment as of December 31, 2019. Our material properties primarily consist of manufacturing locations and are defined as those containing 25,000 square feet or more, which represents over 90% of the total area of our properties.

		otion nologies		ıstrial cess	Conn Cor Techno	ntrol	Total	
Location	#	Area	#	Area	#	Area	#	Area
Owned:								
North America	4	814	6	1,198	3	515	13	2,527
Europe	9	1,651	1	357	1	231	11	2,239
Asia	_	_	1	671	1	34	2	705
South America	_	_	1	43	_	_	1	43
	13	2,465	9	2,269	5	780	27	5,514
Leased:								
North America	2	86	9	396	4	336	15	818
Europe	6	572	2	60	1	53	9	685
Asia	1	342	4	267	1	256	6	865
South America	_	_	3	110	_	_	3	110
	9	1,000	18	833	6	645	33	2,478

Additionally, our corporate headquarters is located in White Plains, New York and is approximately 50,000 square feet.

ITEM 3. LEGAL PROCEEDINGS

From time to time, we are involved in litigation, claims, government inquiries, investigations, and proceedings, including but not limited to those relating to environmental exposures, intellectual property matters, personal injury claims, regulatory matters, commercial and government contract issues, employment and employee benefit matters, commercial or contractual disputes, and securities matters.

Asbestos Proceedings

Our subsidiaries, ITT LLC and Goulds Pumps LLC, have been joined as defendants with numerous other companies in product liability lawsuits alleging personal injury due to asbestos exposure. These claims allege that certain of their products sold prior to 1985 contained a part manufactured by a third party (e.g., a gasket) which contained asbestos. To the extent these third-party parts may have contained asbestos, it was encapsulated in the gasket (or other) material and was non-friable. Frequently, the plaintiffs are unable to identify any ITT LLC or Goulds Pumps LLC products as a source of asbestos exposure. In addition, many claims pending against the Company's subsidiaries have been placed on inactive dockets because the plaintiff cannot demonstrate a compensable loss. Our experience to date is that a substantial portion of resolved claims have been dismissed without payment by the Company's subsidiaries.

We have recorded a liability for pending asbestos claims and asbestos claims estimated to be filed over the next 10 years. While it is probable that we will incur additional costs for future claims to be filed against the Company, a liability for potential future claims beyond the next 10 years is not reasonably estimable due to the uncertainties and variables inherent in the long-term projection of the Company's asbestos exposures and potential recoveries. As of December 31, 2019, we have recorded an undiscounted asbestos-related liability for pending claims and unasserted claims estimated to be filed over the next 10 years of \$817.6, which includes expected legal fees, and we have recorded an associated asset of \$386.8, which represents estimated recoveries from insurers, resulting in a net exposure of \$430.8. See information provided in Note 20, Commitments and Contingencies, to the Consolidated Financial Statements for further information.

Environmental

In the ordinary course of business, we are subject to federal, state, local, and foreign environmental laws and regulations. We are responsible, or are alleged to be responsible, for ongoing environmental investigation and site remediation. These sites are in various stages of investigation or remediation and in many of these proceedings our liability is considered de minimis. We have received notification from the U.S. Environmental Protection Agency, and from similar state and foreign environmental agencies, that a number of sites formerly or currently owned or operated by ITT, and other properties or water supplies that may be or have been impacted from those operations, contain disposed or recycled materials or wastes and require environmental investigation or remediation. These sites include instances where we have been identified as a potentially responsible party under applicable environmental laws and regulations. See information provided in Note 20, Commitments and Contingencies, to the Consolidated Financial Statements for further information.

ITEM 4. MINE SAFETY DISCLOSURES

Not applicable.

EXECUTIVE OFFICERS OF THE REGISTRANT

Name	Age	Current Title
Luca Savi	54	Chief Executive Officer and President
Farrokh Batliwala	44	Senior Vice President and President, Connect & Control Technologies
John Capela	40	Vice President and Chief Accounting Officer
Ryan F. Flynn	48	Senior Vice President and President, Asia Pacific
Carlo Ghirardo	49	Senior Vice President and President, Motion Technologies
Mary Elizabeth Gustafsson	60	Senior Vice President, General Counsel and Corporate Secretary and Chief Compliance Officer
George Hanna	68	Senior Vice President and President, Industrial Process
Maurine C. Lembesis	53	Senior Vice President, Chief Human Resources Officer
Thomas M. Scalera	48	Executive Vice President and Chief Financial Officer

The current executive officers of the Company, as of February 1, 2020, are listed below.

- *Luca Savi* was appointed Chief Executive Officer, President and a director of the Company in January 2019. He previously served as President and Chief Operating Officer of the Company from August 2018 to December 2018 and as Executive Vice President and Chief Operating Officer from January 2017 to August 2018. Prior to that, he served as Executive Vice President, Motion Technologies from February 2016 to January 2017 and as Senior Vice President and President, Motion Technologies from November 2011 to February 2016. Prior to joining the Company, Mr. Savi served as Chief Operating Officer, Comau Body Welding at Comau, a subsidiary of the Fiat Group responsible for producing and serving advanced manufacturing systems, from 2009 to 2011 and as Chief Executive Officer, Comau North America from 2007 to 2009. Mr. Savi previously held leadership roles at Honeywell International, Royal Dutch Shell and technical roles at Ferruzzi-Montedison Group.
- *Farrokh Batliwala* has served as our Senior Vice President and President, Connect and Control Technologies since May 2017. Prior to the combination of Control Technologies and Interconnect Solutions, Mr. Batliwala served as the Senior Vice President of Control Technologies and Interconnect Solutions from November 2016 to May 2017 and previously as Senior Vice President and President, Control Technologies from October 2015 to November 2016. Prior to joining us, Mr. Batliwala served as Vice President and General Manager, Hydraulics, Power and Motion Control Division for Eaton Corporation (Eaton), a diversified global power management technology company, from 2013 to 2015. Mr. Batliwala held various other positions of increasing levels of responsibility at Eaton since 2004.
- John Capela has served as our Vice President and Chief Accounting Officer since November 2018. He previously served as Executive Vice President, Chief Accounting Officer and Corporate Controller of Toys "R" Us, Inc. from May 2018 to November 2018 and as Vice President and Corporate Controller from March 2018 to May 2018. Prior to that, Mr. Capela served as Vice President and Assistant Controller from May 2015 to March 2018 and held various other positions of increasing levels of responsibility at Toys "R" Us, Inc. Prior to joining Toys "R" Us, Inc. in March 2007, Mr. Capela spent several years with PricewaterhouseCoopers LLP in its audit practice. Mr. Capela is also a Certified Public Accountant and a Chartered Global Management Accountant.
- Ryan F. Flynn has served as Senior Vice President and President, Asia Pacific Region since January 2019. He previously served as General Manager of Motion Technologies China since 2016. Prior to joining ITT he served as Executive Vice President and Head of Business Area Equipment for Konecranes from 2013 to 2016 and held various other positions with Konecranes including the Asia-Pacific President and Director for its Port Cranes & Lifttrucks businesses in Asia from 2005 to 2013.
- *Carlo Ghirardo* has served as our Senior Vice President and President, Motion Technologies since April 2018. He previously served as President of Eaton's Vehicle Group EMEA region since 2017. He also served as Vice President and General Manager of Eaton's Engine Air Management Product Group from 2015, as Vice President and General Manager of Eaton's Valvetrain Division from 2010, as well as holding various other executive roles in global operations from 2003. Prior to that, Mr. Ghirardo held leadership positions at United Technologies Corporation and Michelin. He also acquired lean manufacturing consulting and project management experience with Galgano & Associati working in transformation projects across Europe.

- Mary Elizabeth Gustafsson has served as our Senior Vice President and General Counsel since February 2014 and as our Corporate Secretary since April 2019. She has also served as our Chief Compliance Officer since August 2014. Prior to joining us, Ms. Gustafsson served as Executive Vice President, General Counsel and Corporate Secretary of First Solar Inc. from 2009 to 2013 and from 2008 to 2009 as Vice President, General Counsel. Prior to that Ms. Gustafsson was Senior Vice President, General Counsel and Secretary of American Standard Companies, Inc. from 2005 to 2008.
- George Hanna has served as our Senior Vice President and President, Industrial Process since March 2019 and has previously served as Vice President, Industrial Process from October 2011 through March 2019. Prior to joining ITT, Mr. Hanna served as the Vice President of Sales and Marketing for Robbins & Myers Inc. from 2006 through 2011. In addition, Mr. Hanna held various business development roles of increasing responsibility with Ingersoll-Rand and Ingersoll-Dresser. Mr. Hanna has over 40 years of experience in the rotating equipment business and working in various geographical locations.
- Maurine C. Lembesis has served as our Senior Vice President and Chief Human Resources Officer since January 2019. She previously served as Vice President and Corporate Human Resources Business Partner from January 2017 to December 2018 and prior to that as Executive Director, Corporate Human Resources since June 2013. Prior to joining ITT, she held roles of increasing responsibility in Human Resources at Avon Products Inc. from 2007 to 2013, including the role of Executive Director of Human Resources. In addition, Ms. Lembesis held various other human resources roles at Capital Group Companies, Pfizer Inc. and GE Capital.
- *Thomas M. Scalera* has served as our Executive Vice President and Chief Financial Officer since February 2015 and previously as Senior Vice President, Chief Financial Officer and Strategy and IT Leader since August 2014 and prior to that as Senior Vice President and Chief Financial Officer since October 2011. He previously served as Vice President, Corporate Finance from 2010 to 2011 and Director, Investor Relations from 2008 to 2010. Prior to joining ITT in 2006, Mr. Scalera held senior financial roles with R.R. Donnelley, Dover Corp., and PricewaterhouseCoopers, LLP.

PART II

ITEM 5. MARKET FOR REGISTRANT'S COMMON EQUITY, RELATED STOCKHOLDER MATTERS AND ISSUER PURCHASES OF EQUITY SECURITIES

COMMON STOCK AND DIVIDENDS

Our common stock is reported in the consolidated transaction reporting system of the New York Stock Exchange (NYSE), the principal market in which this security is traded (under the trading symbol "ITT"). There were approximately 7,144 holders of record of our common stock on February 19, 2020.

The amount and timing of dividends payable on our common stock are within the sole discretion of our Board of Directors and will be based on, and affected by, a number of factors, including our financial position and results of operations, available cash, expected capital spending plans, prevailing business conditions, and other factors the Board deems relevant. Therefore, there can be no assurance as to what level of dividends, if any, will be paid in the future.

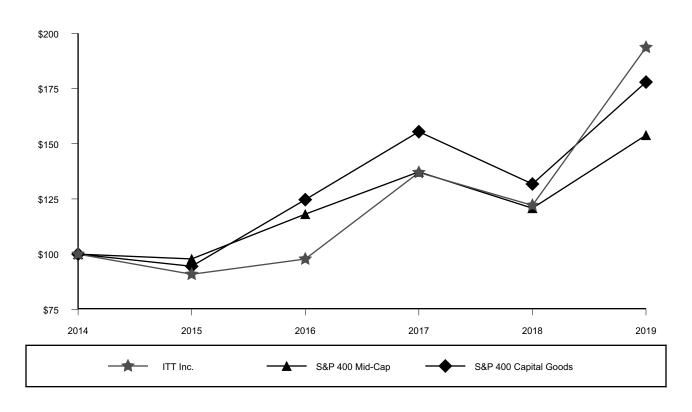
During the fiscal year ended December 31, 2019, no equity securities of the Company were sold by the Company that were not registered under the Securities Act.

ISSUER PURCHASES OF EQUITY SECURITIES

We did not make any open-market share repurchases of our common stock during the quarter ended December 31, 2019. We routinely receive shares of our common stock as payment for stock option exercises and the withholding of taxes due on stock option exercises and the vesting of restricted stock awards from stock-based compensation program participants.

PERFORMANCE GRAPH CUMULATIVE TOTAL RETURN

Based upon an initial investment on December 31, 2014 of \$100 with dividends reinvested



	12/31/2	2014	12/3	31/2015	12	/31/2016	12	/31/2017	12	/31/2018	12	/31/2019
ITT Inc.	\$ 10	00.00	\$	90.87	\$	97.78	\$	136.95	\$	122.09	\$	193.63
S&P 400 Mid-Cap	\$ 10	00.00	\$	97.82	\$	118.10	\$	137.26	\$	120.79	\$	153.87
S&P 400 Capital Goods	\$ 10	00.00	\$	94.49	\$	124.67	\$	155.45	\$	131.76	\$	177.92

This graph is not, and is not intended to be, indicative of future performance of our common stock. This graph shall not be deemed "filed" with the SEC or subject to the liabilities of Section 18 of the Exchange Act, and should not be deemed to be incorporated by reference into any of our prior or subsequent filings under the Securities Act.

ITEM 6. SELECTED FINANCIAL DATA

The following table presents selected historical financial data derived from the Consolidated Financial Statements for each of the five years presented. The selected financial data should be read in conjunction with, and is qualified in its entirety by reference to Management's Discussion and Analysis of Financial Condition and Results of Operations and the Consolidated Financial Statements and the Notes thereto.

(In Millions, except per share amounts)	2019 ^(a)	2018	2017 ^(b)	2016 ^(c)	2015
Results of Operations					
Revenue	\$ 2,846.4	\$ 2,745.1	\$ 2,585.3	\$ 2,405.4	\$ 2,485.6
Gross profit	910.1	887.2	819.9	760.9	802.7
Gross margin	32.0%	32.3%	31.7%	31.6%	32.3%
Asbestos-related (benefit) cost, net ^(d)	(20.2)	4.9	(19.9)	(25.6)	(91.4)
Other operating costs ^(e)	518.9	485.0	520.5	509.9	517.6
Operating income	411.4	397.3	319.3	276.6	376.5
Operating margin	14.5%	14.5%	12.4%	11.5%	15.1%
Income tax expense ^(f)	89.9	57.7	194.6	76.0	70.1
Income from continuing operations attributable to ITT Inc.	323.4	332.4	115.0	181.9	312.4
Income (loss) from discontinued operations, net of $tax^{(9)}$	1.7	1.3	(1.5)	4.2	39.4
Net income attributable to ITT Inc.	325.1	333.7	113.5	186.1	351.8
Income from continuing operations per basic share	3.69	3.79	1.30	2.04	3.48
Net income per basic share	3.71	3.81	1.29	2.09	3.92
Income from continuing operations per diluted share	3.65	3.75	1.29	2.02	3.44
Net income per diluted share	3.67	3.76	1.28	2.07	3.88
Dividends declared per share	0.588	0.536	0.512	0.496	0.4732
Financial Position					
Cash and cash equivalents	\$ 612.1	\$ 561.2	\$ 389.8	\$ 460.7	\$ 415.7
Total assets	4,107.7	3,846.8	3,700.2	3,601.7	3,723.6
Total debt and finance leases	99.4	125.0	171.9	216.3	248.5
Working capital ^(h)	599.5	542.1	590.1	517.4	562.9

(a) On April 30, 2019, we acquired Rheinhütte Pumpen Group (Rheinhütte) and on July 3, 2019 we acquired Matrix Composites, Inc. (Matrix). Our 2019 Consolidated Financial Statements include an additional 8 months of operations compared to 2018 and prior years related to Rheinhütte, and an additional 6 months of operations compared to 2018 and prior years related to Rheinhütte, and an additional 6 months of operations compared to 2018 and prior years related to Rheinhütte, and an additional 6 months of operations compared to 2018 and prior years related to Rheinhütte, and an additional 6 months of operations compared to 2018 and prior years related to Rheinhütte, and an additional 6 months of operations compared to 2018 and prior years related to Matrix. See Note 22, Acquisitions, to the Consolidated Financial Statements for further information.

(b) On January 26, 2017, we acquired Axtone Railway Components (Axtone). Our 2017 Consolidated Financial Statements include an additional 11 months of operations compared to 2016 and prior years related to this acquisition.

(c) On October 5, 2015, we acquired Wolverine Automotive Holdings Inc. (Wolverine). Our 2016 Consolidated Financial Statements include an additional 9 months of operations compared to 2015 related to this acquisition.

(d) The asbestos-related benefit in 2015 primarily reflects a \$100.7 benefit recognized related to a new single firm defense strategy and streamlined case management that is expected to significantly reduce asbestos defense costs.

(e) In 2018, we completed a sale of excess property for net proceeds of \$40, and recognized a pre-tax gain of \$38.5.

- (f) 2017 income tax expense includes \$129.2 associated with the Tax Cuts and Jobs Act of 2017 that was signed into U.S. law in December 2017. See Note 6, Income Taxes, to the Consolidated Financial Statements for further information.
- (g) 2015 income from discontinued operations of \$39.4 is principally related to the settlement of a U.S. income tax audit.
- (h) Prior to 2018, working capital was defined as the sum of Receivables, net, and Inventories, net less Accounts payable. In 2018, we updated our working capital definition to include Current contract assets and Current contract liabilities. See the section titled "Key Performance Indicators and Non-GAAP Measures" for a definition and reconciliation of working capital.

ITEM 7. MANAGEMENT'S DISCUSSION & ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

The following discussion should be read in conjunction with the consolidated financial statements and the notes related thereto. As we noted earlier in the Forward-Looking and Cautionary Statements of this Annual Report on Form 10-K, this Part II, Item 7, "Management's Discussion and Analysis of Financial Condition and Results of Operations," and Part II, Item 7A, "Quantitative and Qualitative Disclosures about Market Risk" (along with other sections of this Annual Report), may contain forward-looking statements. The risks discussed in Part I, Item 1A, "Risk Factors," and other risks identified in this Annual Report on Form 10-K could cause our actual results to differ materially from those expressed by such forward-looking statements.

All comparisons included within this Part II, Item 7, "Management's Discussion and Analysis of Financial Condition and Results of Operations," refer to results for the year ended December 31, 2019 compared to the year ended December 31, 2018, unless stated otherwise. Please refer to our Annual Report on Form 10-K (2018 Annual Report) for discussion of the year ended December 31, 2018 compared to the year ended December 31, 2017.

OVERVIEW

ITT Inc., through its worldwide subsidiaries, is a diversified manufacturer of highly engineered critical components and customized technology solutions for the energy, transportation and industrial markets. We refer you to Part I, Item 1, "Description of Business" for a further overview of our company, segments, products and service offerings, and other information about our business.

EXECUTIVE SUMMARY

During 2019, ITT achieved strong results that reflected continued operational execution and share gain strategies in key global markets. Our results are a reflection of our hard work and focus on creating value for our customers, while also implementing productivity improvements and making strategic investments. The following table provides a summary of our key performance indicators for 2019 with growth comparisons to 2018.

Revenue	Orders	Segment Operating Income	Segment Operating Margin	EPS	Operating Cash Flow	
\$2,846	\$2,813	\$432	15.2%	\$3.65	\$358	
4% Increase	3% Decrease	5% Increase	20bp Increase	3% Decrease	4% Decrease	
Organic Revenue	Organic Orders	Adjusted Segment Operating Income	Adjusted Segment Operating Margin	Adjusted EPS	Adjusted Free Cash Flow	
1						
\$2,868	\$2,842	\$457	16.0%	\$3.81	\$319	

Summary of Key Performance Indicators for 2019

See the section titled "Key Performance Indicators and Non-GAAP Measures" for a definition and reconciliation of organic revenue, organic orders, adjusted segment operating income and margin, adjusted EPS, and adjusted free cash flow.

Our 2019 results include:

- Revenue of \$2.85 billion, a \$101.3 or 3.7% increase that included \$54.5 from our strategic acquisitions of Rheinhütte Pumpen and Matrix Composites and unfavorable foreign exchange of \$76.4. Organic revenue increased 4.5%, driven by the strength of our diversified portfolio as revenue from our industrial businesses grew 8%, oil and gas grew 7%, and transportation grew 3%.
- Orders of \$2.81 billion, a \$78.7 or 2.7% decrease that included \$53.6 from our two strategic acquisitions and unfavorable foreign exchange of \$81.9. Organic orders decreased 1.7%, due to pump project declines and difficult comparisons within the industrial and oil and gas markets. Transportation orders increased 1% as growth in rail was partially offset by significant prior year defense programs.

- Segment operating income increased \$21.0 or 5.1%, despite higher acquisition-related costs and restructuring charges. Adjusted segment operating income increased \$42.5, or 10.3%, and adjusted segment operating margin grew 90 basis points to 16.0%. This improvement was fueled by increased sales volume from strength in project pumps, Friction OEM share gains, and growth in rail, as well as continued manufacturing and supply chain productivity, cost containment actions, and strategic acquisition benefits. These gains were partially offset by higher commodity costs and tariffs as well as unfavorable foreign exchange.
- Income from continuing operations decreased to \$3.65 per diluted share as compared to \$3.75, driven by a prior year gain of \$38.5 on the sale of a former operating location and a prior year favorable deferred tax valuation adjustment, partially offset by a favorable year-over-year net asbestos benefit of \$25.1 driven by effective insurance recovery strategies. Adjusted income from continuing operations improved 18.0% to \$3.81 per diluted share, reflecting strong adjusted segment operating income growth, a reduction in corporate costs, lower interest and non-operating expenses, and a favorable tax rate.
- Operating cash flow of \$357.7 decreased \$14.1 or 3.8%, primarily due to proceeds of \$19.0 received in 2018 from an environmental insurance-related settlement and unfavorable working capital, partially offset by an improvement in segment operating income. Adjusted free cash flow of \$318.8 reflected a 94.5% conversion of adjusted income from continuing operations.

In 2019, we advanced our strategic objectives to drive long-term growth and share gains. The following highlights a few examples of strategic actions that occurred during the year that will help position us for continued value creation:

- We expanded manufacturing automation capabilities at MT Friction, installed a new plating line at CCT Nogales to improve lead times and reduce costs, and pursued Value Analysis and Value Engineering initiatives at IP.
- We continued our efforts to develop and improve existing smart products with advanced technologies such as the ITT Smartpad which now also includes aftermarket applications, sensor-enabled KONI shock absorbers for electric buses, EnviZion valves, and i-Alert.

During the year, we drove market share gains by expanding in new and existing key end markets and geographies, including:

- Advancing our capabilities and product offerings in the commercial aerospace and rail markets and were awarded significant multi-year contracts that may also generate aftermarket opportunities.
- We significantly outpaced global Friction OEM production rates, due to strength in North America, China and Europe and had several key electric vehicle and SUV platform wins.

In 2019, we continued to deploy our capital in balanced and effective ways, including:

- Completion of \$118 of strategic acquisitions providing geographic expansion.
- Funding major organic investments across our business segments that enhance our production capacity and technological capabilities.
- Returning \$94 to shareholders in the form of quarterly dividends and share repurchases.
- Approval of a new \$500 indefinite-term share repurchase program.

Our success in 2019 was driven by our commitment to efficiency, speed, customer centricity, and operational excellence, and we intend to build on this momentum in 2020 to drive growth and innovation in the face of market challenges and uncertainties. Our global and end market diversification strategy will help offset slowing global growth as well as uncertainty surrounding commodity costs, tariffs, and price pressures. We expect challenges in the coming year related to the recent announcement of a temporary halt in production of Boeing's 737 MAX which may temporarily impact Boeing's demand for our products. In addition, the recent outbreak of the 2019 novel coronavirus in China is causing significant uncertainty and business disruption in the region and it is unknown when the virus will be fully contained, and what the ultimate global economic impact will be.

Despite these uncertainties, in 2020, we will focus on areas that are within our control such as continuing to drive productivity and innovation across our businesses and executing on our extensive war chest of self-help opportunities. We will continue to deploy our capital in a balanced and efficient way with a focus on organic growth initiatives, close-to-core acquisitions, and shareholder return. We are raising our first quarter 2020 quarterly dividend by 15%, which represents our eighth consecutive year of dividend increases.

DISCUSSION OF FINANCIAL RESULTS 2019 VERSUS 2018

	2	019	2018	Change
Revenue	\$ 2,846	.4 \$2	2,745.1	3.7 %
Gross profit	910	.1	887.2	2.6 %
Gross margin	32	.0%	32.3%	(30)bp
Operating expenses	498	.7	489.9	1.8 %
Operating expense to revenue ratio	17	.5%	17.8%	(30)bp
Operating income	411	.4	397.3	3.5 %
Operating margin	14	.5%	14.5%	—bp
Interest and non-operating (income) expenses, net	(3	.0)	6.3	(147.6)%
Income tax expense	89	.9	57.7	55.8 %
Effective tax rate	21	.7%	14.8%	690bp
Income from continuing operations attributable to ITT Inc.	323	.4	332.4	(2.7)%
Net income attributable to ITT Inc.	\$ 325	.1 \$	333.7	(2.6)%

All comparisons included within the Discussion of Financial Results for 2019 versus 2018 refer to results for the year ended December 31, 2019 compared to the year ended December 31, 2018, unless stated otherwise.

REVENUE AND ORDERS

The following table illustrates the year-over-year revenue and orders results from each of our segments for the years ended December 31, 2019 and 2018.

Revenue:	2019	2018	Change	Organic growth (decline) ^(a)	
Motion Technologies	\$ 1,241.8	\$ 1,274.1	(2.5)%	2.0 %	
Industrial Process	943.8	827.1	14.1 %	10.3 %	
Connect & Control Technologies	663.9	646.6	2.7 %	2.1 %	
Eliminations	(3.1)	(2.7)			
Total Revenue	\$ 2,846.4	\$ 2,745.1	3.7 %	4.5 %	
Orders:					
Motion Technologies	\$ 1,250.6	\$ 1,295.6	(3.5)%	1.2 %	
Industrial Process	886.8	902.1	(1.7)%	(4.7)%	
Connect & Control Technologies	678.9	696.3	(2.5)%	(3.2)%	
Eliminations	(3.1)	(2.1)			
Total Orders	\$ 2,813.2	\$ 2,891.9	(2.7)%	(1.7)%	

(a) See the section titled "Key Performance Indicators and Non-GAAP Measures" for a definition and reconciliation of organic revenue and organic orders.

Motion Technologies

MT revenue for the year ended December 31, 2019 was \$1,241.8, a decrease of \$32.3, or 2.5%. Excluding the impact of foreign currency translation of \$57.4, organic revenue increased \$25.1, or 2.0%. The increase was driven by strength in global rail as well as Friction OEM share gains which significantly outpaced the global auto market, offset by a decline in our Wolverine business. KONI & Axtone sales grew 11% on strength in rail in Europe and Asia. Friction sales increased 3% due to growth of 6% in OEM from market share gains in North America, Europe and China which helped offset contraction in the global auto market and lower aftermarket activity of 2%. Wolverine sales decreased 13% driven by weakness in shims and lost sealing business.

Orders for the year ended December 31, 2019 were \$1,250.6, a decrease of \$45.0, or 3.5%. Excluding the impact of foreign currency translation of \$60.6, organic orders increased \$15.6, or 1.2%. Friction drove the improvement with a 2% increase primarily due to the ramp up of new platform wins in North America. KONI-Axtone increased 8% due to passenger rail market share gains, partially offset by a prior year Russian rail order of \$14. Organic order growth was partially offset by weakness in our Wolverine business.

Industrial Process

IP revenue for the year ended December 31, 2019 was \$943.8, an increase of \$116.7, or 14.1%, which included revenue of \$44.9 from our second quarter acquisition of Rheinhütte, and an unfavorable foreign currency translation impact of \$13.5. Organic revenue increased 10.3% primarily driven by 35% growth in pump projects due to significant strength in the chemical and mining markets mainly in North America. Within our short-cycle business, organic revenue increased 3% from baseline pumps and aftermarket parts in the oil and gas and chemical markets.

Orders for the year ended December 31, 2019 were \$886.8, a decrease of \$15.3, or 1.7% which included orders of \$42.6 from our second quarter acquisition of Rheinhütte, and an unfavorable foreign currency translation impact of \$15.3. Organic orders decreased \$42.6, or 4.7% due to a 7% reduction in projects driven by pump project declines and difficult comparisons to the prior year in the chemical and oil and gas markets, partially offset by strength in industrial. Orders from our short-cycle business declined 4% due to weakness in industrial valves, aftermarket parts, and baseline pumps.

The level of order and shipment activity related to project pumps can vary significantly from period to period, which may impact year-over-year comparisons. IP's backlog as of December 31, 2019 was \$395.4, reflecting a decrease of \$48.8, or 11.0%, compared to December 31, 2018.

Connect & Control Technologies

CCT revenue for the year ended December 31, 2019 was \$663.9, an increase of \$17.3, or 2.7%, which included revenue of \$9.6 from our third quarter acquisition of Matrix, and an unfavorable foreign currency translation impact of \$5.6. Organic revenue increased \$13.3, or 2.1% driven by growth in commercial aerospace of 8% mainly within components and aftermarket. This was partially offset by declines in defense components due to prior year program strength and weaker sales from electric vehicle connectors.

Orders were \$678.9, a decrease of \$17.4, or 2.5%, which included orders of \$11.0 from our third quarter acquisition of Matrix and an unfavorable foreign currency translation impact of \$6.0. Organic orders decreased \$22.4, or 3.2%, due to an 8% decrease in orders within the industrial market primarily due to connectors and components. Additionally, aerospace and defense orders decreased 1% primarily from prior year defense program strength and rotorcraft demand.

On July 11, 2017, the U.S. Defense Logistics Agency, Land and Maritime (DLA) issued a notice that it had removed certain of our military-specification connector products from the Qualified Products List (QPL). Annual sales of these military-specification connectors were estimated to range from \$8 to \$10 prior to the removal of these products from the QPL. The Company is making progress as the status of approximately half of these products has been restored on the QPL and we expect the majority of the remaining products will be restored by the middle of 2020.

GROSS PROFIT

Gross profit for 2019 was \$910.1, reflecting a gross margin of 32.0%. Gross profit for 2018 was \$887.2, reflecting a gross margin of 32.3%. The decline in gross margin was primarily due to higher commodity costs, increased tariffs, and unfavorable product mix, partially offset by manufacturing and supply chain and productivity improvements across all segments and sales volume leverage.

Other

Tariffs

In 2018, the U.S. government announced tariffs on certain imported goods, and began renegotiating existing trade terms with China, Europe and other countries. These tariffs have negatively impacted the price of certain parts and materials we utilize to manufacture finished products we sell. Since announced, we have been managing the impacts of these tariffs and will attempt to mitigate the impact of higher input costs through pricing and supply chain actions, efficient utilization of our global manufacturing footprint, and supplier negotiations and diversification strategies. Tariffs and related impacts remain highly uncertain due to the current dynamic landscape and ongoing negotiations. Therefore, we are unable to estimate the ultimate outcome tariffs will have on our future results of operations, financial position, and cash flows.

OPERATING EXPENSES

The following table provides further information by expense type, as well as a breakdown of operating expense by segment.

		2019	2018	Change
General and administrative expenses	\$ 2	254.1	\$ 259.1	(1.9)%
Sales and marketing expenses	1	165.9	168.2	(1.4)%
Research and development expenses		97.9	98.4	(0.5)%
Loss (gain) on sale or disposal of long-lived assets		1.0	(40.7)	(102.5)%
Asbestos-related (benefit) cost, net		(20.2)	4.9	(512.2)%
Total operating expenses	\$ 4	498.7	\$ 489.9	1.8 %
By Segment:		·		
Motion Technologies	\$ 1	163.3	\$ 167.3	(2.4)%
Industrial Process	1	183.1	170.7	7.3 %
Connect & Control Technologies	1	131.4	137.9	(4.7)%
Corporate & Other		20.9	14.0	49.3 %

General and administrative (G&A) expenses were \$254.1 for the year ended December 31, 2019, a decrease of \$5.0. The decrease was mainly due to a decline in incentive compensation due in part to restructuring actions and favorable foreign exchange of \$4. These items were partially offset by incremental restructuring costs of \$7.5, higher acquisition-related costs of \$7.2, and a favorable intellectual property settlement in the prior year of \$6.2, net of legal expenses.

Sales and marketing expenses for the year ended December 31, 2019 were \$165.9, a decrease of \$2.3. Excluding incremental costs of \$7.7 from our 2019 acquisitions of Rheinhütte and Matrix and favorable foreign currency of \$3.4, sales and marketing expenses decreased \$6.6. The decrease was driven by cost reduction actions across all segments.

Research and development expenses for the year ended December 31, 2019 were \$97.9, a decrease of \$0.5.

Gain on sale of long-lived assets of \$40.7 for the year ended December 31, 2018 is primarily due to a net gain of \$38.5 recognized on the sale of a former operating location.

During 2019, we recognized a net asbestos-related benefit of \$20.2, compared to a net expense of \$4.9 in the prior year. The change was primarily due to the current year remeasurement benefit of \$68.1 compared to a remeasurement cost of \$10 in the prior year, offset by a prior year insurance settlements of \$58.9. See Note 20, Commitments and Contingencies, to the Consolidated Financial Statements for further information on our asbestos-related liabilities and assets.

OPERATING INCOME

The following table illustrates the 2019 and 2018 operating income and operating margin by segments and at the consolidated level.

	2019	2018	Change
Motion Technologies	\$ 216.1	\$ 223.4	(3.3)%
Industrial Process	104.7	91.4	14.6 %
Connect & Control Technologies	111.5	96.5	15.5 %
Segment operating income	432.3	411.3	5.1 %
Asbestos-related benefit (cost), net	20.2	(4.9)	512.2 %
(Loss) gain on sale or disposal of corporate long-lived assets	(0.2)	38.5	(100.5)%
Other corporate costs	(40.9)	(47.6)	14.1 %
Total corporate and other cost, net	(20.9)	(14.0)	(49.3)%
Total operating income	\$ 411.4	\$ 397.3	3.5 %
Operating margin:			
Motion Technologies	17.4%	17.5%	(10)bp
Industrial Process	11.1%	11.1%	—bp
Connect & Control Technologies	16.8%	14.9%	190bp
Segment operating margin	15.2%	15.0%	20bp
Consolidated operating margin	14.5%	14.5%	—bp

MT operating income for the year ended December 31, 2019 decreased \$7.3, and had a margin decline of 10 basis points to 17.4%. The decline in operating income was due to an increase in commodity costs and tariffs, unfavorable foreign currency impacts, and higher strategic investments. Additionally, legal costs increased year over year by \$7.5, primarily related to a favorable intellectual property settlement in 2018 of \$6.2, net of legal expenses. These increases were partially offset by benefits of \$46 from supply chain, productivity, and restructuring actions.

IP operating income for the year ended December 31, 2019 increased \$13.3, and had an operating margin of 11.1% which was consistent with the prior year. The increase in operating income was primarily driven by favorable sales volume and price, savings from productivity and supply chain actions, and our strategic acquisition of Rheinhütte. These were partially offset by higher commodity costs and tariffs, unfavorable sales mix, and higher restructuring and acquisition costs.

CCT operating income for the year ended December 31, 2019 increased \$15.0, and delivered an improvement to operating margin of 190 basis points to 16.8%. The increase was driven by benefits from productivity, supply chain, and restructuring actions, favorable sales volume, and our strategic acquisition of Matrix. Additionally, 2018 included \$5 in legal costs associated with a resolved U.S. Department of Justice (DOJ) civil matter. These benefits were partially offset by unfavorable commodity costs, strategic investments, and sales mix.

Other corporate costs, net, decreased \$6.7 due to lower compensation and incentive costs and lower environmental costs, partially offset by higher intangible amortization of \$2.7 and legal costs of \$2.1.

INTEREST AND NON-OPERATING (INCOME) EXPENSES, NET

	2019	2018	Change
Interest (income) expense, net	\$ (4.1)	\$ 0.4	(1,125.0)%
Miscellaneous expense, net	1.1	5.9	(81.4)%
Total interest and non-operating (income) expenses, net	\$ (3.0)	\$ 6.3	(147.6)%

The change in interest (income) expense, net in 2019 was due to favorable interest rates on commercial paper borrowings, interest income earned on time deposits, partially offset by interest income in the prior year related to a change in uncertain tax position.

Miscellaneous expenses, net decreased \$4.8 in 2019, primarily due to lower postretirement benefit expenses, mainly driven by a settlement charge of \$1.7 in 2018 and a reduction in amortization of actuarial losses.

INCOME TAX EXPENSE

	2019	2018	Change
Income tax expense	\$ 89.9	\$ 57.7	55.8 %
Effective tax rate	21.7%	14.8%	690bp

The higher effective tax rate in 2019 was primarily due to tax benefits of \$22.9 in 2018 from German valuation allowance reversals on deferred tax assets.

We operate in various tax jurisdictions and are subject to examination by tax authorities in these jurisdictions. We are currently under examination in several jurisdictions including the Czech Republic, Germany, Hong Kong, India, Italy, Japan, the U.S. and Venezuela. The calculation of our tax liability for unrecognized tax benefits includes dealing with uncertainties in the application of complex tax laws and regulations in various tax jurisdictions. Due to the complexity of some uncertainties, the ultimate resolution may result in a payment that is materially different from our current estimate of the unrecognized tax benefit. Over the next 12 months, the net amount of the tax liability for unrecognized tax benefits in audit status, expiration of statutes of limitations and other events. The settlement of any future examinations could result in changes in the amounts attributable to the Company under its existing Tax Matters Agreement with Exelis Inc. (Exelis) and Xylem Inc. (Xylem).

See Note 6, Income Taxes, to the Consolidated Financial Statements for further information on tax-related matters.

LIQUIDITY AND CAPITAL RESOURCES

Funding and Liquidity Strategy

We monitor our funding needs and design and execute strategies to meet overall liquidity requirements, including the management of our capital structure, on both a short- and long-term basis. We expect to fund our ongoing working capital, capital expenditures, dividends, and financing requirements through cash flows from operations and cash on hand, or by accessing the U.S. or European commercial paper markets or our Revolving Credit Agreement.

We manage our worldwide cash requirements considering available funds among the many subsidiaries through which we conduct business and the cost effectiveness with which those funds can be accessed. We have identified and continue to look for opportunities to access cash balances in excess of local operating requirements to meet our global liquidity needs in a cost-efficient manner. We plan to transfer cash between certain international subsidiaries and the U.S. and other international subsidiaries when it is cost effective to do so. The passage of the U.S. Tax Act provides greater flexibility around our global cash management strategy related to the amount and timing of transfers, and we will continue to support growth and expansion in markets outside of the U.S. through the development of products, increased capital spending, and potential foreign acquisitions. Net cash distributions from foreign countries amounted to \$11.4 and \$318.1 during 2019 and 2018, respectively. The timing and amount of any additional future distributions remains under evaluation.

The amount and timing of dividends payable on our common stock are within the sole discretion of our Board of Directors and will be based on, and affected by, a number of factors, including our financial position and results of operations, available cash, expected capital spending plans, prevailing business conditions, and other factors the Board of Directors deems relevant. Therefore, there can be no assurance as to what level of dividends, if any, will be paid in the future. Aggregate dividends paid in 2019 were \$52.1, compared to \$47.3 in 2018, reflecting annual per share amounts of \$0.588 and \$0.536, respectively. In the first quarter of 2020, we declared a quarterly dividend of \$0.169 per share for shareholders of record on March 16, 2020, which will be paid on April 6, 2020.

In 2019 and 2018, we repurchased and retired 0.5 and 1.0 shares of common stock, respectively, for \$28.7 and \$50.0, respectively, under our \$1 billion share repurchase program. As of December 31, 2019, under the program, the Company has repurchased 22.7 shares for \$938.1. In addition, on October 30, 2019, the Board of Directors approved the adoption of a new indefinite term \$500 share repurchase program. Separate from the share repurchase program, the Company repurchased 0.3 shares and 0.1 shares for an aggregate price of \$12.7 and \$6.1 during 2019 and 2018, respectively, in settlement of employee tax withholding obligations due upon the vesting of RSUs and PSUs. All repurchased shares are canceled immediately following the repurchase.

Significant factors that affect our overall management of liquidity include our credit ratings, the availability of commercial paper, access to bank lines of credit, and the ability to attract long-term capital on satisfactory terms. We assess these factors along with current market conditions on a continuous basis, and as a result, may alter the mix of our short- and long-term financing when it is advantageous to do so.

Commercial Paper

We have access to the commercial paper market through programs in place in the U.S. and Europe, to supplement the cash flows generated internally and to provide additional short-term funding for strategic investments and other funding requirements. We manage our short-term liquidity through the use of our commercial paper program by adjusting the level of commercial paper borrowings as opportunities to deploy additional capital arise and it is cost effective to do so. We had \$84.2 and \$114.4 of commercial paper outstanding as of December 31, 2019 and 2018, respectively. Our average daily outstanding commercial paper balance for the years ended 2019 and 2018 was \$122.0 and \$110.7, respectively, and the maximum outstanding commercial paper during each of those respective years was \$167.9 and \$215.5, respectively. There have been no other material changes that have impacted our funding and liquidity capabilities.

Revolving Credit Agreement

Our \$500 revolving credit agreement (the Revolving Credit Agreement) provides for increases of up to \$200 for a possible maximum total of \$700 in aggregate principal amount, at the request of the Company and with the consent of the institutions providing such increased commitments. The Revolving Credit Agreement is intended to provide access to additional liquidity to be a source of alternate funding to the commercial paper program, if needed. Our policy is to maintain unused committed bank lines of credit in an amount greater than outstanding commercial paper balances. Two borrowing options are available under the Revolving Credit Agreement: (i) a competitive advance option, and (ii) a revolving credit option. The interest rates for the competitive advance option will be obtained from bids in accordance with competitive auction procedures. The interest rates under the revolving credit option will be based either on LIBOR plus spreads reflecting the Company's credit ratings, or on the Administrative Agent's Alternate Base Rate. As of December 31, 2019 and 2018 we had no outstanding borrowings under the Revolving Credit Agreement. In the event of a ratings downgrade of the Company to a level below investment grade, the direct and indirect significant U.S. subsidiaries of the Company would be required to guarantee the obligations under the Revolving Credit Agreement. On November 5, 2019, we amended the Revolving Credit Agreement to extend the maturity date from November 25, 2021 to November 25, 2022.

Our credit ratings as of December 31, 2019 were as follows:

Rating Agency	Short-Term Ratings	Long-Term Ratings
Standard & Poor's	A-2	BBB
Moody's Investors Service	P-3	Baa3
Fitch Ratings	F2	BBB+

There were no changes to the ITT credit ratings during 2019. Please refer to the rating agency websites and press releases for more information.

Sources and Uses of Liquidity

Our principal source of liquidity is our cash flow generated from operating activities, which provides us with the ability to meet the majority of our short-term funding requirements. The following table summarizes net cash derived from operating, investing, and financing activities for the three years ended December 31, 2019 and 2018.

	2019	2018
Operating activities	\$ 357.7	\$ 371.8
Investing activities	(203.4)	(52.3)
Financing activities	(101.5)	(128.8)
Foreign exchange	(3.0)	(15.3)
Total net cash flow provided by continuing operations	\$ 49.8	\$ 175.4
Net cash provided by (used in) discontinued operations	0.9	(4.2)
Net change in cash and cash equivalents	\$ 50.7	\$ 171.2

Operating Activities

The decrease in net cash provided by operating activities of \$14.1 was the result of \$19.0 in proceeds received in 2018 from an environmental insurance-related settlement, an increase in postretirement contributions of \$11.7 in 2019 and unfavorable changes in working capital from an increase in accounts receivable due in part to higher sales. These items were partially offset by an increase in segment operating income, a decline in net asbestos payments of \$19.2 due to favorable insurance recoveries and prior year environmental payments of \$10.2 related to the sale of a former operating location. Additionally, in 2019 the Company's net settlement of a \$10 civil matter with the DOJ was partially offset by proceeds received of \$9 from an intellectual property settlement.

Investing Activities

The increase in net cash used in investing activities of \$151.1 was the result of our 2019 acquisitions of Rheinhütte and Matrix for a total of \$113.1 and proceeds of \$40 in 2018 from the sale of a former operating location, which was partially offset by a decline in capital expenditures of \$4.1.

Financing Activities

The decrease in net cash used in financing activities of \$27.3 was due to a reduction in repurchases of ITT common stock of \$14.7, an increase in proceeds from employee stock option exercises of \$9.1, and a decline in net debt repayments of \$9.0, partially offset by an increase in dividends paid of \$4.8.

Discontinued Operations

Net cash provided by discontinued operations for the year ended December 31, 2019 was driven by a tax-related reimbursements of \$2.3 from former subsidiaries. Net cash used for the year ended December 31, 2018 was due to environmental-related payments for sites formerly owned by ITT, as well as cash payments related to the settlement of a state tax audit in the U.S.

Asbestos

Based on the estimated undiscounted asbestos liability as of December 31, 2019 for claims filed or estimated to be filed over the next 10 years, we have estimated that we will be able to recover approximately 47% of the asbestos indemnity and defense costs from our insurers. However, actual insurance reimbursements may vary significantly from period to period and the anticipated recovery rate is expected to decline over time due to gaps in our insurance coverage, reflecting uninsured periods, the insolvency of certain insurers, prior settlements with our insurers, and our expectation that certain insurance policies will exhaust within the next 10 years. In the tenth year of our estimate, our insurance recoveries are currently projected to be approximately 29%. Additionally, future recovery rates may be impacted by other factors, such as future insurance settlements, insolvencies, and judicial determinations relevant to our coverage program, which are difficult to predict and subject to a high degree of uncertainty.

The Company has negotiated with certain of its excess insurers to reimburse the Company for a portion of its settlement or defense costs as incurred, frequently referred to as "coverage-in-place" agreements. Under coverage-in-place agreements, an insurer's policies remain in force and the insurer undertakes to provide coverage for the Company's present and future asbestos claims on specified terms and conditions that address, among other things, the share of asbestos claims costs to be paid by the insurer, payment terms, claims handling procedures and the expiration of the insurer's obligations. The Company has entered into policy buyout agreements with certain insurers confirming the aggregate amount of available coverage under the subject policies and setting forth a schedule for future payments to a Qualified Settlement Fund, to be disbursed for future asbestos costs. Collectively, these agreements are designed to facilitate an orderly resolution and collection of ITT's insurance and to mitigate issues that insurers may raise regarding their responsibility to respond to claims.

As of December 31, 2019, the Company has entered into coverage-in-place agreements and policy buyout agreements representing approximately 57% of our recorded asset. All of our primary insurance policies are exhausted which may result in higher net cash outflows until excess carriers begin accepting claims for reimbursement. While there are overall limits on the aggregate amount of insurance available to the Company with respect to asbestos claims, with respect to certain coverage, those overall limits were not reached by the estimated liability recorded by the Company at December 31, 2019. We continue to explore negotiations with our insurers to maximize our insurance recoveries. For example, in February 2020, the Company signed an agreement-in-principle with a group of insurers to settle responsibility for certain insurance claims for \$66.4. We are currently evaluating the impact of this agreement on our insurance asset and estimate that the settlement will result in an increase to our insurance asset in the first quarter of 2020.

Further, there is uncertainty in estimating when cash payments related to the recorded asbestos liability will be fully expended and such cash payments will continue for a number of years beyond the next 10 years due to the significant proportion of future claims included in the estimated asbestos liability and the delay between the date a claim is filed and when it is resolved. Subject to these inherent uncertainties, it is expected that cash payments related to pending claims and claims to be filed in the next 10 years will extend through approximately 2031.

Although asbestos cash outflows can vary significantly from year to year, our current net cash outflows for defense and indemnity, net of tax benefits, are projected to average \$20 to \$30 over the next five years, and increase to an average of approximately \$35 to \$45 per year over the remainder of the projection period. Net cash outflows for defense and indemnity, net of tax, averaged \$20 over the past three annual periods. Total net asbestos cash outflows also include certain administrative costs such as legal related costs for insurance asset recoveries. In light of the uncertainties and variables inherent in the long-term projection of the Company's asbestos exposures and potential recoveries, although it is probable that the Company will incur additional costs for asbestos claims filed beyond the next 10 years, we do not believe that there is a reasonable basis for estimating the number of future claims, the nature of future claims, or the cost to resolve future claims for years beyond the next 10 years at this time. Accordingly, no liability or related asset has been recorded for any costs that may be incurred for claims asserted subsequent to 2029.

Due to these uncertainties, as well as our inability to reasonably estimate any additional asbestos liability for claims that may be filed beyond the next 10 years, it is difficult to predict the ultimate cost of resolving the pending and estimated unasserted asbestos claims. We believe it is possible that the future events affecting the key factors and other variables within the next 10 years, as well as the cost of asbestos claims filed beyond the next 10 years, net of expected recoveries, could have a material adverse effect on our financial statements.

Funding of Postretirement Plans

The following table provides a summary of the funded status of our postretirement benefit plans as of December 31, 2019 and 2018.

	2019							2018								
	P	U.S. ension		on-U.S. ension	в	Other enefits		Total	P	U.S. Pension		on-U.S. Pension	E	Other Benefits		Total
Fair value of plan assets	\$	319.9	\$	0.6	\$	1.3	\$	321.8	\$	277.8	\$	0.6	\$	2.9	\$	281.3
Projected benefit obligation		310.4		98.4		116.6		525.4		291.8		89.4		118.6		499.8
Funded status	\$	9.5	\$	(97.8)	\$	(115.3)	\$	(203.6)	\$	(14.0)	\$	(88.8)	\$	(115.7)	\$	(218.5)

The funded status of our U.S. pension plans improved by \$23.5 during 2019 primarily due to equity returns and discretionary contributions of \$9. Our non-U.S. pension plans, which are typically not funded due to local regulations, had a decline in funded status of \$9.0 during 2019, primarily due to a lower discount rate.

While the Company has significant discretion in making voluntary contributions, the Employee Retirement Income Security Act of 1974 and applicable Internal Revenue Code regulations mandate minimum funding thresholds. Failure to satisfy the minimum funding thresholds could result in restrictions on our ability to amend a plan or make benefit payments. As of December 31, 2019, the minimum funding percentages of all ITT U.S. qualified pension plans had been satisfied.

We make contributions to our postretirement benefit plans when considered necessary or advantageous to do so. However, the minimum funding requirements established by local government funding or taxing authorities, or established by other agreements, may influence future contributions. Funding requirements under IRS rules are a major consideration in making contributions to our U.S. pension plans. Future minimum funding requirements will depend primarily on the return on plan assets and discount rate, both determined using AFTAP guidelines. Depending on these factors, and the resulting funded status of our U.S. pension plans, the level of future minimum contributions could be material. During 2019 and 2018, we contributed \$12.9 and \$4.3 to our global pension plans, respectively. The 2019 amount included discretionary contributions to our U.S. pension plans of \$9.0. We anticipate making contributions to our global pension plans of approximately \$5 during 2020 which excludes any potential cash funding required to terminate the U.S. qualified pension plan.

The funded status of our other employee-related defined benefit plans improved marginally by \$0.4 during 2019. We contributed \$10.0 and \$6.9 to our other employee-related defined benefit plans during 2019 and 2018, respectively. We currently estimate that the 2020 contributions to our other employee-related defined benefit plans will be approximately \$10.

U.S. Qualified Pension Plan Termination

On February 19, 2020, the Company's Board of Directors conditionally authorized the termination of our U.S. qualified pension plan by offering lump sum distributions to certain participants and transferring the plan's remaining benefit obligations to an insurance company through one or more group annuity contracts. The current projected benefit obligation is \$296. Ultimate plan termination is subject to certain considerations, including regulatory review, interest rates and annuity pricing. If we proceed with the termination of the plan, the transaction is expected to occur in the second half of 2020 and would be funded with plan assets, \$319.9 as of December 31, 2019. Any additional funding, if necessary, would be made with cash. Our investment strategy has since been updated to reduce risk by increasing the asset allocation to 100% fixed income and cash. At the time such a transaction were to close, an insurance company (or companies) would assume responsibility for paying and administering pension benefits that had been an obligation of the plan to plan participants and their beneficiaries. Upon transfer of the pension obligation, we expect to recognize

a non-cash pension settlement charge of approximately \$130 to \$140 before tax, which includes recognition of the remaining pension losses, currently recorded in accumulated other comprehensive loss, and derecognition of the net assets of the plan. As a result of the plan transfer, the amount of benefits to be received by participants will not be impacted and will be protected by state guaranty associations.

See Note 16, Postretirement Benefit Plans, for additional financial information related to our postretirement obligations.

Capital Resources

Long-term debt is generally defined as any debt with an original maturity greater than 12 months. As of December 31, 2019, we have sources of short- and long-term funding including access to the capital markets through a commercial paper program and \$500 of available borrowing capacity, which may potentially be expanded to \$700, under the Revolving Credit Agreement, as well as market access to longer-term markets. Our commercial paper program is supported by the Revolving Credit Agreement and our policy is to maintain unused committed bank lines of credit in an amount greater than outstanding commercial paper balances.

The table below provides long-term debt outstanding and finance lease obligations at December 31, 2019 and 2018.

	2019	2018
Current portion of long-term debt and finance leases	\$ 2.3	\$ 1.8
Non-current portion of long-term debt and finance leases	12.9	8.8
Total long-term debt and finance leases	\$ 15.2	\$ 10.6

Contractual Obligations

ITT's commitment to make future payments under long-term contractual obligations was as follows, as of December 31, 2019:

		Pa	yments	Due By P	eriod		
	 Total	ss Than I Year	1-3	Years	3-5	Years	ore Than Years
Long-term debt, including interest and finance leases	\$ 15.7	\$ 2.5	\$	4.2	\$	4.1	\$ 4.9
Operating leases	128.2	22.5		33.4		17.9	54.4
Purchase obligations ^(a)	119.1	113.3		5.8		_	_
Other long-term obligations ^(b)	94.8	10.2		17.6		15.2	51.8
Total	\$ 357.8	\$ 148.5	\$	61.0	\$	37.2	\$ 111.1

In addition to the amounts presented in the table above, we have recorded liabilities for pending asbestos claims and asbestos claims estimated to be filed over the next 10 years and uncertain tax positions of \$817.6 and \$22.1, respectively, in our Consolidated Balance Sheet at December 31, 2019. These amounts have been excluded from the contractual obligations table due to an inability to reasonably estimate the timing of payments in individual years. In addition, while we make contributions to our postretirement benefit plans when considered necessary or advantageous to do so, the minimum funding requirements established by local government funding or taxing authorities, or established by other agreements, may influence future contributions. As such, expected contributions to our postretirement benefit plans have been excluded from the table above.

- (a) Represents unconditional purchase agreements that are enforceable and legally binding and that specify all significant terms to purchase goods or services, including fixed or minimum quantities to be purchased; fixed, minimum or variable price provisions; and the approximate timing of the transaction. Purchase agreements that are cancellable without penalty have been excluded.
- (b) Other long-term obligations include amounts recorded on our December 31, 2019 Consolidated Balance Sheet, including estimated environmental payments and employee compensation agreements. We estimate based on historical experience that we will spend between \$5 and \$7 per year on environmental investigation and remediation, which excludes income related to settlement payments. Aportion of our environmental investigation and remediation costs are legally mandated through various orders and agreements with state and federal oversight agencies. At December 31, 2019, our recorded environmental liability was \$61.9.

Off-Balance Sheet Arrangements

Off-balance sheet arrangements represent transactions, agreements or other contractual arrangements with unconsolidated entities, where an obligation or contingent interest exists. Our off-balance sheet arrangements, as of December 31, 2019, consist of indemnities related to acquisition and disposition agreements and certain third-party guarantees.

Indemnities

Since our founding in 1920, we have acquired and disposed of numerous businesses. The related acquisition and disposition agreements allocate certain assets and liabilities among the parties and contain various representation and warranty clauses and may provide indemnities for a misrepresentation or breach of the representations and warranties by either party or for assumed or excluded liabilities. These provisions address a variety of subjects. The term and monetary amounts of each such provision are defined in the specific agreements and may be affected by various conditions and external factors. Many of the provisions have expired either by operation of law or as a result of the terms of the agreement. We do not have a liability recorded for these expired provisions and are not aware of any claims or other information that would give rise to material payments under such provisions.

As part of ITT's 2011 spin-off of its Defense and Information Solutions business, Exelis, and its water-related business, Xylem, ITT LLC agreed to assume certain liabilities and provide certain indemnifications and cross-indemnifications among ITT LLC, Exelis and Xylem, subject to limited exceptions with respect to employee claims. The provisions address a variety of subjects, including asserted and unasserted product liability matters (*e.g.*, asbestos claims, product warranties) which relate to certain products manufactured, repaired or sold prior to the date of the 2011 spin-off. These provisions last indefinitely and are not affected by Harris' acquisition of Exelis, or Harris' merger with L3 Technologies. In addition, ITT LLC, Exelis and Xylem agreed to certain cross-indemnifications with respect to other liabilities and obligations. ITT LLC expects Exelis and Xylem to fully perform under the terms of the Distribution Agreement and therefore has not recorded a liability for matters for which we have been assumed or indemnified. In addition, both Exelis and Xylem have made asbestos indemnity claims that could give rise to material payments under the indemnity provided by ITT LLC; such claims are included in our estimate of asbestos liabilities.

Guarantees

We had \$138.1 of guarantees, letters of credit and similar arrangements outstanding at December 31, 2019, primarily pertaining to commercial or performance guarantees and insurance matters. We have not recorded any material loss contingencies under these guarantees, letters of credit and similar arrangements as of December 31, 2019 as the likelihood of nonperformance by the underlying obligors is considered remote. From time to time, we may provide certain third-party guarantees that may be affected by various conditions and external factors, some of which could require that payments be made under such guarantees. We do not consider the maximum exposure or current recorded liabilities under our third-party guarantees to be material either individually or in the aggregate. We do not believe such payments would have a material adverse impact on our financial statements.

KEY PERFORMANCE INDICATORS AND NON-GAAP MEASURES

Management reviews a variety of key performance indicators including revenue, segment operating income and margins, earnings per share, order growth, free cash flow, backlog, and working capital, some of which are calculated other than in accordance with accounting principles generally accepted in the United State of America (GAAP). In addition, we consider certain measures to be useful to management and investors when evaluating our operating performance for the periods presented. These measures provide a tool for evaluating our ongoing operations and management of assets from period to period. This information can assist investors in assessing our financial performance and measures our ability to generate capital for deployment among competing strategic alternatives and initiatives, including, but not limited to, acquisitions, dividends, and share repurchases. Some of these metrics, however, are not measures of financial performance under GAAP and should not be considered a substitute for measures determined in accordance with GAAP. We consider the non-GAAP measures disclosed in this Annual Report on Form 10-K to be key performance indicators. These measures, which may not be comparable to similarly titled measures reported by other companies, consist of the following:

 "Organic revenue" and "organic orders" are defined as revenue and orders, excluding the impacts of foreign currency fluctuations, acquisitions, and divestitures that did not meet the criteria for presentation as a discontinued operation. The period-over-period change resulting from foreign currency fluctuations is estimated using a fixed exchange rate for both the current and prior periods. Management believes that reporting organic revenue and organic orders provides useful information to investors by helping identify underlying trends in our business and facilitating easier comparisons of our revenue performance with prior and future periods and to our peers.

	Motion Technologies		Industrial Process	Connect & Control echnologies	El	iminations	Total ITT
2019 Revenue	\$	1,241.8	\$ 943.8	\$ 663.9	\$	(3.1)	\$ 2,846.4
Acquisitions		_	(44.9)	(9.6)		_	(54.5)
Foreign currency translation		57.4	13.5	5.6		(0.1)	76.4
2019 Organic revenue		1,299.2	912.4	659.9		(3.2)	2,868.3
2018 Revenue		1,274.1	827.1	646.6		(2.7)	2,745.1
Organic revenue growth	\$	25.1	\$ 85.3	\$ 13.3	\$	(0.5)	\$ 123.2
Percentage change		2.0%	10.3%	2.1%			4.5%

Reconciliations of organic revenue for the year ended December 31, 2019 is provided below.

Reconciliations of organic orders for the year ended December 31, 2019 is provided below.

	Те	Motion Technologies		Industrial Process	Connect & Control chnologies	EI	iminations	Total ITT
2019 Orders	\$	1,250.6	\$	886.8	\$ 678.9	\$	(3.1)	\$ 2,813.2
Acquisitions		—		(42.6)	(11.0)		_	(53.6)
Foreign currency translation		60.6		15.3	6.0		—	81.9
2019 Organic orders		1,311.2		859.5	673.9		(3.1)	2,841.5
2018 Orders		1,295.6		902.1	696.3		(2.1)	2,891.9
Organic orders growth	\$	15.6	\$	(42.6)	\$ (22.4)	\$	(1.0)	\$ (50.4)
Percentage change		1.2%		(4.7)%	(3.2)%			(1.7)%

"Adjusted operating income" and "Adjusted segment operating income" are defined as operating income, adjusted to exclude special items that include, but are not limited to, asbestos-related impacts, restructuring, realignment, certain acquisition-related impacts, and unusual or infrequent operating items. Special items represent significant charges or credits that impact current results, which management views as unrelated to the Company's ongoing operations and performance. "Adjusted operating margin" and "Adjusted segment operating margin" are defined as adjusted operating income or adjusted segment operating income divided by revenue. We believe these financial measures are useful to investors and other users of our financial statements in evaluating ongoing operating profitability, as well as in evaluating operating performance in relation to our competitors.

Reconciliations of operating income to adjusted operating income for the years ended December 31, 2019 and 2018 are provided in the tables below.

Year Ended December 31, 2019	 lotion inologies	 dustrial rocess	Č	nnect & Control Inologies	Total egment	Со	rporate	п	TT Inc.
Operating income	\$ 216.1	\$ 104.7	\$	111.5	\$ 432.3	\$	(20.9)	\$	411.4
Asbestos-related benefit, net	_	_		_	_		(20.2)		(20.2)
Restructuring costs	4.9	5.7		2.0	12.6		0.1		12.7
Acquisition-related	_	7.5		1.2	8.7		_		8.7
Realignment costs and other ^(a)	1.3	1.5		0.3	3.1		5.2		8.3
Adjusted operating income	\$ 222.3	\$ 119.4	\$	115.0	\$ 456.7	\$	(35.8)	\$	420.9
Adjusted operating margin	17.9%	12.7%		17.3%	16.0%				14.8%
Year Ended December 31, 2018 Operating income	\$ 223.4	\$ 91.4	\$	96.5	\$ 411.3	\$	(14.0)	\$	397.3
Net gain on sale of former operating location	_	_		_	_		(38.5)		(38.5)
Asbestos-related cost, net	_			_	_		4.9		4.9
Restructuring costs	2.3	0.1		2.1	4.5		0.7		5.2
Acquisition-related	(0.4)	_		_	(0.4)		—		(0.4)
Realignment costs and other ^(a)	(6.2)	_		5.0	(1.2)		_		(1.2)
Adjusted operating income	\$ 219.1	\$ 91.5	\$	103.6	\$ 414.2	\$	(46.9)	\$	367.3
Adjusted operating margin	17.2%	11.1%		16.0%	15.1%				13.4%

(a) Realignment costs and other at MT include costs associated with the settlement of a legal matter in 2019 and an intellectual property settlement gain in 2018.

Realignment costs and other at IP include an intangible asset impairment and management reorganization.

Realignment costs and other at CCT include costs associated with a resolved DOJ civil matter.

Realignment costs and other at Corporate include amortization of an intangible asset and a management reorganization.

 "Adjusted income from continuing operations" and "adjusted income from continuing operations per diluted share" (Adjusted EPS) are defined as income from continuing operations attributable to ITT Inc. and income from continuing operations attributable to ITT Inc. per diluted share, adjusted to exclude special items that include, but are not limited to, asbestos-related impacts, restructuring, realignment, pension settlement and curtailment impacts, certain acquisition-related impacts, income tax settlements or adjustments, and unusual or infrequent items. Special items represent significant charges or credits, on an after-tax basis, that impact current results which management views as unrelated to the Company's ongoing operations and performance. The after-tax basis of each special item is determined using the jurisdictional tax rate of where the expense or benefit occurred. We believe that adjusted income from continuing operations is useful to investors and other users of our financial statements in evaluating ongoing operating profitability, as well as in evaluating operating performance in relation to our competitors.

A reconciliation of adjusted income from continuing operations, including adjusted earnings per diluted share, to income from continuing operations and income from continuing operations per diluted share for the years ended December 31, 2019 and 2018 are provided in the table below.

	2019	2018
Income from continuing operations attributable to ITT Inc.	\$ 323.4	\$ 332.4
Tax-related special items ^(a)	5.1	(28.4)
Net gain on sale of a former operating location, net of tax expense of \$0.1 and \$11.5, respectively	(0.3)	(27.0)
Asbestos-related (benefit) cost, net of tax expense (benefit) of \$4.7 and \$(1.1), respectively	(15.5)	3.8
Restructuring costs, net of tax benefit of \$2.9 and \$0.9, respectively	9.8	4.3
Acquisition-related costs (benefit), net of tax (benefit) expense of \$(0.6) and \$0.2, respectively	8.1	(0.2)
Realignment and other, net of tax (benefit) expense of \$(2.0) and \$0.8, respectively ^(b)	6.7	2.0
Adjusted income from continuing operations	\$ 337.3	\$ 286.9
Income from continuing operations attributable to ITT Inc. per diluted share (EPS)	\$ 3.65	\$ 3.75
Adjusted EPS	\$ 3.81	\$ 3.23

(a) The following table details significant components of the tax-related special items. See Note 6, Income Taxes, to Consolidated Financial Statements for further information.

	2019	2018
Change in deferred tax asset valuation allowance	\$ 4.7	\$ (23.7)
Charge on undistributed foreign earnings	7.3	(4.5)
Change in uncertain tax positions	0.2	(4.0)
U.S. federal tax law change	—	(0.9)
Other	(7.1)	4.7
Net tax-related special items	\$ 5.1	\$ (28.4)

(b) Realignment and other in 2019 primarily relates to amortization of certain intangible assets, an intangible asset impairment, management reorganization costs at IP and our Corporate Headquarters, and costs associated with a legal matter.

Realignment and other in 2018 primarily relates to costs associated with a resolved DOJ civil matter, income from an intellectual property settlement, and pension settlement costs.

"Adjusted free cash flow" is defined as net cash provided by operating activities less capital expenditures, adjusted
for cash payments for restructuring costs, realignment actions, net asbestos cash flows and other significant
items that impact current results which management views as unrelated to the Company's ongoing operations
and performance. Due to other financial obligations and commitments, including asbestos, the entire adjusted
free cash flow may not be available for discretionary purposes. We believe that adjusted free cash flow and
adjusted free cash flow conversion provide useful information to investors as it provides insight into the primary
cash flow metric used by management to monitor and evaluate cash flows generated by our operations. "Adjusted
free cash flow conversion" is defined as adjusted free cash flow divided by adjusted income from continuing
operations. A reconciliation of adjusted free cash flow is provided below.

	2019	2018
Net cash - Operating activities	\$ 357.7	5 371.8
Capital expenditures	(91.4)	(95.5)
Net asbestos cash payments	21.6	40.8
Insurance settlement agreement, net	_	(16.9)
Restructuring cash payments	11.7	8.2
Discretionary pension contributions, net of tax	6.9	_
Legal settlements, net	6.4	_
Realignment and other cash payments	5.9	0.5
Adjusted free cash flow	\$ 318.8	308.9
Adjusted income from continuing operations	337.3	286.9
Adjusted free cash flow conversion	94.5%	107.7%

"Working capital" is defined as the sum of Receivables, net, Inventories, net, and Current contract assets, less
Accounts payable and Current contract liabilities. We believe that working capital provides useful information to
investors as it provides insight into both a company's operational efficiency and its short-term financial health.
A reconciliation of working capital is provided below.

	 2019	2018
Receivables, net	\$ 578.4	\$ 540.0
Inventories, net	392.9	380.5
Current contract assets	18.0	21.8
Less: Accounts payable	332.4	339.2
Less: Current contract liabilities	57.4	61.0
Working capital	\$ 599.5	\$ 542.1

CRITICAL ACCOUNTING ESTIMATES

The preparation of financial statements and related disclosures in accordance with GAAP requires us to make judgments, estimates and assumptions that affect the amounts reported in the financial statements and accompanying notes. Significant accounting policies used in the preparation of the financial statements are discussed in Note 1, Description of Business, Basis of Presentation and Summary of Significant Accounting Policies, to the Consolidated Financial Statements. An accounting policy is deemed critical if it requires an accounting estimate to be made based on assumptions about matters that are highly uncertain at the time the estimate is made, if different estimates reasonably could have been used, or if changes to the estimate that are reasonably possible could materially affect the financial statements. Senior management has discussed the development, selection and disclosure of these estimates with the Audit Committee of ITT's Board of Directors.

The accounting estimates and assumptions discussed below are those that we consider most critical to fully understanding our financial statements and evaluating our results as they are inherently uncertain, involve the most subjective or complex judgments, include areas where different estimates reasonably could have been used, and the use of an alternative estimate that is reasonably possible could materially affect the financial statements. We base our estimates on historical experience and other data and assumptions 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 believes that the accounting estimates employed and the resulting balances reported in the Consolidated Financial Statements are reasonable; however, actual results could differ materially from our estimates and assumptions.

Asbestos Matters

Our subsidiaries, ITT LLC and Goulds Pumps LLC, have been sued along with many other companies in product liability lawsuits alleging personal injury due to asbestos exposure. These claims generally allege that certain products sold by our subsidiaries prior to 1985 contained a part manufactured by a third party (e.g., a gasket) that contained asbestos. To the extent that these third-party parts may have contained asbestos, it was encapsulated in the gasket (or other) material and was non-friable.

Estimating our exposure to pending asbestos claims and those that may be filed in the future is subject to significant uncertainty and risk as there are multiple variables that can affect the timing, severity, quality, quantity, and resolution of claims. The methodology used to project future asbestos costs is based largely on the Company's recent experience in resolving asbestos claims. To estimate the Company's exposure for pending claims, we use recent dismissal rates and settlement averages to calculate the expected cost of those cases. To estimate the unasserted claims, the Company relies on previously conducted epidemiological studies estimating the population of U.S. workers across 11 different industry and occupation categories believed to have been exposed to asbestos. We use relevant information from those studies to calculate an estimate of the number of claims to be filed against the Company over the next 10 years and then apply our recent experience on dismissals and settlement averages to calculate the estimated costs to be incurred to resolve those unasserted claims. In addition, the estimate is augmented for the costs of defending asbestos claims in the tort system. The asbestos liability has not been discounted to present value due to the inability to reliably forecast the timing of future cash flows. The Company retains a consulting firm to assist management in estimating our potential exposure to pending asbestos claims and for claims estimated to be filed over the next 10 years. The methodology to project future asbestos costs is one in which the underlying assumptions are separately assessed for their reasonableness and then each is used as an input to the liability estimate. Our assessment of the underlying assumptions concludes on one value for each assumption.

The liability estimate is most sensitive to assumptions surrounding mesothelioma and lung cancer claims, as together, the estimated costs to resolve pending and estimated future mesothelioma and lung cancer claims represent approximately 99% of the indemnity liability, but only 32% of pending claims.

The assumptions used by the Company are interdependent and no one factor predominates in estimating the asbestos liability. While there are other potential inputs to the model used to estimate our asbestos exposures for pending and estimated future claims, our methodology relies on the best input available for each individual assumption and, due to the interdependencies, does not create a range of reasonably possible outcomes. Projecting future asbestos costs is subject to numerous variables and uncertainties that are inherently difficult to predict. In addition to the uncertainties surrounding the key assumptions, additional uncertainty related to asbestos claims arise from the long latency period prior to the manifestation of an asbestos-related disease, changes in available medical treatments and associated medical costs, changes in plaintiff behavior resulting from bankruptcies of other companies that are potential defendants or co-defendants, uncertainties surrounding the litigation process from jurisdiction to jurisdiction, and the impact of potential legislative or judicial changes.

The forecast period used to estimate our potential exposure to projected asbestos claims is a judgment based on a number of factors, including volatility in asbestos litigation in general, the number and type of claims filed, recent experience with claims activity, and whether our past experience is expected to continue into the future. Developments related to asbestos tend to be long-cycle, changing over multi-year periods. We closely monitor these and other factors and periodically assess whether an alternative forecast period is appropriate.

We record a corresponding asbestos-related asset that represents our best estimate of probable insurance recoveries related to the recorded asbestos liability. In developing this estimate, the Company considers coverage-inplace and other settlement agreements with its insurers, as well as a number of additional factors, including expected levels of future cost recovery, the financial viability of the insurance companies, the method by which losses will be allocated to the various insurance policies and the years covered by those policies, the extent to which settlement and defense costs will be reimbursed by the insurance policies, and interpretation of the various policy and contract terms and limits and their interrelationships. The asbestos-related asset has not been discounted to present value, consistent with the asbestos liability as the timing of the insurance recoveries, including those under coverage-in-place and other settlement agreements, is dependent on the timing of payments of the asbestos liability.

The Company retains a consulting firm to assist management in estimating probable insurance recoveries related to pending asbestos claims and claims estimated to be filed over the next 10 years. The analysis of policy terms and the likelihood of recovery from solvent insurers are provided by external legal counsel and includes a risk assessment where policy terms or other factors are not certain and allocates asbestos settlement and defense costs among our insurers.

Based on the estimated undiscounted asbestos liability as of December 31, 2019 (for claims filed or estimated to be filed over the next 10 years), we have estimated that we will be able to recover 47% of asbestos indemnity and defense costs from our insurers. However, there is uncertainty in estimating when cash payments related to the recorded asbestos liability will be fully expended and such cash payments will continue for a number of years beyond the next 10 years due to the lag time between the date a claim is filed and when it is resolved. Actual insurance reimbursements may vary significantly from period to period and the anticipated recovery rate is expected to decline over time due to exhaustion of policies and the insolvency of certain insurers. In the 10th year of our estimate, our insurance recoveries are currently projected to be approximately 29%. Future recovery rates may be impacted (positively or negatively) by other factors, such as future insurance settlements, unforeseen insolvencies, and judicial determinations relevant to our coverage program, which are difficult to predict and subject to a high degree of uncertainty.

Our estimated asbestos liability and related receivables are based on management's best estimate of future events largely based on past experience; however, past experience may not prove a reliable predictor of the future. Future events affecting the key assumptions and other variables for either the asbestos liability or the related receivables could cause actual costs and recoveries to be materially higher or lower than currently estimated. For example, a significant upward or downward trend in the number of claims filed, depending on the nature of the alleged injury, the jurisdiction where filed and the quality of the product identification could change the estimated liability, as would substantial adverse verdicts at trial. A legislative solution, structured settlement transaction, or significant change in relevant case law could also change the estimated liability. Further, the bankruptcy of an insurer or settlements with our insurers, whether through coverage-in-place agreements or policy buyouts, could change the estimated amount of recoveries.

Furthermore, any predictions with respect to the variables impacting our estimate of the asbestos liability and related asset are subject to even greater uncertainty as the projection period lengthens. In light of the uncertainties and variables inherent in the long-term projection of the Company's asbestos exposures and potential recoveries, although it is probable that the Company will incur additional costs for asbestos claims filed beyond the next 10 years, we do not believe there is a reasonable basis for estimating the number of future claims, the nature of future claims, or the cost to resolve future claims for years beyond the next 10 years at this time. Accordingly, no accrual or receivable has been recorded for any costs which may be incurred for claims asserted subsequent to 2029.

Due to these uncertainties, as well as our inability to reasonably estimate any additional asbestos liability for claims which may be filed beyond the next 10 years, it is difficult to predict the ultimate cost of resolving all pending and estimated unasserted asbestos claims. We believe it is possible that the future events affecting the key factors and other variables within the next 10 years, as well as the cost of asbestos claims filed beyond the next 10 years, net of expected recoveries, could have a material adverse effect on our financial statements.

Revenue Recognition

Revenue is derived from the sale of products and services to customers. We recognize revenue to depict the transfer of promised goods or services to customers in an amount that reflects the consideration to which we expect to be entitled in exchange for those goods or services. For product sales, other than certain long-term construction and production type contracts where we have no alternative use for the product and have an enforceable right to payment, we recognize revenue at the time control passes to the customer, generally when products are shipped and the contractual terms have been fulfilled.

We recognize revenue for certain highly customized long-term design and build projects using the cost-to-total cost method, based upon the percentage of costs incurred to total projected costs. Revenue and profit recognized under the cost-to-total cost method are based on management's estimates such as total contract revenues, contract costs and the extent of progress toward completion. Due to the long-term nature of the contracts, these estimates are subject to uncertainties and require significant judgment. Estimates of contract costs include labor hours and rates, and material costs. These estimates consider historical performance, the complexity of the work to be performed, the estimated time to complete the project, and other economic factors such as inflation and market rates. We update our estimates on a periodic basis and any revisions to such estimates are recorded in earnings in the period in which they are determined. Provisions for estimated losses, if any, on uncompleted long-term contracts, are made in the period in which such losses are determined.

For contracts recognized at a point in time, provisions for estimated losses, if any, on uncompleted arrangements, are recognized in the period in which such losses are determined. These estimates are subject to uncertainties and require significant judgment and may consider historical performance, the complexity of the work to be performed, the estimated time to complete the project, and other economic factors such as inflation.

Additionally, accruals for estimated expenses related to sales returns and warranties are made at the time products are sold. Reserves for sales returns, rebates and other allowances are established using historical information on the frequency of returns for a particular product and period over which products can be returned. For distributors and resellers, our typical return period is less than 180 days. Future market conditions and product transitions may require us to take actions to increase customer incentive offerings, possibly resulting in a reduction in revenue at the time the incentive is offered.

Warranty accruals are established using historical information on the nature, frequency and average cost of warranty claims and estimates of future costs. Our standard product warranty terms generally include post-sales support and repairs or replacement of a product at no additional charge for a specified period of time. While we engage in extensive product quality programs and processes, we base our estimated warranty obligation on product warranty terms offered to customers, ongoing product failure rates, materials usage, service delivery costs incurred in correcting a product failure, and specific product class failures outside of our baseline experience and associated overhead costs. If actual product failure rates, repair rates, or any other post-sales support costs differ from these estimates, revisions to the estimated warranty liability would be required.

For certain highly complex contracts, design, engineering, and other preproduction costs may be capitalized if the costs relate directly to a contract or anticipated contract that the entity can specifically identify, the costs generate or enhance resources of the entity that will be used in satisfying performance obligations in the future and the costs are expected to be recovered. In addition to direct labor and materials to fulfill a contract or anticipated contract, we exercise judgment in determining which costs are allocated, including allocations of contract management and depreciation of tooling used to fulfill the contract. Additionally, overall contract profitability is estimated in determining cost recoverability.

Income Taxes

Deferred income tax assets and liabilities are determined based on the estimated future tax effects of differences between the financial reporting and tax bases of assets and liabilities, applying currently enacted tax rates in effect for the year in which we expect the differences will reverse. We periodically assess the likelihood that we will be able to recover our deferred tax assets and reflect any changes to our estimate of the amount we are more likely than not to realize as a valuation allowance, with a corresponding adjustment to earnings or other comprehensive income (loss), as appropriate. The ultimate realization of deferred tax assets depends on the generation of future taxable income (including the reversals of deferred tax liabilities) during the periods in which those deferred tax assets will become deductible.

The Company assesses all available positive and negative evidence regarding the realizability of its deferred tax assets. Significant judgment is required in assessing the need for any valuation allowance recorded against deferred tax assets. In assessing the need for a valuation allowance, we consider all available evidence, both positive and

negative, including the future reversal of existing taxable temporary differences, taxable income in carryback periods, prudent and feasible tax planning strategies, estimated future taxable income, and whether we have a recent history of losses. The valuation allowance can be affected by changes to tax regulations, interpretations and rulings, changes to enacted statutory tax rates, and changes to future taxable income estimates.

Our effective tax rate reflects the impact of certain undistributed foreign earnings for which we have not provided U.S. taxes because these earnings are considered indefinitely reinvested outside of the U.S. We plan foreign earnings remittance amounts based on projected cash flow needs, as well as the working capital and long-term investment requirements of our foreign subsidiaries and our domestic operations. Based on these assumptions, we estimate the amount we will distribute to the U.S. and accrue U.S. and foreign taxes on these planned foreign remittance amounts. Material changes in our estimates of cash, working capital and long-term investment requirements in the various jurisdictions in which we do business could impact our effective tax rate. Our provision for income taxes could be adversely impacted by changes in our geographic mix of earnings or changes in the enacted tax rates in the jurisdictions in which we conduct our business.

The calculation of our deferred and other tax balances involves significant management judgment when dealing with uncertainties in the application of complex tax regulations and rulings in a multitude of taxing jurisdictions across our global operations. The Company is routinely audited by U.S. federal, state and foreign tax authorities, the results of which could result in proposed assessments against the Company. We recognize potential liabilities and record tax liabilities for anticipated tax audit issues based on our estimate of whether, and to the extent to which, additional taxes will be due. Furthermore, we recognize the tax benefit from an uncertain tax position only if it is more likely than not that the tax position will be sustained on examination by the taxing authorities, based on the technical merits of the position in consideration of applicable tax statutes and related interpretations and precedents and the expected outcome of the proceedings (or negotiations) with the taxing authorities. Tax benefits recognized in the financial statements from such a position are measured based on the largest benefit that has a greater than 50% likelihood of being realized on ultimate settlement.

We adjust our liability for uncertain tax positions in light of changing facts and circumstances; however, the ultimate resolution of a tax examination may differ from the amounts recorded in the financial statements for a number of reasons, including the Company's decision to settle rather than litigate a matter, relevant legal precedent related to similar matters, and the Company's success in supporting its filing positions with the tax authorities. If our estimate of tax liabilities proves different than the ultimate outcome, such differences will affect the provision for income taxes in the period in which such determination is made.

Goodwill and Other Intangible Assets

We review goodwill and indefinite-lived intangible assets for impairment annually and whenever events or changes in circumstances indicate the carrying value of an asset may not be recoverable. We also review the carrying value of our finite-lived intangible assets for potential impairment when impairment indicators arise. We conduct our annual impairment tests as of the first day of the fourth quarter. When reviewing for impairment, we may opt to make an initial qualitative evaluation, which considers present events and circumstances, to determine the likelihood of impairment. Our decision to perform a qualitative impairment assessment for an individual reporting unit in a given year is influenced by a number of factors, including the significance of the excess of the reporting unit's estimated fair value over carrying value at the last quantitative assessment date, changes in macroeconomic, industry and reporting-unit specific conditions and the amount of time in between quantitative fair value measurements. If the likelihood of impairment is not considered to be more likely than not, then no further testing is performed.

In cases when we opt not to perform a qualitative evaluation or the qualitative evaluation indicates that the likelihood of impairment is more likely than not, we then perform a two-step quantitative impairment test for goodwill. We test each reporting unit for goodwill impairment quantitatively at a minimum of once every three years. In the first step, we compare the estimated fair value of each reporting unit to its carrying value. If the estimated fair value of the reporting unit exceeds the carrying value of the net assets assigned to that reporting unit, goodwill is not impaired and we are not required to perform further testing. If the carrying value of the net assets assigned to the reporting unit exceeds its fair value, then we must perform the second step of the impairment test in order to measure the impairment loss to be recorded, if any. If the carrying value of a reporting unit's goodwill exceeds its implied fair value, then we record an impairment loss equal to the difference. In our annual impairment test for indefinite-lived intangible assets, we compare the fair value of those assets to their carrying value. We recognize an impairment loss when the estimated fair value of the indefinite-lived intangible asset is less than its carrying value.

We estimate the fair value of our reporting units using an income approach. Under the income approach, we calculate fair value based on the present value of estimated future cash flows. We estimate the fair value of our indefinite-lived intangible assets using the relief from royalty method. The relief from royalty method estimates the portion of a company's earnings attributable to an intellectual property asset based on an assumed royalty rate that the company would have paid had the asset not been owned.

Determining the fair value of a reporting unit or an indefinite-lived intangible asset is judgmental in nature and involves the use of significant estimates and assumptions, particularly related to future operating results and cash flows. These estimates and assumptions include, but are not limited to, revenue growth rates and operating margins used to calculate projected future cash flows, risk-adjusted discount rates, assumed royalty rates, future economic and market conditions and the identification of appropriate market comparable data. In addition, the identification of reporting units and the allocation of assets and liabilities to the reporting units when determining the carrying value of each reporting unit also requires judgment. Goodwill is tested for impairment at the reporting unit level, which, based on the applicable accounting guidance, is either the operating segment or one level below (e.g., the divisions of our Connect & Control Technology segment). The fair value of our reporting units and indefinite-lived intangible assets are based on estimates and assumptions that are believed to be reasonable. Significant changes to these estimates and assumptions could adversely impact our conclusions. Actual future results may differ from those estimates. Further, had different reporting units been identified or had different valuation techniques or assumptions been utilized, the results of our impairment tests could have resulted in an impairment loss, which could have been material.

See Note 12, Goodwill and Other Intangible Assets, net, to the Consolidated Financial Statements for more information.

Environmental Liabilities

We are subject to various federal, state, local, and foreign environmental laws and regulations that require environmental assessment or remediation efforts. Accruals for environmental exposures are recorded on a site-bysite basis when it is probable that a liability has been incurred and the amount of the liability can be reasonably estimated, based on current law and existing technologies. Significant judgment is required to determine both the likelihood of a loss and the estimated amount of loss. Engineering studies, probability techniques, historical experience and other factors are used to identify and evaluate remediation alternatives and their related costs in estimating our reserve for environmental liabilities. Our environmental reserve of \$61.9 at December 31, 2019, represents management's estimate of undiscounted costs expected to be incurred related to environmental assessment or remediation efforts, as well as related legal fees, without regard to potential recoveries from insurance companies or other third parties. Our estimated liability is reduced to reflect the participation of other potentially responsible parties in those instances where it is probable that such parties are legally responsible and financially capable of paying their respective share of the relevant costs and that share can be reasonably estimated. Our environmental accruals are reviewed and adjusted for progress of investigation and remediation efforts and as additional technical or legal information become available, such as the impact of negotiations with regulators and other potentially responsible parties, settlements, rulings, advice of legal counsel, and other current information.

We closely monitor our environmental responsibilities, together with trends in the environmental laws. Environmental remediation reserves are subject to numerous inherent uncertainties that affect our ability to estimate our share of the costs. Such uncertainties involve incomplete information regarding particular sites and other potentially responsible parties, uncertainty regarding the nature and extent of contamination at each site, the extent of remediation required under existing regulations, our share of any remediation liability, if any, widely varying cost estimates associated with potential alternative remedial approaches, the length of time required to remediate a particular site, the potential effects of continuing improvements in remediation technology, and changes in environmental standards and regulatory requirements. While environmental laws and regulations are subject to change, the nature of such change is inherently unpredictable and the timing of potential changes is uncertain. The effect of legislative or regulatory changes on environmental standards could be material to the Company's financial statements. Additionally, violations by us of such laws and regulations, discovery of previously unknown or more extensive contamination, litigation involving environmental impacts, our inability to recover costs associated with any such developments, or financial insolvency of other potentially responsible parties could have a material adverse effect on our financial statements.

Although it is not possible to predict with certainty the ultimate costs of environmental remediation, the reasonably possible high-end range of our estimated environmental liability at December 31, 2019 was \$108.4.

Recent Accounting Pronouncements

See Note 2, Recent Accounting Pronouncements, to the Consolidated Financial Statements for a complete discussion of recent accounting pronouncements.

ITEM 7A. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

As a result of our global operating and financing activities, we are exposed to market risks from changes in foreign currency exchange rates, interest rates, and commodity prices, which may adversely affect our operating results and financial position. The impact from changes in market conditions is generally minimized through our normal operating and financing activities. However, we may use derivative instruments, primarily forward contracts, interest rate swaps and futures contracts, to manage some of these exposures. We do not use derivative financial instruments for trading or other speculative purposes. To minimize the risk of counterparty non-performance, derivative instruments are entered into with major financial institutions and there is no significant concentration with any one counterparty.

Foreign Currency Exchange Rate Exposures

Our foreign currency exchange rate risk relates to receipts from customers, payments to suppliers and intercompany transactions denominated in foreign currencies. Our principal currency exposures relate to the Euro, Mexican peso, Polish zloty, South Korean won, Chinese renminbi, and the Czech koruna. Based on a sensitivity analysis at December 31, 2019, a hypothetical 10% change in the foreign currency exchange rates for the year ended December 31, 2019 would have resulted in translation impact to our pre-tax earnings of approximately \$27, due primarily to the Euro. This calculation assumes that all currencies change in the same direction and proportion relative to the U.S. dollar and that there are no indirect effects, such as changes in non-U.S. dollar sales volumes or prices. This calculation does not take into account the impact of the foreign currency forward exchange contracts discussed above and we did not have any such contracts in place as of December 31, 2019.

Interest Rate Exposures

As of December 31, 2019, our outstanding variable rate debt was \$84.2. We estimate that a hypothetical increase in interest rates of 100 basis points would result in approximately \$1 of additional annual interest expense based on current borrowing levels.

Commodity Price Exposures

Portions of our business are exposed to volatility in the prices of certain commodities, such as steel, gold, copper, nickel, iron, aluminum, tin, and rubber as well as specialty alloys, including titanium that we purchase in the raw form, or that are used in purchased component parts. The prices of these and other commodities may also be impacted by tariffs. When practical, we attempt to control such costs through fixed-price contracts with suppliers; however, we are prone to exposure as these contracts expire. We evaluate hedging opportunities to mitigate or minimize the risk of operating margin erosion resulting from the volatility of commodity prices. Assuming all other variables remain constant, we estimate that a hypothetical 10% change in steel prices, excluding any impact of purchased component parts, would impact pre-tax earnings by approximately \$6 to \$8. We estimate that a hypothetical 10% change in prices for any other commodity would not be material to our financial statements.

ITEM 8. FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA

See Index to Consolidated Financial Statements herein.

ITEM 9. CHANGES IN AND DISAGREEMENTS WITH ACCOUNTANTS ON ACCOUNTING AND FINANCIAL DISCLOSURE

None.

ITEM 9A. CONTROLS AND PROCEDURES

Attached as exhibits to this Annual Report on Form 10-K are certifications of the Company's Chief Executive Officer (CEO) and Chief Financial Officer (CFO), which are required in accordance with Rule 13a-14 under the Exchange Act, as amended.

(a) Evaluation of Disclosure Controls and Procedures

The Company, with the participation of various levels of management, including the CEO and CFO, conducted an evaluation of effectiveness of the design and operation of our disclosure controls and procedures (as defined in Rules 13a-15(e) and 15d-15(e) of the Exchange Act) as of December 31, 2019. Based on such evaluation, such officers have concluded that, as of the end of the period covered by this report, the Company's disclosure controls and procedures are effective.

The Company's Disclosure Committee has the responsibility of considering and evaluating the materiality of information and reviewing disclosure obligations on a timely basis. The Disclosure Committee meets regularly and assists the CEO and the CFO in designing, establishing, reviewing, and evaluating the Company's disclosure controls and procedures.

(b) Management's Report on Internal Control Over Financial Reporting

The Company's management is responsible for establishing and maintaining adequate internal control over financial reporting as defined in Rules 13a-15(f) and 15d-15(f) under the Exchange Act. The 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 accounting principles generally accepted in the United States of America.

Internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, completely, accurately and fairly reflect the transactions and dispositions of the Company's assets; (ii) provide reasonable assurance that transactions are recorded as necessary to permit preparation of the financial statements in accordance with accounting principles generally accepted in the United States of America; (iii) provide reasonable assurance that Company receipts and expenditures are made only in accordance with the authorization of management and the directors of the Company, and (iv) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use or disposition of assets that could have a material effect on the Consolidated Financial Statements. Internal control over financial reporting includes the controls themselves, monitoring and internal auditing practices, and actions taken to correct any identified deficiencies.

Management assessed the effectiveness of the Company's internal control over financial reporting as of December 31, 2019. Management based this assessment on criteria for effective internal control over financial reporting described in the 2013 "Internal Control — Integrated Framework" released by the Committee of Sponsoring Organizations (COSO) of the Treadway Commission. Management's assessment included an evaluation of the design of the Company's internal control over financial reporting and testing of the operational effectiveness of its internal control over financial reporting. Management reviewed the results of its assessment with the Audit Committee of our Board of Directors. Based on this assessment, management determined that, as of December 31, 2019, the Company maintained effective internal control over financial reporting.

For purposes of evaluating internal controls over financial reporting, management determined that the internal controls of Rheinhütte Pumpen Group (Rheinhütte) and Matrix Composites, Inc. (Matrix), which the Company acquired in 2019, would be excluded from the internal control assessment as of December 31, 2019, due to the timing of the closing of these acquisitions and as permitted by the rules and regulations of the SEC. For the year ended December 31, 2019, Rheinhütte and Matrix collectively constituted 3.5% of total assets and 1.9% of total revenues of the Company.

The Company's management, including the CEO and the CFO, does not expect that our internal control over financial reporting, because of inherent limitations, will prevent or detect all errors and all fraud. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may be inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Management's assessment, included herein, should be read in conjunction with the certifications and the report issued by Deloitte & Touche LLP, an independent registered public accounting firm, as stated in their report, which appears subsequent to Item 9B in this Annual Report on Form 10-K.

(c) Changes in Internal Control over Financial Reporting

During the three months ended December 31, 2019, no change occurred in our internal control over financial reporting that materially affected, or is reasonably likely to materially affect, our internal control over financial reporting.

ITEM 9B. OTHER INFORMATION

Disclosure pursuant to Section 219 of the Iran Threat Reduction & Syria Human Rights Act (ITRA)

This disclosure is made pursuant to Section 219 of the Iran Threat Reduction and Syria Human Rights Act of 2012 which added subsection (r) to Section 13 of the Exchange Act (Section 13(r)). Section 13(r) requires an issuer to disclose in its annual or quarterly reports whether it or any of its affiliates have knowingly engaged in certain activities, transactions or dealings relating to Iran. Disclosure of such activities, transactions or dealings is required even when conducted outside the United States by non-U.S. persons in compliance with applicable law, and whether or not such activities are sanctionable under U.S. law.

In its 2012 Annual Report, ITT described its acquisition of all the shares of Joh. Heinr. Bornemann GmbH (Bornemann) in November 2012, as well as certain activities of Bornemann in Iran and the wind down of those activities in accordance with a General License issued on December 26, 2012 (the General License) by the Office of Foreign Assets Control. As permitted by the General License, on or before March 8, 2013, Bornemann completed the wind-down activities and ceased all activities in Iran. As required to be disclosed by Section 13(r), the gross revenues and operating income to Bornemann from its Iranian activities subsequent to its acquisition by ITT were Euros 2.2 million and Euros 1.5 million, respectively. Prior to its acquisition by ITT, Bornemann issued a performance bond to its Iranian customer in the amount of Euros 1.3 million (the Bond). Bornemann requested that the Bond be canceled prior to March 8, 2013; however, the former customer refused this request and as a result the Bond remains outstanding. Bornemann did not receive gross revenues or operating income, or pay interest, with respect to the Bond in any subsequent periods through December 31, 2019, however, Bornemann did pay annual fees of approximately Euros 11 thousand in each of 2019, 2018 and 2017 to the German financial institution which is maintaining the Bond.

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Shareholders and the Board of Directors of ITT Inc.

Opinion on Internal Control over Financial Reporting

We have audited the internal control over financial reporting of ITT Inc. and subsidiaries (the "Company") as of December 31, 2019, 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 Company maintained, in all material respects, effective internal control over financial reporting as of December 31, 2019, based on criteria established in *Internal Control - Integrated Framework* (2013).

We have also audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (PCAOB), the consolidated financial statements as of and for the year ended December 31, 2019, and the related notes (collectively the "financial statements") of the Company and our report dated February 21, 2020, expressed an unqualified opinion on those financial statements.

As described in Management's Report on Internal Control Over Financial Reporting, management excluded from its assessment the internal control over financial reporting at Rheinhütte Pumpen Group ("Rheinhütte") and Matrix Composites, Inc. ("Matrix"), which were acquired on April 30, 2019 and July 3, 2019 respectively. The financial statements of these acquisitions constitute 2.67% and 0.86%, respectively, of total assets and 1.53% and 0.34%, respectively, of total revenues of the consolidated financial statement amounts as of and for the year ended December 31, 2019. Accordingly, our audit did not include the internal control over financial reporting at Rheinhütte and Matrix.

Basis for Opinion

The Company's management is responsible for maintaining effective internal control over financial reporting and for its assessment of the effectiveness of internal control over financial reporting, included in the accompanying Management's Report on Internal Control Over Financial Reporting. Our responsibility is to express an opinion on the Company's internal control over financial reporting based on our audit. We are a public accounting firm registered with the 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 audit in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether effective internal control over financial reporting was maintained in all material respects. Our audit included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, testing and evaluating the design and operating effectiveness of internal control based on the assessed risk, and performing such other procedures as we considered necessary in the circumstances. We believe that our audit provides a reasonable basis for our opinion.

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 (1) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (2) 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 (3) 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.

/s/ Deloitte & Touche LLP Stamford, Connecticut February 21, 2020

PART III

ITEM 10. DIRECTORS, EXECUTIVE OFFICERS AND CORPORATE GOVERNANCE

Information required by this Item 10 is incorporated by reference from the information provided under the sections entitled "Voting Items," "How to Vote," "Election of Directors (Proxy Item No. 1)," "Corporate Governance and Related Matters-Overview of Committees-Audit Committee" and "Audit Committee Report" in our Proxy Statement for the 2020 Annual Meeting of Shareholders (2020 Proxy Statement).

Information required by this Item 10 with respect to executive officers of the Company is contained under the heading "Executive Officers of the Registrant" in Part I of this Annual Report on Form 10-K.

ITT has adopted corporate governance principles and charters for each of its standing committees. The principles address director qualification standards and responsibilities, access to management and independent advisors, compensation, orientation and continuing education, management succession principles and board and committee self-evaluation. The corporate governance principles and charters are available on the Company's website at www.itt.com/investors/governance/. A copy of the corporate governance principles and charters is also available to any shareholder who requests a copy from the Company's secretary.

ITT has also adopted a written code of ethics, the "Code of Conduct," which is applicable to all directors, employees and officers (including the Company's principal executive officer, principal financial officer, principal accounting officer or controller, or person performing similar functions). The Company's Code of Conduct is available on our website at www.itt.com. We intend to satisfy the disclosure requirement under Item 5.05 of Form 8-K regarding an amendment to, or waiver from, a provision of our Code of Conduct by posting such information on our website at www.itt.com.

Pursuant to New York Stock Exchange (NYSE) Listing Company Manual Section 303A.12(a), the Company submitted a Section 12(a) CEO Certification to the NYSE in 2019. The Company also filed with the SEC, as exhibits to the Company's current Annual Report on Form 10-K, the certifications required under Section 302 of the Sarbanes-Oxley Act for its Chief Executive Officer and Chief Financial Officer.

ITEM 11. EXECUTIVE COMPENSATION

Information required by this Item 11 is incorporated by reference to the discussion under the headings "2019 Non-Management Director Compensation," "Compensation Tables," "Compensation Discussion and Analysis," "Compensation and Personnel Committee Report" and "Corporate Governance and Related Matters-Compensation Committee Interlocks and Insider Participation" in our 2020 Proxy Statement.

ITEM 12. SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT AND RELATED STOCKHOLDER MATTERS

Information required by this Item 12 is incorporated by reference to the discussion under the caption "Other Matters - Stock Ownership of Directors, Executive Officers, and Certain Shareholders," and "Equity Compensation Plan Information" in our 2020 Proxy Statement.

ITEM 13. CERTAIN RELATIONSHIPS AND RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE

Information required by this item is incorporated by reference to the discussions under the captions "Corporate Governance and Related Matters-Policies for Approving Related Party Transactions" and "Corporate Governance and Related Matters-Director Independence" in our 2020 Proxy Statement.

ITEM 14. PRINCIPAL ACCOUNTING FEES AND SERVICES

Information about the fees for 2019 and 2018 for professional services rendered by our independent registered public accounting firm is incorporated by reference to the discussion under the heading "Ratification of Appointment of the Independent Registered Public Accounting Firm (Proxy Item No. 2)" of our 2020 Proxy Statement. Our Audit Committee's policy on pre-approval of audit and permissible non-audit services of our independent registered public accounting firm is also incorporated by reference to the discussion under the heading "Ratification of Appointment of the Independent Registered Public Accounting Firm (Proxy Item No. 2)" of our 2020 Proxy Statement.

PART IV

ITEM 15. EXHIBITS AND FINANCIAL STATEMENT SCHEDULES

- (a) Documents filed as a part of this report:
 - 1. See Index to Consolidated Financial Statements appearing on page 51 for a list of the financial statements filed as a part of this report.
 - 2. See Exhibit Index on page II-1 for a list of the exhibits filed or incorporated herein as a part of this report.
- (b) Financial Statement Schedules are omitted because of the absence of the conditions under which they are required or because the required information is included in the Consolidated Financial Statements filed as part of this report.

ITEM 16. FORM 10-K SUMMARY

Not Applicable.

INDEX TO CONSOLIDATED FINANCIAL STATEMENTS

ITEM	PAGE
Report of Independent Registered Public Accounting Firm	52
Consolidated Statements of Operations for the years ended December 31, 2019, 2018 and 2017	55
Consolidated Statements of Comprehensive Income for the years ended December 31, 2019, 2018 and 2017	56
Consolidated Balance Sheets as of December 31, 2019 and 2018	57
Consolidated Statements of Cash Flows for the years ended December 31, 2019, 2018 and 2017	58
Consolidated Statements of Changes in Shareholders' Equity for the years ended December 31, 2019, 2018 and 2017	59
Notes to the Consolidated Financial Statements:	60
Note 1 – Description of Business, Basis of Presentation and Summary of Significant Accounting Policies	60
Note 2 – Recent Accounting Pronouncements	67
Note 3 – Segment Information	69
Note 4 – Revenue	71
Note 5 – Restructuring Actions	72
Note 6 – Income Taxes	73
Note 7 – Earnings Per Share Data	77
Note 8 – Receivables, Net	78
Note 9 – Inventories, Net	78
Note 10 – Other Current and Non-Current Assets	78
Note 11 – Plant, Property and Equipment, Net	79
Note 12 – Goodwill and Other Intangible Assets, Net	79
Note 13 – Accrued Liabilities and Other Non-Current Liabilities	80
Note 14 – Leases	81
Note 15 – Debt	81
Note 16 – Postretirement Benefit Plans	82
Note 17 – Long-Term Incentive Employee Compensation	89
Note 18 – Capital Stock	91
Note 19 – Accumulated Other Comprehensive Loss	92
Note 20 – Commitments and Contingencies	92
Note 21 – Guarantees, Indemnities and Warranties	96
Note 22 – Acquisitions	97
Supplemental Financial Data:	
Selected Quarterly Financial Data (Unaudited)	98

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Shareholders and the Board of Directors of ITT Inc.

Opinion on the Financial Statements

We have audited the accompanying consolidated balance sheets of ITT Inc. and subsidiaries (the "Company") as of December 31, 2019 and 2018, the related consolidated statements of operations, comprehensive income, Shareholders' equity, and cash flows, for each of the three years in the period ended December 31, 2019, and the related notes (collectively referred to as the "financial statements"). In our opinion, the financial statements present fairly, in all material respects, the financial position of the Company as of December 31, 2019 and 2018, and the results of its operations and its cash flows for each of the three years in the period ended December 31, 2019, in conformity with accounting principles generally accepted in the United States of America.

We have also audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (PCAOB), the Company's internal control over financial reporting as of December 31, 2019, based on criteria established in *Internal Control - Integrated Framework (2013)* issued by the Committee of Sponsoring Organizations of the Treadway Commission and our report dated February 21, 2020, expressed an unqualified opinion on the Company's internal control over financial reporting.

Basis for Opinion

These financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on the Company's financial statements based on our audits. We are a public accounting firm registered with the 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 audit to obtain reasonable assurance about whether the financial statements are free of material misstatement, whether due to error or fraud. Our audits included performing procedures to assess the risks of material misstatement of the 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 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 financial statements. We believe that our audits provide a reasonable basis for our opinion.

Critical Audit Matters

The critical audit matters communicated below are matters arising from the current-period audit of the financial statements that were communicated or required to be communicated to the audit committee and that (1) relate to accounts or disclosures that are material to the financial statements and (2) involved our especially challenging, subjective, or complex judgments. The communication of critical audit matters does not alter in any way our opinion on the financial statements, taken as a whole, and we are not, by communicating the critical audit matters below, providing separate opinions on the critical audit matters or on the accounts or disclosures to which they relate.

Asbestos-related liabilities and Accrued liabilities - Refer to Note 20 to the financial statements

The Company has been sued in product liability lawsuits alleging damages for personal injury arising from exposure to asbestos from component parts of certain products sold or distributed by various defendants, including certain ITT Inc.'s subsidiaries. The Company engages a third-party consulting firm with extensive experience in assessing asbestos related liabilities to assist management in its estimate of the potential undiscounted liability for pending and future asbestos related claims. The Company then records an estimated liability related to pending claims and claims estimated to be filed for which they believe it is probable and for which they can reasonably estimate. This estimate requires management to make significant estimates and assumptions related to the number of claims to be filed, claims to be adjudicated, disease type, settlement values, external factors, and the period to which the Company can reasonably estimate the liability. The Company has disclosed that due to the variables and uncertainties inherent in the long-term projection that it is probable it will incur additional costs for asbestos claims filed beyond the next 10 years that may be material but does not believe there is a reasonable basis for estimating those costs. The current and non-current liability as of December 31, 2019 was \$86.0 million and \$731.6 million, respectively.

We identified the liability of future asbestos related claims as a critical audit matter given the key assumptions involve subjectivity which requires a high degree of auditor judgment and an increased extent of effort, including the need to

involve our actuarial specialists, when performing audit procedures to evaluate whether the asbestos related liabilities were appropriately recorded as of December 31, 2019.

Our audit procedures related to the asbestos liability included the following, among others:

- We tested the effectiveness of controls over the liability estimate, including the assumptions selected for use in the Company's third-party consulting firm's model utilized to estimate the undiscounted cost of pending and future asbestos related claims.
- We assessed the qualifications, experience, and objectivity of management's third-party consultant.
- We tested the underlying historical data that served as the basis for the actuarial analysis, for accuracy and completeness of disease type, actual settlement values, and case status.
- We evaluated the period management used to project the future liability for pending and future asbestos claims by analyzing the volatility of Company specific historical claims experience since 2010 and comparing Company specific claims experience to the expected claims experience per published industry data to assess whether there was evidence of any long-term Company specific trends that would be potentially contradictory to the Company's assumption, compared the estimation period to other companies with a similar liability exposure, and considered the impact of changes in the legal and regulatory environment on management's assumptions.
- With the assistance of our actuarial specialists that have experience in the area of asbestos-related reserves, we
 assessed the reasonableness of the valuation methodology, significant assumptions, and the computation of the
 liability estimate by the third-party consulting firm.

Asbestos-related assets and Other current assets - Refer to Note 20 to the financial statements

The Company has a number of primary and excess insurance policies from several insurers which were in place during the timeframe that the alleged asbestos exposure occurred. The Company has negotiated with certain of its excess insurers to reimburse the Company for a portion of its settlement and/or defense costs as incurred, frequently referred to as "coverage-in-place" agreements. Under coverage-in-place agreements, an insurer's policies remain in force and the insurer undertakes to provide coverage for the Company's present and future asbestos claims on specified terms and conditions that address, among other things, the share of asbestos claims costs to be paid by the insurer, payment terms, claims handling procedures and the expiration of the insurer's obligations. The Company has entered into policy buyout agreements with certain insurers confirming the aggregate amount of available coverage under the subject policies and setting forth a schedule for future payments to a Qualified Settlement Fund, to be disbursed for future asbestos costs. The Company retains a consulting firm to assist management in estimating probable insurance recoveries related to pending asbestos claims and claims estimated to be filed over the next 10 years. The current and non-current asset as of December 31, 2019 was \$67.2 million and \$319.6 million, respectively. As of December 31, 2019, the Company has entered into coverage-in-place agreements and policy buyout agreements representing approximately 57% of the recorded asset. The remaining part of the Company's insurance receivable is estimated for each insurance carrier or policy based on the following significant assumptions 1) expected levels of future cost recovery, 2) the financial viability of the insurance companies, 3) the method by which losses will be allocated to the various insurance policies and the years covered by those policies, 4) the extent to which settlement and defense costs will be reimbursed by the insurance policies, and 5) interpretation of the various policy and contract terms and limits and its interrelationships.

We identified the asbestos-related insurance recoveries from insurance policies that do not have coverage-in-place or buyout agreements as a critical audit matter given the significant assumptions to determine the recoveries require a high degree of auditor judgment and an increased extent of effort, including the need to involve our actuarial specialists, when performing audit procedures to evaluate whether the asbestos related assets were appropriately recorded as of December 31, 2019.

Our audit procedures related to the assumptions used to estimate insurance recoveries related to asbestos liabilities included the following, among others:

- We tested the effectiveness of controls, including those over the assumptions selected for use in the Company's third-party consultant's model for estimated recoveries.
- We assessed the qualifications, experience, and objectivity of management's third-party consultant.
- We tested the insurance policies for existence and coverage amounts.
- We evaluated the financial viability of insurance companies by reviewing available public external credit ratings.
- With the assistance of our actuarial specialists that have experience in the area of asbestos-related assets, we evaluated the reasonableness of management's selected recovery percentage based upon existing insurance policies by (1) reading the underlying insurance policies (2) considering the impact of recent legal precedents (3) evaluating changes in assumptions or other factors from the prior year and (4) recalculating the allocation of the

asbestos losses to estimate the insurance recoveries.

- We obtained correspondence from and made inquiries of the Company's external legal counsel regarding their assessment of each insurance policy and the range of expected recovery.
- We compared cash collections in 2019 to the Company's prior year estimated recoveries.

/s/ Deloitte & Touche LLP Stamford, Connecticut February 21, 2020 We have served as the Company's auditor since 2002.

CONSOLIDATED STATEMENTS OF OPERATIONS

(IN MILLIONS, EXCEPT PER SHARE AMOUNTS) YEARS ENDED DECEMBER 31		2019		2018		2017
Revenue	\$ 1	2,846.4	\$ 1	2,745.1	\$	2,585.3
Costs of revenue		1,936.3		1,857.9		1,765.4
Gross profit		910.1		887.2		819.9
General and administrative expenses		254.1		259.1		258.4
Sales and marketing expenses		165.9		168.2		169.5
Research and development expenses		97.9		98.4		93.5
Loss (gain) on sale or disposal of long-lived assets		1.0		(40.7)		(0.9)
Asbestos-related (benefit) cost, net		(20.2)		4.9		(19.9)
Operating income		411.4		397.3		319.3
Interest and non-operating (income) expenses, net		(3.0)		6.3		9.9
Income from continuing operations before income tax		414.4		391.0		309.4
Income tax expense		89.9		57.7		194.6
Income from continuing operations		324.5		333.3		114.8
Income (loss) from discontinued operations, including tax benefit (expense) of \$0.6, \$(0.3), and \$1.9, respectively		1.7		1.3		(1.5)
Net income		326.2		334.6		113.3
Less: Income (loss) attributable to noncontrolling interests		1.1		0.9		(0.2)
Net income attributable to ITT Inc.	\$	325.1	\$	333.7	\$	113.5
Amounts attributable to ITT Inc.:						
Income from continuing operations, net of tax	\$	323.4	\$	332.4	\$	115.0
Income (loss) from discontinued operations, net of tax		1.7		1.3		(1.5)
Net income	\$	325.1	\$	333.7	\$	113.5
Earnings (loss) per share attributable to ITT Inc.:						
Basic earnings per share:	¢	2 60	¢	2 70	¢	1.20
Continuing operations	\$	3.69	\$	3.79	\$	1.30
Discontinued operations		0.02		0.02		(0.01)
Net income	\$	3.71	\$	3.81	\$	1.29
Diluted earnings per share:	•		•	0.75	•	4 00
Continuing operations	\$	3.65	\$	3.75	\$	1.29
Discontinued operations		0.02	•	0.01	•	(0.01)
Net income	\$	3.67	\$	3.76	\$	1.28
Weighted average common shares – basic		87.7		87.7		88.3
Weighted average common shares – diluted		88.6		88.7		89.0

The accompanying Notes to the Consolidated Financial Statements are an integral part of the above statements of operations.

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME

(IN MILLIONS) YEARS ENDED DECEMBER 31	2019	2018	2017
Net income	\$ 326.2	\$ 334.6	\$ 113.3
Other comprehensive (loss) income:			
Net foreign currency translation adjustment	(8.1)	(33.3)	95.4
Net change in postretirement benefit plans, net of tax impacts of \$0.2, \$(1.6), and \$(5.5), respectively	(1.7)	6.0	7.6
Other comprehensive (loss) income	(9.8)	(27.3)	103.0
Comprehensive income	316.4	307.3	216.3
Less: Comprehensive income (loss) attributable to noncontrolling interests	1.1	0.9	(0.2)
Comprehensive income attributable to ITT Inc.	\$ 315.3	\$ 306.4	\$ 216.5
Disclosure of reclassification adjustments and other adjustments to postretirement benefit plans (See Note 16)			
Reclassification adjustments:			
Amortization of prior service benefit, net of tax expense of \$1.0, \$1.1, and \$1.8, respectively	\$ (3.4)	\$ (3.3)	\$ (3.0)
Amortization of net actuarial loss, net of tax benefit of \$(1.8), \$(2.4), and \$(4.1), respectively	5.6	7.4	7.9
Loss on plan curtailment, net of tax benefit of \$0.0, \$0.0, and \$(1.4), respectively	_	_	2.3
Loss on plan settlement, net of tax benefit of \$0.0, \$(0.4), and \$0.0, respectively	_	1.3	_
Other adjustments:			
Prior service cost, net of tax benefit (expense) of \$0.4, (\$0.1), and \$0.8, respectively	(1.3)	_	(1.3)
Net actuarial (loss) gain, net of tax benefit (expense) of \$0.6, \$0.2, and \$(2.6), respectively	(2.9)	(0.4)	4.6
Unrealized change from foreign currency translation	0.3	1.0	(2.9)
Net change in postretirement benefit plans, net of tax	\$ (1.7)	\$ 6.0	\$ 7.6

The accompanying Notes to the Consolidated Financial Statements are an integral part of the statements of comprehensive income.

CONSOLIDATED BALANCE SHEETS

(IN MILLIONS, EXCEPT PER SHARE AMOUNTS) DECEMBER 31	2019	2018
Assets		
Current assets:		
Cash and cash equivalents	\$ 612.1	\$ 561.2
Receivables, net	578.4	540.0
Inventories, net	392.9	380.5
Other current assets	153.4	163.4
Total current assets	1,736.8	1,645.1
Plant, property and equipment, net	531.5	518.8
Goodwill	927.2	875.9
Other intangible assets, net	138.0	136.1
Asbestos-related assets	319.6	309.6
Deferred income taxes	138.1	164.5
Other non-current assets	316.5	196.8
Total non-current assets	2,370.9	2,201.7
Total assets	\$ 4,107.7	\$ 3,846.8
Liabilities and Shareholders' Equity		
Current liabilities:		
Commercial paper and current maturities of long-term debt	\$ 86.5	\$ 116.2
Accounts payable	332.4	339.2
Accrued liabilities	430.8	416.7
Total current liabilities	849.7	872.1
Asbestos-related liabilities	731.6	775.1
Postretirement benefits	213.9	208.2
Other non-current liabilities	234.7	166.5
Total non-current liabilities	1,180.2	1,149.8
Total liabilities	2,029.9	2,021.9
Shareholders' equity:		
Common stock:		
Authorized – 250.0 shares, \$1 par value per share		
Issued and Outstanding – 87.8 and 87.6 shares, respectively	87.8	87.6
Retained earnings	2,372.4	2,110.3
Accumulated other comprehensive loss:		
Postretirement benefit plans	(133.3)	(131.6)
Cumulative translation adjustments	(252.0)	(243.9)
Total ITT Inc. shareholders' equity	2,074.9	1,822.4
Noncontrolling interests	2.9	2.5
Total shareholders' equity	2,077.8	1,824.9
Total liabilities and shareholders' equity	\$ 4,107.7	\$ 3,846.8

The accompanying Notes to the Consolidated Financial Statements are an integral part of the above balance sheets.

CONSOLIDATED STATEMENTS OF CASH FLOWS

Asbestos-related (benefit) cost, net (20.2) 4.9 (19.9) Deferred income tax expense (benefit) 30.9 (14.7) 147.0 Other non-cash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.6) (40.8) (45.3) Contributions to postretirement plans (22.9) (11.2) (45.0) Change in receivables (40.6) (2.7) (59.3) Change in contract liabilities: (51.1) 0.1 - Change in contract liabilities (51.1) 0.1 - Change in accounts payable (19.9) (4.2) 16.8 Change in accounts payable (11.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) (22.0) Investing Activities (91.4) (95.5) (11.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) - (113.7)	(IN MILLIONS) YEARS ENDED DECEMBER 31	2019	2018	2017
Adjustments to income from continuing operations Depreciation and amortization 113.4 109.4 105.3 Equity-based compensation 15.7 21.6 18.1 Loss (gain) on sale or disposal of long-lived assets 1.0 (40.7) (0.9) Absetsot-related (benefit) cost, net (22.2) 4.9 (19.9) Deferred income tax expense (benefit) 30.9 (14.7) 114.7 Other non-cash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.6) (40.6) (45.3) Change in receivables (40.6) (13.3) (14.2) Change in accounts payable (5.1) 0.1 Change in accounts payable (14.7) 5.7 17.2 Change in accounts payable (14.1) (22.0) (22.0) Change in accounts payable (14.1) (14.4) (14.8) Other, net 357.7 371.8 247.2 Investing Activities 0.9 43.2 3.8 Capital expenditures 0.9 43.2	Operating Activities			
Depreciation and amortization 113.4 109.4 105.3 Equity-based compensation 15.7 21.6 18.1 Loss (gain) on sale or disposal of long-lived assets 1.0 (40.7) (0.9) Absestos-related (benefit) cost, net (20.2) 4.9 (19.9) Deferred income tax exponses (benefit) 30.9 (14.7) 147.0 Other non-cash charges, net (38.8) 13.8 20.8 Asbestos-related payments, net (22.9) (11.2) (45.0) Change in inventories (40.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in contract liabilities (5.1) 0.1 Change in accound spayable (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Capital expenditures (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions	Income from continuing operations attributable to ITT Inc.	\$ 323.4	\$ 332.4	\$ 115.0
Equity-based compensation 15.7 21.6 18.1 Loss (gain) on sale or disposal of long-lived assets 1.0 (40.7) (0.9) Asbestos-related (benefit) 30.9 (14.7) 147.0 Other non-cash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.5) (40.8) (45.3) Charge in receivables (20.6) (2.7) (59.3) Charge in receivables (20.6) (13.3) 14.2 Charge in accounts payable (1.9) (4.2) 16.8 Charge in accounts payable (1.9) (4.2) 16.3 Investing Activities	Adjustments to income from continuing operations			
Loss (gain) on sale or disposal of long-lived assets 1.0 (40.7) (0.9) Asbestos-related (benefit) cost, net (20.2) 4.9 (19.9) Deferred income tax expense (benefit) 30.9 (14.7) 147.0 Other non-cash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.6) (40.8) (45.3) Change in receivables (40.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in contract assets 2.7 19.1 Change in contract assets (5.1) 0.1 Change in accounds payable (1.9) (4.2) 6.8 Change in accound payeneses (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Regular Activities 357.7 371.8 247.2 Investing Activities 0.2 - Captiat expenditures (91.4)	Depreciation and amortization	113.4	109.4	105.3
Asbeitos-related (benefit) cost, net (20.2) 4.9 (19.9) Deferred income tax expense (benefit) 30.3 (14.7) 147.0 Other non-ash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.6) (40.8) (45.3) Contributions to postretimem plans (22.9) (11.2) (45.0) Change in inventories (0.6) (2.7) (59.3) Change in inventories (0.6) (2.7) (59.3) Change in accruted expenses (1.17) 5.7 17.2 Change in accruted expenses (14.7) 5.7 17.2 Change in accruted expenses (14.17) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Capital expenditures (9.4) (95.5) (11.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) - (113.7) Chesth - Investing act	Equity-based compensation	15.7	21.6	18.1
Deferred income tax expense (benefit) 30.9 (14.7) 147.0 Other non-cash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.6) (40.8) (45.3) Contributions to postretirement plans (22.9) (11.2) (45.0) Change in receivables (40.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in contract assets 2.7 19.1 - Change in contract assets (5.1) 0.1 - Change in accrued expenses (14.7) 5.7 17.2 Change in accrued expenses (14.7) 5.7 17.2 Change in accrued expenses (14.7) 5.7 17.2 Change in accrued expenses (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Net Cash - Operating activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired <td>Loss (gain) on sale or disposal of long-lived assets</td> <td>1.0</td> <td>(40.7)</td> <td>(0.9)</td>	Loss (gain) on sale or disposal of long-lived assets	1.0	(40.7)	(0.9)
Other non-cash charges, net 38.8 13.8 20.8 Asbestos-related payments, net (21.6) (40.6) (45.3) Contributions to postretimem plans (22.9) (11.2) (45.0) Change in assets and liabilities: (0.6) (13.3) 14.2 Change in contract assets 2.7 19.1 - Change in contract assets 2.7 19.1 - Change in accrued expenses (14.7) 5.7 17.2 Change in income taxes (9.6) (14.4) (14.4) Other, net (31.0) (22.0) (22.0) Net Cash - Operating activities 357.7 371.8 247.2 Casha form sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) - (113.7) Other, net 0.2 - - - Net Cash - Investing activities (20.34) (52.3) (21.2) (22.32) Financing Activities (20.4) (52.3) (21.2) (23.2) (27.7)	Asbestos-related (benefit) cost, net	(20.2)	4.9	(19.9)
Asbestos-related payments, net (21.6) (40.8) (45.3) Contributions to postretirement plans (22.9) (11.2) (45.0) Change in receivables (40.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in inventories (1.9) (4.2) 16.8 Change in contract labilities (5.1) 0.1 Change in accounts payable (1.9) (4.2) 16.8 Change in accrued expenses (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Investing Activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.7) Capital expenditures (91.4) (95.5) (113.7) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 - - Notterm revolving loans, repayments	Deferred income tax expense (benefit)	30.9	(14.7)	147.0
Contributions to posiretirement plans (22.9) (11.2) (45.0) Change in assets and liabilities: (0.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in inventories (0.6) (13.3) 14.2 Change in contract liabilities (5.1) 0.1 Change in accruet assets (1.9) (4.2) 16.8 Change in accrued expenses (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Net Cash - Operating activities 357.7 371.8 247.2 Investing Activities (9.6) (14.4) (14.8) Cher, net (0.2 - - Capital expenditures (9.4) (95.5) (113.3) Proceeds from sale of long-lived asets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) - (113.7) Other, net 0.2 - <td< td=""><td>Other non-cash charges, net</td><td>38.8</td><td>13.8</td><td>20.8</td></td<>	Other non-cash charges, net	38.8	13.8	20.8
Changes in assets and liabilities: (40.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in inventories (5.1) 0.1 Change in accounts payable (1.9) (4.2) 16.8 Change in accounts payable (1.9) (4.2) 16.8 Change in accounts payable (1.9) (4.2) 16.8 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Net Cash - Operating activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (11.3) Capital expenditures (91.4) (95.5) (11.3.7) Other, net 0.2 - - Net Cash - Investing activities (20.4) (52.3) (223.2) Financing Activities (27.2) (44.5) 48.9 Commercial paper, net (repayments) borrowings - 246.5 77.3 Short-term revolving loans, trepayments - 23.8 (17.7.3) Long-term debt, trepayments (3.2) <td>Asbestos-related payments, net</td> <td>(21.6)</td> <td>(40.8)</td> <td>(45.3)</td>	Asbestos-related payments, net	(21.6)	(40.8)	(45.3)
Change in receivables (40.6) (2.7) (59.3) Change in inventories (0.6) (13.3) 14.2 Change in contract liabilities 2.7 19.1 Change in contract liabilities (5.1) 0.1 Change in accrued expenses (1.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Net Cash - Operating activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceed5 from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (20.3) (27.2) (44.5) 48.9 Short-term revolving loans, borrowings (23.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, issued <td< td=""><td>Contributions to postretirement plans</td><td>(22.9)</td><td>(11.2)</td><td>(45.0)</td></td<>	Contributions to postretirement plans	(22.9)	(11.2)	(45.0)
Change in inventories (0.6) (13.3) 14.2 Change in contract labilities 2.7 19.1 Change in contract labilities (5.1) 0.1 Change in accounts payable (1.9) (4.2) 16.8 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Investing Activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (23.2) Commercial paper, net (repayments) borrowings (27.2) </td <td>Changes in assets and liabilities:</td> <td></td> <td></td> <td></td>	Changes in assets and liabilities:			
Change in inventories (0.6) (13.3) 14.2 Change in contract labilities 2.7 19.1 Change in contract labilities (5.1) 0.1 Change in accounts payable (1.9) (4.2) 16.8 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Investing Activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (23.2) Commercial paper, net (repayments) borrowings (27.2) </td <td>Change in receivables</td> <td>(40.6)</td> <td>(2.7)</td> <td>(59.3)</td>	Change in receivables	(40.6)	(2.7)	(59.3)
Change in contract lassets 2.7 19.1 Change in contract liabilities (5.1) 0.1 Change in accounts payable (1.9) (4.2) 16.8 Change in accounts payable (1.9) (4.2) 16.8 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Investing Activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 - Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (21.2) (44.5) 48.9 Short-term revolving loans, borrowings - 246.5 77.3 Short-term revolving loans, repayments - (23.2) (17.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) <t< td=""><td>Change in inventories</td><td>(0.6)</td><td>(13.3)</td><td></td></t<>	Change in inventories	(0.6)	(13.3)	
Change in accounts payable (1.9) (4.2) 16.8 Change in accoued expenses (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Investing Activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) - (113.7) Other, net 0.2 - - Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings - 246.5 77.3 Short-term revolving loans, repayments - (23.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Dividends paid (56.1) (32.9) (17.3) Dividends paid (56.1) (3	Change in contract assets	2.7		
Change in accounts payable (1.9) (4.2) 16.8 Change in accoued expenses (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Investing Activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) - (113.7) Other, net 0.2 - - Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings - 246.5 77.3 Short-term revolving loans, repayments - (23.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Dividends paid (56.1) (32.9) (17.3) Dividends paid (56.1) (3	Change in contract liabilities	(5.1)	0.1	_
Change in accrued expenses (14.7) 5.7 17.2 Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Net Cash – Operating activities 357.7 371.8 247.2 Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash – Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings 246.5 77.3 Short-term revolving loans, prayments 246.5 77.3 Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (23.8) (177.3) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock (41.4) (56.1) (32.9) Dividends paid <	-		(4.2)	16.8
Change in income taxes (9.6) 14.4 (14.8) Other, net (31.0) (22.0) (22.0) Net Cash – Operating activities 357.7 371.8 247.2 Investing Activities 357.7 371.8 247.2 Capital expenditures (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 - Net Cash – Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings - 246.5 77.3 Short-term revolving loans, repayments - (23.8) (177.3) Long-term debt, repayments (3.2) (2.7) (1.3) Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (5				17.2
Other, net (31.0) (22.0) (22.0) Net Cash – Operating activities 357.7 371.8 247.2 Investing Activities 691.4) (95.5) (113.3) Capital expenditures (91.4) (95.5) (113.7) Other, net 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings - 246.5 77.3 Short-term revolving loans, perpayments (246.5 77.3) Long-term debt, repayments (3.2) (2.7) (1.3) Down-ase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 <td></td> <td></td> <td>14.4</td> <td>(14.8)</td>			14.4	(14.8)
Net Cash – Operating activities 357.7 371.8 247.2 Investing Activities				
Investing Activities (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash – Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Short-term revolving loans, borrowings 246.5 77.3 Short-term revolving loans, repayments (23.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (3.0) (15.3) 20.0 Net cash from discontinued operations – operati			· · ·	
Capital expenditures (91.4) (95.5) (113.3) Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash – Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings (27.2) (44.5) 48.9 Short-term revolving loans, borrowings (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (11.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash - Financing activities (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4)				
Proceeds from sale of long-lived assets 0.9 43.2 3.8 Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Commercial paper, net (repayments) borrowings (27.2) (44.5) 48.9 Short-term revolving loans, borrowings (23.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 - Net Cash - Financing activities (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net cash from discontinued operations – operating activities 0.9 (4.2) <t< td=""><td>-</td><td>(91.4)</td><td>(95.5)</td><td>(113.3)</td></t<>	-	(91.4)	(95.5)	(113.3)
Acquisitions, net of cash acquired (113.1) (113.7) Other, net 0.2 Net Cash - Investing activities (203.4) (52.3) (223.2) Financing Activities (203.4) (52.3) (223.2) Formarcial paper, net (repayments) borrowings (27.2) (44.5) 48.9 Short-term revolving loans, borrowings -246.5 77.3 Short-term revolving loans, repayments (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2)				
Other, net 0.2 Net Cash – Investing activities (203.4) (52.3) (223.2) Financing Activities (44.5) 48.9 Commercial paper, net (repayments) borrowings 246.5 77.3 Short-term revolving loans, repayments (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net cash from discontinued operations – operating activities 50.7 171.2 (70.9) <td>-</td> <td>(113.1)</td> <td>_</td> <td>(113.7)</td>	-	(113.1)	_	(113.7)
Net Cash – Investing activities (203.4) (52.3) (223.2) Financing Activities -			_	
Financing Activities (27.2) (44.5) 48.9 Short-term revolving loans, borrowings 246.5 77.3 Short-term revolving loans, repayments (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) 562.2<		(203.4)	(52.3)	(223.2)
Short-term revolving loans, borrowings 246.5 77.3 Short-term revolving loans, repayments (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) 562.2 \$ 91.0 391.0 Supplemental Cash Flow Disclosures		<u> </u>		<u> </u>
Short-term revolving loans, borrowings 246.5 77.3 Short-term revolving loans, repayments (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) 562.2 \$ 91.0 391.0 Supplemental Cash Flow Disclosures	Commercial paper, net (repayments) borrowings	(27.2)	(44.5)	48.9
Short-term revolving loans, repayments — (233.8) (177.3) Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 — Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) \$612.9 \$562.2 \$391.0 Supplemental Cash Flow Disclosures Extra stra stra stra stras		· _		77.3
Long-term debt, issued 8.1 3.2 7.0 Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) 562.2 \$ 391.0 391.0 Supplemental Cash Flow Disclosures		_	(233.8)	(177.3)
Long-term debt, repayments (3.2) (2.7) (1.3) Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) 562.2 \$ 562.2 \$ 391.0 Supplemental Cash Flow Disclosures 562.2 \$ 562.2 \$ 391.0 461.9 Cash paid (received) during the year for: 562.2 \$ 331.0 \$ 391.0 Interest \$ 3.3 \$ 3.8 3.8		8.1		
Repurchase of common stock (41.4) (56.1) (32.9) Dividends paid (52.1) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash - Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) \$612.9 \$562.2 \$391.0 Supplemental Cash Flow Disclosures \$31.0 \$31.0 \$31.0 \$31.0 \$31.0 Cash paid (received) during the year for: \$3.3 \$3.8 3.8		(3.2)	(2.7)	(1.3)
Dividends paid (47.3) (47.3) (45.4) Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) \$ 612.9 \$ 562.2 \$ 391.0 Supplemental Cash Flow Disclosures 5 5 5 3.3 \$ 3.8 Cash paid (received) during the year for: Interest \$ 2.5 \$ 3.3 \$ 3.8				(32.9)
Proceeds from issuance of common stock 14.9 5.8 11.2 Other, net (0.6) 0.1	Dividends paid		(47.3)	(45.4)
Other, net (0.6) 0.1 Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) \$ 612.9 \$ 562.2 \$ 391.0 Supplemental Cash Flow Disclosures \$ 2.5 \$ 3.3 \$ 3.8	Proceeds from issuance of common stock			11.2
Net Cash – Financing activities (101.5) (128.8) (112.5) Exchange rate effects on cash and cash equivalents (3.0) (15.3) 20.0 Net cash from discontinued operations – operating activities 0.9 (4.2) (2.4) Net change in cash and cash equivalents 50.7 171.2 (70.9) Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) \$612.9 \$562.2 \$391.0 Supplemental Cash Flow Disclosures Cash paid (received) during the year for: Interest \$2.5 \$3.3 \$3.8		(0.6)		
Net cash from discontinued operations – operating activities0.9(4.2)(2.4)Net change in cash and cash equivalents50.7171.2(70.9)Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively)562.2391.0461.9Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively)562.2\$ 562.2\$ 391.0Supplemental Cash Flow Disclosures Cash paid (received) during the year for: Interest\$ 2.5\$ 3.3\$ 3.8			(128.8)	(112.5)
Net change in cash and cash equivalents50.7171.2(70.9)Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively)562.2391.0461.9Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively)562.2\$ 562.2\$ 391.0Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively)\$ 612.9\$ 562.2\$ 391.0Supplemental Cash Flow Disclosures Cash paid (received) during the year for: Interest\$ 2.5\$ 3.3\$ 3.8	Exchange rate effects on cash and cash equivalents	(3.0)	(15.3)	20.0
Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively)562.2391.0461.9Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively)\$612.9\$562.2\$391.0Supplemental Cash Flow Disclosures Cash paid (received) during the year for: Interest\$2.5\$3.3\$3.8	Net cash from discontinued operations – operating activities	0.9	(4.2)	(2.4)
\$1.2, and \$1.2, respectively) 562.2 391.0 461.9 Cash and Cash Equivalents – end of Period (includes restricted cash of \$0.8, \$1.0, and \$1.2, respectively) \$ 612.9 \$ 562.2 \$ 391.0 Supplemental Cash Flow Disclosures \$ cash paid (received) during the year for: \$ 1.0 \$ 1.0 \$ 3.3 \$ 3.8	Net change in cash and cash equivalents	50.7	171.2	(70.9)
and \$1.2, respectively) \$ 612.9 \$ 562.2 \$ 391.0 Supplemental Cash Flow Disclosures Cash paid (received) during the year for: Interest \$ 2.5 \$ 3.3 \$ 3.8	Cash and cash equivalents – beginning of year (includes restricted cash of \$1.0, \$1.2, and \$1.2, respectively)	562.2	391.0	461.9
Cash paid (received) during the year for: Interest \$ 2.5 \$ 3.3 \$ 3.8		\$ 612.9	\$ 562.2	\$ 391.0
Interest \$ 2.5 \$ 3.3 \$ 3.8	Supplemental Cash Flow Disclosures			
	Cash paid (received) during the year for:			
Income taxes, net of refunds received 63.4 53.5 62.0	Interest	\$ 2.5	\$ 3.3	\$ 3.8
	Income taxes, net of refunds received	 63.4	53.5	62.0

The accompanying Notes to the Consolidated Financial Statements are an integral part of the above statements of cash flows.

CONSOLIDATED STATEMENTS OF CHANGES IN SHAREHOLDERS' EQUITY

(IN MILLIONS, EXCEPT SHARE AMOUNTS)	Commo	Accumulated Other Retained Comprehensive Noncontrol ommon Stock Earnings Loss Interest			Other Retained Comprehensive No			Noncontrolling Interest	Sh	Total areholders' Equity
	(Shares)		llars)							
December 31, 2016	88.4	\$	88.4	\$	1,789.2	\$	(451.2)	\$ 2.0	\$	1,428.4
Activity from stock incentive plans	0.7		0.7		29.9		—	—		30.6
Share repurchases	(0.9)		(0.9)		(32.0)		_	_		(32.9)
Cumulative adjustment for accounting change (See Note 2)	_		_		1.0		_	_		1.0
Net income (loss)	—		—		113.5		_	(0.2)		113.3
Dividends declared (\$0.512 per share)	_		—		(45.5)		_	_		(45.5)
Total other comprehensive income, net of tax	_		_		_		103.0	_		103.0
Other	_		_		_		_	(0.1)		(0.1)
December 31, 2017	88.2		88.2		1,856.1		(348.2)	1.7		1,597.8
Activity from stock incentive plans	0.5		0.5		27.0		—	—		27.5
Share repurchases	(1.1)		(1.1)		(55.0)		—	—		(56.1)
Cumulative adjustment for accounting change	_		_		(4.1)		_	_		(4.1)
Net income	_		_		333.7		_	0.9		334.6
Dividends declared (\$0.536 per share)	_		_		(47.4)		_	_		(47.4)
Total other comprehensive loss, net of tax	_		_		_		(27.3)	_		(27.3)
Other	_		_				_	(0.1)		(0.1)
December 31, 2018	87.6		87.6		2,110.3		(375.5)	2.5		1,824.9
Activity from stock incentive plans	1.0		1.0		29.6		—	—		30.6
Share repurchases	(0.8)		(0.8)		(40.6)		—	—		(41.4)
Net income	—		—		325.1		—	1.1		326.2
Dividends declared (\$0.588 per share)	—		_		(52.0)		—	—		(52.0)
Dividend to noncontrolling interest	_		—		_		_	(0.7)		(0.7)
Total other comprehensive loss, net of tax	—		-		—		(9.8)	_		(9.8)
December 31, 2019	87.8	\$	87.8	\$	2,372.4	\$	(385.3)	\$ 2.9	\$	2,077.8

The accompanying Notes to the Consolidated Financial Statements are an integral part of the above statements of changes in shareholders' equity.

NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS

(DOLLARS AND SHARES (EXCEPT PER SHARE AMOUNTS) IN MILLIONS, UNLESS OTHERWISE STATED)

NOTE 1 DESCRIPTION OF BUSINESS, BASIS OF PRESENTATION AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Description of Business

ITT Inc. is a diversified manufacturer of highly engineered critical components and customized technology solutions for the transportation, industrial, and oil and gas markets. Unless the context otherwise indicates, references herein to "ITT," "the Company," and such words as "we," "us," and "our" include ITT Inc. and its subsidiaries. ITT operates in three segments: Motion Technologies, consisting of friction and shock and vibration equipment; Industrial Process, consisting of industrial flow equipment and services; and Connect & Control Technologies, consisting of electronic connectors, fluid handling, motion control, composite materials, and noise and energy absorption products. Financial information for our segments is presented in Note 3, Segment Information.

Basis of Presentation

The Consolidated Financial Statements and Notes thereto were prepared in conformity with accounting principles generally accepted in the United States of America (GAAP).

The preparation of financial statements in conformity with GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities, the disclosure of contingent assets and liabilities at the date of the financial statements, and the reported amounts of revenue and expenses during the reporting period. Estimates are revised as additional information becomes available. Estimates and assumptions are used for, but not limited to, asbestos-related liabilities and recoveries from insurers, revenue recognition, unrecognized tax benefits, deferred tax valuation allowances, projected benefit obligations for postretirement plans, accounting for business combinations, goodwill and other intangible asset impairment testing, environmental liabilities, allowance for doubtful accounts and inventory valuation. Actual results could differ from these estimates.

Certain prior year amounts have been reclassified to conform to the current year presentation.

Significant Accounting Policies

Principles of Consolidation

Our consolidated financial statements include the accounts of all majority-owned subsidiaries. ITT consolidates companies in which it has a controlling financial interest or when ITT is considered the primary beneficiary of a variable interest entity. We account for investments in companies over which we have the ability to exercise significant influence, but do not hold a controlling interest under the equity method, and we record our proportionate share of income or losses in the Consolidated Statements of Operations. The results of companies acquired or disposed of during the fiscal year are included in the Consolidated Financial Statements from the effective date of acquisition or up to the date of disposal. All intercompany transactions have been eliminated.

Revenue Recognition

Revenue is derived from the sale of products and services to customers. We recognize revenue to depict the transfer of promised goods or services to customers in an amount that reflects the consideration to which we expect to be entitled in exchange for those goods or services.

For product sales, we consider practical and contractual limitations in determining whether there is an alternative use for the product. For example, long-term design and build contracts are typically highly customized to a customer's specifications. For contracts with no alternative use and an enforceable right to payment for work performed to date, including a reasonable profit if the contract were terminated at the customer's convenience for reason other than nonperformance, we recognize revenue over time. All other product sales are recognized at a point in time.

For contracts recognized over time, we use the cost-to-total cost method or the units of delivery method, depending on the nature of the contract, including length of production time.

For contracts recognized at a point in time, we recognize revenue when control passes to the customer, which is generally based on shipping terms that address when title and risk and rewards pass to the customer. However, we also consider certain customer acceptance provisions as certain contracts with customers include installation, testing, certification or other acceptance provisions. In instances where contractual terms include a provision for customer acceptance, we consider whether we have previously demonstrated that the product meets objective criteria specified by either the seller or customer in assessing whether control has passed to the customer.

For service contracts, we recognize revenue as the services are rendered if the customer is benefiting from the service as it is performed, or otherwise upon completion of the service. Separately priced extended warranties are recognized as a separate performance obligation over the warranty period.

The transaction price in our contracts consists of fixed consideration and the impact of variable consideration including returns, rebates and allowances, and penalties. Variable consideration is generally estimated using a probability-weighted approach based on historical experience, known trends, and current factors including market conditions and status of negotiations.

When there is more than one performance obligation, the transaction price is allocated to the performance obligations based on the relative estimated standalone selling prices. If not sold separately, estimated standalone selling prices are determined considering various factors including market and pricing trends, geography, product customization, and profit objectives. Revenue is recognized when the appropriate revenue recognition criteria for the individual performance obligations have been satisfied.

Revenue is reported net of any required taxes collected from customers and remitted to government authorities, with the collected taxes recorded as current liabilities until remitted to the relevant government authority.

Shipping and handling activities are accounted for as activities to fulfill a promise to transfer a product to a customer. As such, shipping and handling activities are not evaluated as a separate performance qualification.

For most contracts, payment is due from the customer within 30 to 90 days after the product is delivered or the service has been performed. For design and build contracts, we generally collect progress payments from the customer throughout the term of the contract, resulting in contract assets or liabilities depending on the timing of the payments. Contract assets consist of unbilled amounts when revenue recognized exceeds customer billings. Contract liabilities consist of advance payments and billings in excess of revenue recognized.

Design and engineering costs for highly complex products to be sold under a long-term production-type contract are capitalized and amortized in a manner consistent with revenue recognition of the related contract or anticipated contract. Other design and development costs are capitalized only if there is a contractual guarantee for reimbursement. Costs to obtain a contract (e.g., commissions) for contracts greater than one year are capitalized and amortized in a manner consistent with revenue recognition of the related contract.

Product Warranties

Our standard product warranty terms generally include post-sales support and repairs or replacement of a product at no additional charge for a specified period of time. Accruals for estimated expenses related to product warranties are made at the time revenue is recognized and are recorded as a component of costs of revenue. We estimate the liability for warranty claims based on our standard warranties, the historical frequency of claims and the cost to replace or repair our products under warranty. Factors that influence our warranty liability include the number of units sold, the length of warranty term, historical and anticipated rates of warranty claims and the cost per claim.

Asbestos-Related Liabilities and Assets

Our subsidiaries, including ITT LLC and Goulds Pumps LLC, have been named as a defendant in numerous product liability lawsuits alleging personal injury due to asbestos exposure. We accrue the estimated value of pending claims and unasserted claims estimated to be filed over the next 10 years, including legal fees, on an undiscounted basis, due to the inability to reliably forecast the timing of future cash flows. Assumptions utilized in estimating the liability for both pending and unasserted claims include: disease type, average settlement costs, percentage of claims settled or dismissed, the number of claims estimated to be filed against the Company in the future, and the costs to defend such claims.

The Company has also recorded an asbestos-related asset composed of insurance receivables. The asbestosrelated asset represents our best estimate of probable recoveries from third parties for pending claims, and unasserted claims estimated to be filed over the next 10 years. In developing this estimate, the Company considers coverage-inplace and other settlement agreements with its insurers, a review of expected levels of future recoveries, the financial viability of the insurance companies, the method by which losses will be allocated to the various insurance policies and the years covered by those policies, and the interpretation of the various policy and contract terms and limits and their interrelationships. Consistent with the asbestos liability, the asbestos-related asset has not been discounted to present value due to the inability to reliably forecast the timing of future cash flows. Under coverage-in-place agreements, an insurer's policies remain in force and the insurer undertakes to provide coverage for the Company's pending and future asbestos claims on specified terms and conditions. Insurance payments under coverage-in-place agreements are made to the Company as asbestos claims are settled or adjudicated. The Company's buyout agreements provide an agreed upon amount of available coverage for future asbestos claims under the subject policies to be paid to a Qualified Settlement Fund (QSF) on a specific schedule as agreed upon by the Company and its insurer. However, assets in the QSF are only available and distributed when qualifying asbestos expenditures are submitted for reimbursement as defined in the QSF agreement. Therefore, recovery of insurance reimbursements under these types of agreements is dependent on the timing of the payment of the liability and, consistent with the asbestos liability, have not been discounted to present value.

In the third quarter each year we conduct an asbestos remeasurement with the assistance of outside consultants to review and update, as appropriate, the underlying assumptions used to estimate our asbestos liability and related assets, including a reassessment of the time horizon over which a reasonable estimate of unasserted claims can be projected. In addition, as part of our ongoing review of our net asbestos exposure, each quarter we assess the most recent data available for the key inputs and assumptions, comparing the data to the expectations on which the most recent annual liability and asset estimates were based. Provided the quarterly review does not indicate a more detailed evaluation of our asbestos exposure is required, each quarter we record a net asbestos cost to maintain a rolling 10-year time horizon.

Postretirement Benefit Plans

ITT sponsors numerous pension and other employee-related defined benefit plans (collectively, postretirement benefit plans). Our U.S. plans are closed to new participants. Postretirement benefit obligations are generally determined, where applicable, based on participant years of service, future compensation, and age at retirement or termination. The determination of projected benefit obligations and the recognition of expenses related to postretirement benefit plans are dependent on various assumptions that are judgmental. The assumptions involved in the measurement of our postretirement benefit plan obligations and net periodic postretirement costs primarily relate to discount rates, long-term expected rates of return on plan assets, mortality and termination rates, and other factors. Management develops each assumption using relevant Company experience in conjunction with market-related data for each individual country in which such plans exist. Actual results that differ from our assumptions are accumulated and are amortized over the estimated future working life, or remaining lifetime, of the plan participants depending on the nature of the retirement plan. For the recognition of net periodic postretirement cost, the calculation of the long-term expected return on plan assets is generally derived using a market-related value of plan assets based on yearly average asset values at the measurement date over the last 5 years.

The fair value of plan assets is estimated based on market prices or estimated fair value at the measurement date.

The funded status of all plans is recorded on our balance sheet. Actuarial gains and losses and prior service costs or credits that have not yet been recognized through net income are recorded in accumulated other comprehensive income within shareholders' equity, net of taxes, until they are amortized as a component of net periodic postretirement cost.

Research & Development

Research and development activities are charged to expense as incurred.

Income Taxes

We determine the provision for income taxes using the asset and liability approach. Under this approach, deferred income tax assets and liabilities are determined based on the estimated future tax effects of differences between the financial reporting and tax bases of assets and liabilities, applying currently enacted tax rates in effect for the year in which we expect the differences will reverse. The ultimate realization of deferred tax assets is dependent on the generation of future taxable income (including the reversals of deferred tax liabilities) during the periods in which those deferred tax assets will become deductible.

We record a valuation allowance against our deferred tax assets when it is more likely than not that all or a portion of the deferred tax assets will not be realized. In assessing the need for a valuation allowance, the Company considers all available positive and negative evidence regarding the realizability of its deferred tax assets, including the future reversal of existing taxable temporary differences, taxable income in carryback periods, prudent and feasible tax planning strategies, estimated future taxable income, and whether we have a recent history of losses. The valuation allowance can be affected by changes to tax regulations, interpretations and rulings, changes to enacted statutory tax rates, and changes to future taxable income estimates.

We have not provided deferred tax liabilities for the impact of U.S. income taxes on book over tax basis which we consider indefinitely reinvested outside the U.S. We plan foreign earnings remittance amounts based on projected cash flow needs, as well as the working capital and long-term investment requirements of foreign subsidiaries and our domestic operations.

Furthermore, we recognize the tax benefit from an uncertain tax position only if it is more likely than not that the tax position will be sustained on examination by the taxing authorities, based on the technical merits of the position in consideration of applicable tax statutes and related interpretations and precedents and the expected outcome of the

proceedings (or negotiations) with the taxing authorities. Tax benefits recognized in the financial statements from such a position are measured based on the largest benefit that has a greater than 50% likelihood of being realized on ultimate settlement.

The Company has elected to account for Global Intangible Low Taxed Income as a current period expense when incurred.

Earnings Per Share

Basic earnings per common share considers the weighted average number of common shares outstanding. Diluted earnings per share considers the outstanding shares utilized in the basic earnings per share calculation as well as the dilutive effect of outstanding stock options and restricted stock that do not contain rights to nonforfeitable dividends. Diluted shares outstanding include the dilutive effect of in-the-money options, unvested restricted stock units and unvested performance stock units. The dilutive effect of such equity awards is calculated based on the average share price for each reporting period using the treasury stock method. Common stock equivalents are excluded from the computation of earnings per share if they have an anti-dilutive effect.

Cash and Cash Equivalents

ITT considers all highly liquid investments purchased with an original maturity or remaining maturity at the time of purchase of three months or less to be cash equivalents. Cash equivalents primarily include fixed-maturity time deposits and money market investments. Restricted cash was \$0.8 and \$1.0 as of December 31, 2019 and 2018, respectively. Restricted cash is presented within Other current assets and Other non-current assets.

Concentrations of Credit Risk

Financial instruments that potentially subject ITT to significant concentrations of credit risk consist principally of cash and cash equivalents, accounts receivable from trade customers, investments, and derivatives. We maintain cash and cash equivalents with various financial institutions located in different geographical regions, and our policy is designed to limit exposure to any individual counterparty. As part of our risk management processes, we perform periodic evaluations of the relative credit standing of the financial institutions. We have not sustained any material credit losses during the previous three years from financial instruments held at financial institutions.

Credit risk with respect to accounts receivable is generally diversified due to the large number of entities comprising ITT's customer base and their dispersion across many different industries and geographic regions. However, our largest customer represents approximately 13% and 12% of the December 31, 2019 and 2018 outstanding trade accounts receivable balance, respectively. ITT performs ongoing credit evaluations of the financial condition of its third-party distributors, resellers and other customers and requires collateral, such as letters of credit and bank guarantees, in certain circumstances.

Factoring of Trade Receivables

Factoring arrangements, whereby substantially all economic risks and rewards associated with trade receivables are transferred to a third party, are accounted for by derecognizing the trade receivables upon receipt of cash proceeds from the factoring arrangement. Factoring arrangements, whereby some, but not substantially all, of the economic risks and rewards are transferred to a third party and the assets subject to the factoring arrangement remain under the Company's control are accounted for by not derecognizing the trade receivables and recognizing any related obligations to the third party.

Allowance for Doubtful Accounts

We determine our allowance for doubtful accounts using a combination of factors to reduce our trade receivables balances to their estimated net realizable amount. We maintain an allowance for doubtful accounts based on a variety of factors including the length of time receivables are past due, macroeconomic trends and conditions, significant onetime events, historical experience and the financial condition of our customers. We record a specific reserve for individual accounts when we become aware of specific customer circumstances, such as in the case of bankruptcy filings or deterioration in the customer's operating results or financial position. The past due or delinquency status of a receivable is based on the contractual payment terms of the receivable. If circumstances related to the specific customer change, we adjust estimates of the recoverability of receivables as appropriate.

Inventories

Inventories, which include the costs of material, labor and overhead, are stated at the lower of cost or market, with cost generally computed on a first-in, first-out (FIFO) basis. Estimated losses from obsolete and slow-moving inventories are recorded to reduce inventory values to their estimated net realizable value and are charged to cost of sales. At the point of loss recognition, a new cost basis for that inventory is established and subsequent changes in facts and circumstances do not result in a recovery in carrying value. Inventories valued under the last-in, first-out (LIFO) method represent 14.5% and 13.9% of total 2019 and 2018 inventories, respectively. We have a LIFO reserve of \$12.4 and \$11.0 recorded as of December 31, 2019 and 2018, respectively.

Cost of sales is generally reported using standard cost techniques with full overhead absorption that approximates actual cost.

Plant, Property and Equipment

Plant, property and equipment, including capitalized interest applicable to major project expenditures, are recorded at cost. Depreciation is computed on a straight-line basis over the estimated useful lives of the assets. Leasehold improvements are depreciated over the life of the lease or the asset, whichever is shorter. Fully depreciated assets are retained in property and accumulated depreciation accounts until disposal. Repairs and maintenance costs are expensed as incurred.

Leases

The Company enters into leases for the use of premises and equipment, primarily classified as operating leases. Operating lease costs are recognized as an operating expense over the lease term on a straight-line basis. For leases with terms greater than 12 months, we record a right-of-use asset and lease liability equal to the present value of the lease payments. In determining the discount rate used to measure the right-of-use asset and lease liability, we utilize the Company's incremental borrowing rate and consider the term of the lease, as well as the geographic location of the leased asset.

Where options to renew a lease are available, they are included in the lease term and capitalized on the balance sheet to the extent there would be a significant economic penalty not to elect the option. Certain real estate leases are subject to periodic changes in an index or market rate. While lease liabilities are not remeasured as a result of changes to an index or rate, these changes are treated as variable lease payments and recognized in the period in which the obligation for those payments is incurred. Variable lease expense also includes property tax and property insurance costs.

Capitalized Internal Use Software

Costs incurred in the preliminary project stage of developing or acquiring internal use software are expensed as incurred. After the preliminary project stage is completed, management has approved the project and it is probable that the project will be completed and the software will be used for its intended purpose, ITT capitalizes certain internal and external costs incurred to acquire or create internal use software, principally related to software coding, designing system interfaces and installation and testing of the software. ITT amortizes capitalized internal use software costs using the straight-line method over the estimated useful life of the software, generally from 3 to 7 years.

Investments

Investments in fixed-maturity time deposits having an original maturity exceeding three months at the time of purchase, referred to as short-term time deposits, are classified as held-to-maturity and are recorded at amortized cost, which approximates fair value. There were no short-term time deposits held as of December 31, 2019 and December 31, 2018.

Investments in corporate-owned life insurance (COLI) policies are recorded at their cash surrender values as of the balance sheet date. The Company's investments in COLI policies are included in other non-current assets in the consolidated balance sheets and were \$109.1 and \$104.4 at December 31, 2019 and 2018, respectively. Changes in the cash surrender value during the period generally reflect gains or losses in the fair value of assets, premium payments, and policy redemptions. Gains from COLI investments of \$4.8, \$2.8, and \$3.8 were recorded within general and administrative expenses in the Consolidated Statements of Operations during years ended December 31, 2019, 2018 and 2017, respectively.

Long-Lived Asset Impairment

Long-lived assets, including intangible assets with finite lives and capitalized internal use software, are tested for impairment whenever events or changes in circumstances indicate their carrying value may not be recoverable. We assess the recoverability of long-lived assets based on the undiscounted future cash flow the assets are expected to generate and recognize an impairment loss when estimated undiscounted future cash flows expected to result from the use of the asset plus net proceeds expected from disposition of the asset, if any, are less than the carrying value of the asset. When an impairment is identified, we reduce the carrying amount of the asset to its estimated fair value based on a discounted cash flow approach or, when available and appropriate, to comparable market values.

Goodwill and Intangible Assets

Goodwill represents purchase consideration paid in a business combination that exceeds the values assigned to the net assets of the acquired business. Intangible assets include customer relationships, proprietary technology, trademarks, patents and other intangible assets. Intangible assets with a finite life are generally amortized on a straightline basis over an estimated economic useful life, which generally ranges from 7-20 years, and are tested for impairment if indicators of impairment are identified. Certain of our intangible assets have an indefinite life, namely certain brands and trademarks. Goodwill and indefinite-lived intangible assets are not amortized, but rather are tested for impairment annually (or more frequently if impairment indicators arise, such as changes to the reporting unit structure, significant adverse changes in the business climate or an adverse action or assessment by a regulator). We conduct our annual impairment testing on the first day of the fourth fiscal quarter. We may perform an initial qualitative evaluation which considers present events and circumstances, to determine the likelihood of impairment. If the likelihood of impairment is not considered to be more likely than not, then no further testing is performed. If it is considered to be more likely than not that the asset is impaired based on the qualitative evaluation or we elect not to perform a qualitative evaluation, then a two-step quantitative impairment test is performed. If the carrying value of the reporting unit exceeds its estimated fair value, then the second step of the impairment test is performed in order to measure the impairment loss to be recorded, if any. If the carrying value of a reporting unit's goodwill exceeds its implied fair value, then we record an impairment loss equal to the difference. For indefinite-lived intangibles, if it is considered to be more likely than not that the asset is impaired, we compare the fair value of those assets to their carrying value. We recognize an impairment loss when the estimated fair value of the indefinite-lived intangible asset is less than its carrying value.

We estimate the fair value of our reporting units using an income approach. Under the income approach, we estimate fair value based on the present value of estimated future cash flows. We estimate the fair value of our indefinitelived intangible assets using the relief from royalty method. The relief from royalty method estimates the portion of a company's earnings attributable to an intellectual property asset based on an assumed royalty rate that the company would have paid had the asset not been owned.

Business Combinations

We allocate the purchase price of acquisitions to the tangible and intangible assets acquired, liabilities assumed, and non-controlling interests in the acquiree based on their estimated fair value at the acquisition date. Changes to acquisition date fair values prior to the expiration of the measurement period, a period not to exceed 12 months from date of acquisition, are recorded as an adjustment to the associated goodwill in the reporting period in which the adjustment amounts are determined. Changes to acquisition date fair values after expiration of the measurement period are recorded in earnings. The excess of the acquisition price over those estimated fair values is recorded as goodwill. Acquisition-related expenses are expensed as incurred and the costs associated with restructuring actions initiated after the acquisition are recognized separately from the business combination.

Commitments and Contingencies

We record accruals for commitments and loss contingencies when it is probable that a liability has been incurred and the amount of loss can be reasonably estimated. Significant judgment is required to determine both probability and the estimated amount of loss, and these assessments can involve a series of complex judgments about future events and may rely on estimates and assumptions that have been deemed reasonable by management. We review these accruals quarterly and adjust the accruals to reflect the impact of negotiations, settlements, rulings, advice of legal counsel, and other current information. See Note 20, Commitments and Contingencies, for additional information.

Environmental-Related Liabilities and Assets

Accruals for environmental matters are recorded on a site-by-site basis when it is probable that a liability has been incurred and the amount of the liability can be reasonably estimated, based on current law and existing technologies. Our estimated liability is reduced to reflect the participation of other potentially responsible parties in those instances where it is probable that such parties are legally responsible and financially capable of paying their respective shares of the relevant costs, and that share can be reasonably estimated. Accruals for environmental liabilities are primarily included in other non-current liabilities at undiscounted amounts and exclude claims for recoveries from insurance companies or other third parties.

The Company records an asset related to its environmental exposures for insurance and other third parties. The environmental-related asset represents our best estimate of probable recoveries from third parties for costs incurred in past periods, as well as costs estimated to be incurred in future periods.

Environmental costs and related recoveries are recorded within general and administrative expenses in the Consolidated Statements of Operations.

Foreign Currency

The national currencies of our foreign subsidiaries are generally the functional currencies. Balance Sheet accounts are translated at the exchange rate in effect at the end of each period, except for equity which is translated at historical rates; Statement of Operations accounts are translated at the average rates of exchange prevailing during the period. Gains and losses resulting from foreign currency translation are reflected in the cumulative translation adjustments component of shareholders' equity.

For foreign subsidiaries that do not use the local currency as their functional currency, foreign currency assets and liabilities are remeasured to the foreign subsidiary's functional currency using end of period exchange rates, except for nonmonetary balance sheet accounts, which are remeasured at historical exchange rates.

For transactions denominated in other than the functional currency, revenue and expenses are remeasured at average exchange rates in effect during the reporting period in which the transactions occurred, except for expenses related to nonmonetary assets and liabilities. Transaction gains or losses from foreign currency remeasurement are reported in general and administrative expenses in the Consolidated Statements of Operations. During 2019, 2018, and 2017, we recognized transaction losses of \$2.7, \$1.2, and \$12.4, respectively.

Derivative Financial Instruments

ITT may use derivative financial instruments, primarily foreign currency forward contracts, to mitigate exposure from foreign currency exchange rate fluctuations as it pertains to receipts from customers, payments to suppliers and intercompany transactions. We record derivatives at their fair value as either an asset or liability. For derivatives not designated as hedges, adjustments to reflect changes in the fair value of our derivatives are included in earnings. For cash flow hedges that qualify and are designated for hedge accounting, the effective portion of the change in fair value of the derivative is recorded in accumulated other comprehensive loss and subsequently recognized in earnings when the hedged transaction affects earnings. Any ineffective portion is recognized immediately in earnings. As of December 31, 2019 and 2018, no derivatives were designated as hedges. The differentials paid or received on interest rate swap agreements are recognized as adjustments to interest expense. Derivative contracts involve the risk of non-performance by the counterparty. The fair value of our foreign currency contracts are determined using the net position of the contracts and the applicable spot rates and forward rates as of the reporting date.

NOTE 2 RECENT ACCOUNTING PRONOUNCEMENTS

The Company considers the applicability and impact of all accounting standard updates (ASUs). ASUs not listed below were assessed and determined to be either not applicable or are expected to have minimal impact on our consolidated financial position or results of operations.

Recently Adopted Accounting Pronouncements

Leases (ASU 2016-02)

In February 2016, the Financial Accounting Standards Board (FASB) issued new guidance which updated the accounting for leases in order to increase transparency and comparability of organizations by requiring balance sheet presentation of leased assets and increased financial statement disclosure of leasing arrangements. The new standard requires entities to recognize a liability for their lease obligations and a corresponding right-of-use asset, initially measured at the present value of the lease payments. Subsequent accounting depends on whether the agreement is deemed to be a financing or operating lease. For operating leases, a lessee recognizes its total lease expense as an operating expense over the lease term. For financing leases, a lessee recognizes amortization of the right-of-use asset as an operating expense over the lease term separately from interest on the lease liability. The ASU requires that assets and liabilities be presented and disclosed separately and the liabilities must be classified appropriately as current and noncurrent. The ASU further requires additional disclosure of certain gualitative and guantitative information related to lease agreements. The ASU was effective for the Company beginning on January 1, 2019, at which time we adopted the new standard using the modified retrospective approach as of the date of adoption. The Company elected to not reassess certain lease characteristics including whether expired or certain existing contracts contain leases, the lease classification prior to adoption, and initial direct costs. Upon adoption, we recognized a right-of-use asset of \$80.0 (net of deferred rent of \$3.4 previously included within Accrued liabilities and Other non-current liabilities) and a lease liability of \$83.4 related to existing leases of real estate, vehicles, and other equipment that are classified as operating leases, and have terms greater than 12 months. The right-of-use asset is included within Other noncurrent assets and the lease liabilities are included within Accrued liabilities and Other non-current liabilities on the Consolidated Balance Sheet. A summary of the impact to our Consolidated Balance Sheet on January 1, 2019 is as follows:

	ember 31, 2018	Effect of Change		Ja	nuary 1, 2019
Other non-current assets	\$ 196.8	\$	80.0	\$	276.8
Accrued liabilities	416.7		18.7		435.4
Other non-current liabilities	166.5		61.3		227.8

Targeted Improvements to Accounting for Hedging Activities (ASU 2017-12)

In August 2017, the FASB issued amended guidance that simplifies the requirements of hedge accounting. The ASU enables companies to more accurately present the economic effects of risk management activities in the financial statements. The guidance requires the presentation of all items that affect earnings in the same income statement line as the hedged item and is effective for fiscal years beginning after December 15, 2018 and interim periods within those fiscal years with early adoption permitted. The Company adopted the provisions of ASU 2017-12 on January 1, 2019. The adoption did not result in an impact to our financial results since the Company did not have any derivatives outstanding at the time of adoption.

Reclassification of Certain Tax Effects From Accumulated Other Comprehensive Income (ASU 2018-02)

In February 2018, the FASB issued guidance related to the U.S. Tax Cuts and Jobs Act of 2017 (the Tax Act), which permits an optional reclassification of residual tax effects that are included within accumulated other comprehensive loss, to retained earnings. The reclassification represents the difference between the amount recorded in other comprehensive loss at the historical U.S. federal tax rate at the time the Tax Act became effective, and the amount that would have been recorded at the newly enacted rate. This guidance became effective during the first quarter of 2019, however we did not elect to make the optional reclassification.

Revenue from Contracts with Customers (ASU 2014-09)

In May 2014, the FASB amended the existing accounting standards for revenue recognition. The new standard was effective for ITT as of January 1, 2018. Most revenue streams are recorded consistently under both the new standard and the previous standard. However, the timing of revenue recognition of certain design and build contracts in our Industrial Process segment, recognized using the percentage of completion method under the previous standard, is now dependent on certain terms within the contract and therefore will vary based on the new guidance. ITT adopted

this guidance using a modified retrospective approach. As of the date of adoption, we had recognized \$49 of revenue and \$5 of operating income on open contracts in our Industrial Process segment using the percentage of completion method that are recognized at a point in time under the new guidance, resulting in a cumulative adjustment to the opening balance in retained earnings of \$4, net of tax. The comparative information prior to the adoption has not been restated and continues to be reported under the accounting guidance in effect in those periods.

Improvements to Employee Share-Based Payment Accounting (ASU 2016-09)

In March 2016, the FASB simplified several aspects of the accounting standard for employee share-based payment transactions, including the classification of excess tax benefits and deficiencies and the accounting for employee forfeitures. ITT elected to adopt this guidance as of January 1, 2017 which includes the following:

• Excess tax benefits and deficiencies are no longer recognized as a change in additional paid-in-capital in the equity section of the Balance Sheet. Instead they are recognized on the Statements of Operations as a tax expense or benefit.

Previously unrecognized tax benefits due to net operating loss carryforwards were recognized during the first quarter of 2017 using a modified retrospective approach, resulting in a cumulative-effect adjustment to increase retained earnings by \$2.1 as of January 1, 2017.

- The impact of forfeitures are now recognized as they occur as opposed to previously estimating future employee forfeitures. We adopted this provision utilizing a modified retrospective approach, resulting in a cumulative-effect adjustment reducing retained earnings by \$1.1, net of tax, as of January 1, 2017.
- The ASU also provides new guidance in other areas including minimum statutory tax withholding rules and the calculation of diluted common shares outstanding. The adoption of these provisions were reflected prospectively in the financial statements and did not have a material impact.

Accounting Pronouncements Not Yet Adopted

Measurement of Credit Losses on Financial Instruments (ASU 2016-13)

In June 2016, the FASB issued updated guidance that requires entities to use a current expected credit loss model to measure credit-related impairments for financial instruments held at amortized cost, including trade receivables. The current expected credit loss model is based on relevant information about past events, including historical experience, current conditions and reasonable and supportable forecasts that affect collectability. Current expected credit losses, and subsequent adjustments, represent an estimate of lifetime expected credit losses that are recorded as an allowance deducted from the amortized cost of the financial instrument. The updated guidance is effective for the Company beginning on January 1, 2020 and will be adopted using a modified retrospective transition approach. We do not expect the adoption to have a material impact on our financial statements.

NOTE 3 SEGMENT INFORMATION

The Company's segments are reported on the same basis used by our chief operating decision maker, for evaluating performance and for allocating resources. Our three reportable segments are referred to as: Motion Technologies, Industrial Process, and Connect & Control Technologies.

- Motion Technologies manufactures brake components and specialized sealing solutions, shock absorbers and damping technologies primarily for the global automotive, truck and trailer, public bus and rail transportation markets.
- Industrial Process manufactures engineered fluid process equipment serving a diversified mix of customers in global industries such as chemical, oil and gas, mining, and other industrial process markets and is a provider of plant optimization and efficiency solutions and aftermarket services and parts.
- *Connect & Control Technologies* manufactures harsh-environment connector solutions, critical energy absorption, flow control components, and composite materials for the aerospace and defense, general industrial, medical, and oil and gas markets.

Corporate and Other consists of corporate office expenses including compensation, benefits, occupancy, depreciation, and other administrative costs, as well as charges related to certain matters, such as asbestos and environmental liabilities, that are managed at a corporate level and are not included in segment results when evaluating performance or allocating resources. Assets of the segments exclude general corporate assets, which principally consist of cash, investments, asbestos-related receivables, deferred taxes, and certain property, plant and equipment.

		Revenue		Operating Income Operating Mar			largin		
	2019	2018	2017	2019	2018	2017	2019	2018	2017
Motion Technologies	\$ 1,241.8	\$1,274.1	\$ 1,176.0	\$ 216.1	\$ 223.4	\$ 190.2	17.4%	17.5%	16.2%
Industrial Process	943.8	827.1	807.2	104.7	91.4	65.8	11.1%	11.1%	8.2%
Connect & Control Technologies	663.9	646.6	605.6	111.5	96.5	68.4	16.8%	14.9%	11.3%
Total segment results	2,849.5	2,747.8	2,588.8	432.3	411.3	324.4	15.2%	15.0%	12.5%
Asbestos-related benefit (cost), net		_	_	20.2	(4.9)	19.9	_	_	_
(Loss) gain on sale or disposal of long-lived corporate assets	_	_	_	(0.2)	38.5		_	_	_
Eliminations / Other corporate costs	(3.1)	(2.7)	(3.5)	(40.9)	(47.6)	(25.0)	_	_	_
Total Eliminations / Corporate and Other costs	(3.1)	(2.7)	(3.5)	(20.9)	(14.0)	(5.1)	_	_	_
Total	\$ 2,846.4	\$ 2,745.1	\$ 2,585.3	\$ 411.4	\$ 397.3	\$ 319.3	14.5%	14.5%	12.4%

	Ass	sets	Capital Expenditures			Depreciation and Amortization			
	2019	2018	201	9	2018	2017	2019	2018	2017
Motion Technologies	\$ 1,178.2	\$ 1,147.2	\$ 57.	7 \$	75.0	\$ 79.1	\$ 58.6	\$ 57.2	\$ 49.4
Industrial Process	1,137.8	1,000.1	11.	2	7.8	19.3	26.3	26.9	27.5
Connect & Control Technologies	755.6	694.0	19.	4	10.8	10.6	21.8	21.2	22.8
Corporate and Other	1,036.1	1,005.5	3.	1	1.9	4.3	6.7	4.1	5.6
Total	\$ 4,107.7	\$ 3,846.8	\$ 91.	4 \$	95.5	\$ 113.3	\$ 113.4	\$ 109.4	\$ 105.3

The following table displays consolidated revenue by geographic region for the years ended December 31, 2019, 2018, and 2017. Revenue is attributed to individual regions based upon the destination of the product or service delivery.

For the Year Ended December 31, 2019	Motion hnologies			Elimina	tions	Total		
North America ^(a)	\$ 204.4	\$	558.7		31.9	\$	(2.9)	\$ 1,192.1
Europe ^(b)	780.5		89.7	1:	25.9		_	996.1
Asia	241.7		101.9	ł	33.8		(0.2)	427.2
Middle East and Africa	2.3		114.1		16.3		_	132.7
South America	12.9		79.4		6.0			98.3
Total	\$ 1,241.8	\$	943.8	\$ 6	63.9	\$	(3.1)	\$ 2,846.4
For the Year Ended December 31, 2018								
North America ^(a)	\$ 185.3	\$	483.6	\$ 40	04.3	\$	(2.4)	\$ 1,070.8
Europe ^(b)	807.6		60.3	1:	32.9		(0.1)	1,000.7
Asia	265.5		81.6	ł	34.5		(0.2)	431.4
Middle East and Africa	1.3		128.1		17.2		—	146.6
South America	14.4		73.5		7.7		—	95.6
Total	\$ 1,274.1	\$	827.1	\$ 64	46.6	\$	(2.7)	\$ 2,745.1
For the Year Ended December 31, 2017								
North America ^(a)	\$ 163.2	\$	472.3	\$ 3	76.6	\$	(3.1)	\$ 1,009.0
Europe ^(b)	767.6		67.7	1:	23.0		(0.1)	958.2
Asia	232.9		75.3	ł	35.4		(0.3)	393.3
Middle East and Africa	1.5		115.5		13.5		_	130.5
South America	10.8		76.4		7.1			94.3
Total	\$ 1,176.0	\$	807.2	\$ 60	05.6	\$	(3.5)	\$ 2,585.3

(a) Includes revenue of \$989.4, \$887.0, and \$853.6, from the United States for 2019, 2018, and 2017, respectively.

(b) Includes revenue of \$391.2, \$412.5, and \$389.3, from Germany for 2019, 2018, and 2017, respectively.

The following table displays Plant, Property and Equipment, net by geographic region as of December 31, 2019, and 2018.

	2019	2018
North America ^(a)	\$ 192.2	\$ 193.4
Europe ^(b)	250.0	228.3
Asia	84.6	91.8
Middle East and Africa	0.4	0.6
South America	4.3	4.7
Total	\$ 531.5	\$ 518.8

(a) Includes \$158.7 and \$159.7, in the United States as of December 31, 2019 and 2018, respectively.

(b) Includes \$95.7 and \$101.0, in Italy as of December 31, 2019 and 2018, respectively.

NOTE 4 REVENUE

The following table represents our revenue disaggregated by end market for the years ended December 31, 2019, 2018, and 2017:

	Motion	Ind	dustrial		nnect &			
For the Year Ended December 31, 2019	Technologies	P	rocess	Tech	nologies	Elimi	inations	Total
Auto and rail	\$ 1,222.6	\$		\$	—	\$	(0.2)	\$ 1,222.4
Chemical and industrial pumps	—		701.7		—		_	701.7
Aerospace and defense	9.1		_		409.2		_	418.3
Oil and gas	—		242.1		39.4		_	281.5
General industrial	10.1		_		215.3		(2.9)	222.5
Total	\$ 1,241.8	\$	943.8	\$	663.9	\$	(3.1)	\$2,846.4
For the Year Ended December 31, 2018								
Auto and rail	\$ 1,253.0	\$		\$	—	\$	(0.2)	\$ 1,252.8
Chemical and industrial pumps	_		598.7		_		_	598.7
Aerospace and defense	8.5				369.5		_	378.0
Oil and gas	_		228.4		39.6		_	268.0
General industrial	12.6		_		237.5		(2.5)	247.6
Total	\$ 1,274.1	\$	827.1	\$	646.6	\$	(2.7)	\$ 2,745.1
For the Year Ended December 31, 2017								
Auto and rail	\$ 1,159.1	\$	_	\$	_	\$	(0.2)	\$ 1,158.9
Chemical and industrial pumps	_		560.0		_		_	560.0
Aerospace and defense	9.6		_		348.0		_	357.6
Oil and gas	_		247.2		34.2		_	281.4
General industrial	7.3				223.4		(3.3)	227.4
Total	\$ 1,176.0	\$	807.2	\$	605.6	\$	(3.5)	\$ 2,585.3

During 2019, 2018, and 2017, a single external customer, Continental, accounted for 9.8%, 10.7%, and 11.1% of consolidated ITT revenue, respectively. A significant portion of the OEM revenue, typically about half, is derived at the automakers' direction to use an ITT brake pad in Continental's braking systems (calipers), generally through supply agreements signed directly with automakers. The remaining Continental revenue is generated from a long term aftermarket agreement. The revenue from this customer is reported within the Motion Technologies segment.

Revenue recognized related to our Industrial Process segment primarily consists of pumps, valves and plant optimization systems and related services which serve the general industrial, oil and gas, chemical and petrochemical, pharmaceutical, mining, pulp and paper, food and beverage, and power generation markets. Many of Industrial Process's products are highly engineered and customized to our customer needs and therefore do not have an alternative use. For these longer term design and build projects, if the contract states that we also have an enforceable right to payment, we recognize revenue over time using the cost-to-total-cost method as we satisfy the performance obligations identified in the contract. If no right to payment exists, revenue is recognized at a point in time, generally based on shipping terms. A majority of our design and build project contracts currently do not have a right to payment. For other pumps that do have an alternative use to us, revenue is recognized at a point in time. Revenue on service and repair contracts, representing approximately 3% of consolidated ITT revenue for each of the three years presented, is recognized after services have been agreed to by the customer and rendered or over the service period.

Our Motion Technologies segment manufactures brake pads, shims, shock absorbers, and energy absorption components, and sealing technologies primarily for the transportation industry. Our Connect & Control Technologies segment designs and manufactures a range of highly engineered connectors and specialized control components for critical applications supporting various markets including aerospace and defense, industrial, transportation, medical, and oil and gas. In both of these segments, most products have an alternative use. Therefore, revenue for those products is recognized at a point in time when control passes to the customer. In certain circumstances, we have concluded we do not have an alternative use for the component product. In these cases, due to the short-term nature of the production process we use a units-of-delivery method of revenue recognition which faithfully depicts the transfer of control to the customer.

Contract Assets and Liabilities

Contract assets consist of unbilled amounts where revenue recognized exceeds customer billings. Contract liabilities consist of advance payments and billings in excess of revenue recognized. The following table represents our net contract assets and liabilities as of December 31, 2019.

	December 31, 2019		
Current contract assets	\$ 18.0	\$ 21.8	(17.4)%
Noncurrent contract assets	_	0.7	(100.0)%
Current contract liabilities	(57.4)	(61.0)	(5.9)%
Net contract liabilities	\$ (39.4)	\$ (38.5)	2.3 %

Our net contract liability increased \$0.9, or 2.3%, during 2019. During 2019, we recognized revenue of \$42.7, related to contract liabilities at December 31, 2018.

The aggregate amount of the transaction price allocated to unsatisfied or partially satisfied performance obligations, which is equal to our backlog, was \$853.6 as of December 31, 2019. Of this amount, we expect to recognize approximately 90% in revenue during 2020 and the remainder in 2021.

As of December 31, 2019 and 2018, deferred contract costs, net were \$8.6 and \$6.9, respectively, primarily related to pre-contract costs and during 2019, we amortized \$1.3.

NOTE 5 RESTRUCTURING ACTIONS

Restructuring costs are included as a component of general and administrative expenses in our Consolidated Statements of Operations for the years ended December 31, 2019, 2018, and 2017 and are presented in the table below. We have initiated various restructuring activities throughout our businesses during the past three years, however there were no restructuring activities considered individually significant.

	2019	2018	2017
By component:			
Severance costs and other employee-related	\$ 12.4	\$ 4.5	\$ 9.8
Asset write-offs	_		1.9
Other	0.3	0.7	1.4
Total restructuring costs	\$ 12.7	\$ 5.2	\$ 13.1
By segment:			
Motion Technologies	\$ 4.9	\$ 2.3	\$ 2.3
Industrial Process	5.7	0.1	7.4
Connect & Control Technologies	2.0	2.1	3.3
Corporate and Other	0.1	0.7	0.1

The following table displays a rollforward of the restructuring accruals, presented on our Consolidated Balance Sheet within accrued liabilities, for the years ended December 31, 2019 and 2018.

	2019	2018
Restructuring accruals - beginning balance	\$ 6.7	\$ 8.9
Restructuring costs	12.7	5.2
Cash payments	(11.7)	(8.2)
Foreign exchange translation and other	(0.2)	0.8
Restructuring accrual - ending balance	\$ 7.5	\$ 6.7
By accrual type:		
Severance and other employee-related	\$ 7.2	\$ 5.6
Other	0.3	1.1

NOTE 6 INCOME TAXES

For each of the years ended December 31, 2019, 2018, and 2017 the tax data related to continuing operations is as follows:

		2	018	2017	
Income components:					
United States	\$	143.9	\$ 114	.4	\$ 89.2
International		270.5	276	6.6	220.2
Income from continuing operations before income tax		414.4	391	.0	309.4
Income tax expense components:					
Current income tax expense:					
United States – federal		9.4	6	5.3	7.7
United States – state and local		0.5	7	.9	1.3
International		49.1	58	8.2	38.6
Total current income tax expense		59.0	72	2.4	47.6
Deferred income tax expense (benefit) components:					
United States – federal		10.1	7	.4	105.9
United States – state and local		1.5	(0).2)	4.4
International		19.3	(21	.9)	36.7
Total deferred income tax expense (benefit)		30.9	(14	.7)	147.0
Income tax expense	\$	89.9	\$57	.7	\$ 194.6
Effective income tax rate		21.7%	14	.8%	62.9%

	2019	2018	2017
Tax provision at U.S. statutory rate	21.0 %	21.0 %	35.0 %
Foreign tax rate differential	2.8 %	3.7 %	(7.8)%
U.S. permanent items	(2.1)%	(0.2)%	(2.2)%
Tax on undistributed foreign earnings	1.8 %	(1.2)%	(4.8)%
Italy patent box	(1.2)%	(1.0)%	(0.8)%
Italy patent box discrete benefit relating to prior years	— %	— %	(1.1)%
State and local income tax	0.7 %	1.5 %	0.3 %
Valuation allowance on deferred tax assets	(0.5)%	(2.4)%	7.2 %
Audit settlements and unrecognized tax benefits	0.1 %	(0.3)%	(0.8)%
Tax exempt interest	— %	(5.8)%	(7.8)%
One-time tax on foreign earnings - Tax Act	— %	(1.0)%	18.8 %

A reconciliation of the income tax expense for continuing operations from the U.S. statutory income tax rate to the effective income tax rate is as follows for each of the years ended December 31, 2019, 2018, and 2017:

The increase in the effective tax rate in 2019 compared to 2018 was primarily due to tax benefits of \$22.9 in 2018 from German valuation allowance reversals on deferred tax assets. The effective tax rate in 2017 was driven by the Tax Cuts and Jobs Act of 2017 (the "Tax Act"). At the end of 2018, ITT capitalized its investment in a foreign subsidiary, which eliminated its tax exempt interest.

Federal deferred taxes remeasurement - Tax Act

U.S. tax on foreign earnings

Other adjustments

Effective income tax rate

— %

— %

(0.9)%

21.7 %

0.4 %

0.5 %

(0.4)%

14.8 %

27.8 %

0.3 %

(1.2)%

62.9 %

On December 22, 2017, the Tax Act was signed into law making significant changes to the Internal Revenue Code. Changes include, but are not limited to, a corporate tax rate decrease from 35% to 21% effective for tax years beginning after December 31, 2017, the transition of U.S. international taxation from a worldwide tax system to a territorial system, and a one-time transition tax on the mandatory deemed repatriation of cumulative foreign earnings as of December 31, 2017. In accordance with the Tax Act, the Company recorded \$129.2 as additional income tax expense in 2017, the period in which the legislation was enacted. The total expense included \$57.9 related to the transition tax and \$86.0 related to the remeasurement of certain deferred tax assets and liabilities. The Company also recorded a tax benefit of \$14.7 reversing a previously recorded tax liability related to undistributed foreign earnings. The Company continues to provide tax for foreign withholding taxes, foreign and U.S. state income taxes on future distributions of its foreign earnings.

The Company provides for deferred taxes on the undistributed earnings and profits of all foreign subsidiaries, determined under U.S. tax law. At year-end 2019, the amount of undistributed earnings and profits of all foreign subsidiaries was \$1,415.0. The Company anticipates that these foreign earnings and future earnings of its foreign subsidiaries that are not indefinitely reinvested will be sufficient to meet its U.S. cash needs. The Company is indefinitely reinvested in any excess of financial reporting over tax basis in its foreign subsidiaries that exceeds undistributed earnings and profits. At year-end 2019, the indefinitely reinvested excess of financial reporting over tax basis was \$107.5.

Deferred tax assets and liabilities include the following:

	2019	2018
Deferred Tax Assets:		
Loss carryforwards	\$ 139.8	\$ 157.0
Asbestos	101.5	108.7
Employee benefits	59.4	64.9
Accruals	46.0	47.7
Other	23.0	24.7
Gross deferred tax assets	369.7	403.0
Less: Valuation allowance	129.8	141.0
Net deferred tax assets	\$ 239.9	\$ 262.0
Deferred Tax Liabilities:		
Intangibles	\$ (43.0)	\$ (43.5)
Undistributed earnings	(33.8)	(28.2)
Accelerated depreciation	(26.9)	(27.2)
Investment	(0.2)	(0.2)
Total deferred tax liabilities	\$ (103.9)	\$ (99.1)
Net deferred tax assets	\$ 136.0	\$ 162.9

Deferred taxes are presented in the Consolidated Balance Sheets as follows:

	2019	2018
Non-current assets	\$ 138.1	\$ 164.5
Other non-current liabilities	(2.1)	(1.6)
Net deferred tax assets	\$ 136.0	\$ 162.9

The table included below provides a rollforward of our valuation allowance on net deferred income tax assets from December 31, 2016 to December 31, 2019.

	State	F	oreign	Total
DTA valuation allowance - December 31, 2016	\$ 45.9	\$	67.4	\$ 113.3
Change in assessment				_
Current year operations	26.5		30.2	56.7
DTA valuation allowance - December 31, 2017	\$ 72.4	\$	97.6	\$ 170.0
Change in assessment			(22.9)	(22.9)
Current year operations	(15.1)		9.0	(6.1)
DTA valuation allowance - December 31, 2018	\$ 57.3	\$	83.7	\$ 141.0
Change in assessment			5.6	5.6
Current year operations	(8.8)		(8.0)	(16.8)
DTA valuation allowance - December 31, 2019	\$ 48.5	\$	81.3	\$ 129.8

The Company continues to maintain a valuation allowance against certain deferred tax assets attributable to state net operating losses and tax credits, and certain foreign net deferred tax assets primarily in Luxembourg, China, Germany and India which are not expected to be realized. Management assesses the available positive and negative evidence to estimate whether sufficient future taxable income will be generated to permit the use of deferred tax assets. The cumulative loss incurred over the three-year period ending December 31, 2019 constitutes significant objective negative evidence, resulting in the recognition of a valuation allowance against the net deferred tax assets for these jurisdictions. Such objective negative evidence limits our ability to consider subjective positive evidence, such as our projections of future taxable income. The amount of the deferred tax asset considered realizable, however, could be adjusted if estimates of future taxable income change or if objective negative evidence in the form of cumulative losses is no longer present and additional weight can be given to subjective evidence. We have the following tax attributes available for utilization at December 31, 2019:

Attribute	Amount	First Year of Expiration
U.S. federal net operating losses	\$ 5.6	12/31/2027
U.S. state net operating losses	1,061.9	12/31/2021
U.S. federal tax credits	1.3	12/31/2021
U.S. state tax credits	1.1	12/31/2027
Foreign net operating losses ^(a)	338.7	12/31/2021

(a) Includes approximately \$230.3 of net operating loss carryforwards in Luxembourg as of December 31, 2019.

Excess tax benefits related to stock-based compensation of \$4.6, \$2.2 and \$2.7 for 2019, 2018 and 2017, respectively, were recorded as an income tax benefit in the statement of operations and have been reflected in the caption "U.S. permanent items" within the effective tax rate reconciliation table.

Uncertain Tax Positions

We recognize income tax benefits from uncertain tax positions only if, based on the technical merits of the position, it is more likely than not that the tax position will be sustained on examination by the taxing authorities. The tax benefits recognized in the Consolidated Financial Statements from such positions are measured based on the largest benefit that has a greater than 50% likelihood of being realized upon ultimate settlement.

A reconciliation of the beginning and ending amount of unrecognized tax benefits for each of the years ended December 31, 2019, 2018, and 2017 is as follows:

	2019	2018	2017
Unrecognized tax benefits – January 1	\$ 45.8	\$ 51.9	\$ 69.5
Additions for:			
Current year tax positions	1.5	1.5	1.1
Prior year tax positions	0.3		_
Reductions for:			
Prior year tax positions	(0.1)	(0.2)	(12.7)
Expiration of statute of limitations	(1.2)	(1.9)	(5.8)
Settlements	(0.1)	(5.5)	(0.2)
Unrecognized tax benefits – December 31	\$ 46.2	\$ 45.8	\$ 51.9

As of December 31, 2019, \$20.9 and \$1.2 of the unrecognized tax benefits would affect the effective tax rate for continuing operations and discontinued operations respectively, if realized. The Company operates in various tax jurisdictions and is subject to examination by tax authorities in these jurisdictions. The Company is currently under examination in several jurisdictions including the Czech Republic, Germany, Hong Kong, India, Italy, Japan, the U.S. and Venezuela.

The calculation of our tax liability for unrecognized tax benefits includes dealing with uncertainties in the application of complex tax laws and regulations in various tax jurisdictions. Due to the complexity of some uncertainties, the ultimate resolution may result in a payment that is materially different from our current estimate of the unrecognized tax benefit. Over the next 12 months, the net amount of the tax liability for unrecognized tax benefits in foreign and domestic jurisdictions could change by approximately \$14 due to changes in audit status, expiration of statutes of limitations and other events. The settlement of any future examinations could result in changes in the amounts attributable to the Company under its existing Tax Matters Agreement with Exelis and Xylem.

The following table summarizes the earliest open tax years by major jurisdiction as of December 31, 2019:

Jurisdiction	Earliest Open Year
China	2014
Czech Republic	2015
Germany	2010
Hong Kong	2007
India	2008
Italy	2009
Korea	2014
Luxembourg	2015
Mexico	2014
United States	2016

We classify interest relating to tax matters as a component of interest expense and tax penalties as a component of income tax expense in our Consolidated Statements of Operations. During 2019, 2018, and 2017 we recognized a net interest benefit of \$0.3, \$0.9, and \$2.4, respectively, related to tax matters. We had \$2.9, \$3.2, and \$4.1 of interest expense accrued from continuing and discontinued operations related to tax matters as of December 31, 2019, 2018, and 2017, respectively.

Tax Matters Agreement

In relation to ITT's 2011 spin-off of its Defense and Information Solutions business, Exelis Inc. (Exelis), and its water-related business, Xylem Inc. (Xylem), ITT entered into a Tax Matters Agreement with Exelis and Xylem that governs the respective rights, responsibilities and obligations of the companies after the 2011 spin-off with respect to tax liabilities and benefits, tax attributes, tax contests and other tax sharing regarding U.S. Federal, state, local and foreign income taxes, other tax matters and related tax returns. On May 29, 2015, Harris Corporation acquired Exelis and on June 29, 2019, Harris Corporation and L3 Technologies completed a merger.

As of December 31, 2019, examinations remained open for income taxes from certain state and foreign jurisdictions. The settlement of future examinations and additional audit service fees may result in changes in amounts attributable to us through the Tax Matters Agreement entered into with Exelis and Xylem. Currently we cannot reasonably estimate the amount of such changes.

NOTE 7 EARNINGS PER SHARE DATA

The following table provides a reconciliation of the data used in the calculation of basic and diluted common shares outstanding for the three years ended December 31, 2019, 2018 and 2017.

	2019	2018	2017
Basic weighted average common shares outstanding	87.7	87.7	88.3
Add: Dilutive impact of outstanding equity awards	0.9	1.0	0.7
Diluted weighted average common shares outstanding	88.6	88.7	89.0

Anti-dilutive shares are excluded from the computation of diluted earnings per share. There were no anti-dilutive shares as of December 31, 2019 and 2018. As of December 31, 2017, there were 0.3 anti-dilutive shares with an average exercise price of \$42.43 that had expiration dates from 2024 to 2025.

In addition, 0.1 of outstanding employee PSU awards (see Note 17, Long-Term Incentive Employee Compensation, for additional information on PSU awards) were excluded from the computation of diluted earnings per share for the year ended December 31, 2017 as the necessary performance conditions had not yet been satisfied.

NOTE 8 RECEIVABLES, NET

	2019	2018
Trade accounts receivable	\$ 562.3	\$ 531.7
Notes receivable	6.2	3.7
Other	21.2	22.9
Receivables, gross	589.7	558.3
Less: allowance for doubtful accounts	(11.3)	(18.3)
Receivables, net	\$ 578.4	\$ 540.0

The following table displays a rollforward of the allowance for doubtful accounts for the years ended December 31, 2019, 2018, and 2017.

	2019	2018	2017
Allowance for doubtful accounts – January 1	\$ 18.3	\$ 16.1	\$ 15.4
Charges to income	2.1	3.6	3.6
Write-offs	(9.2)	(0.8)	(4.4)
Foreign currency and other	0.1	(0.6)	1.5
Allowance for doubtful accounts – December 31	\$ 11.3	\$ 18.3	\$ 16.1

NOTE 9 INVENTORIES, NET

	2019	2018
Finished goods	\$ 80.7	\$ 64.2
Work in process	83.9	83.1
Raw materials	228.3	233.2
Inventories, net	\$ 392.9	\$ 380.5

Inventory related to long-term contracts of \$45.7 as of December 31, 2018 has been reclassified to the respective inventory categories to conform with the current year presentation.

NOTE 10 OTHER CURRENT AND NON-CURRENT ASSETS

	2019	2018
Asbestos-related assets	\$ 67.2	\$ 67.1
Advance payments and other prepaid expenses	45.4	44.5
Contract assets	18.0	21.8
Prepaid income taxes	20.6	19.6
Other	2.2	10.4
Other current assets	\$ 153.4	\$ 163.4
Other employee benefit-related assets	\$ 133.6	\$ 104.7
Operating lease right-of-use assets (see Note 2)	91.7	_
Capitalized software costs	30.1	35.3
Environmental-related assets	22.2	23.4
Equity method investments	9.8	7.7
Other	29.1	25.7
Other non-current assets	\$ 316.5	\$ 196.8

NOTE 11 PLANT, PROPERTY AND EQUIPMENT, NET

	Useful life (in years)	2019	2018
Machinery and equipment	2 - 10	\$ 1,128.9	\$ 1,056.9
Buildings and improvements	5 - 40	279.3	265.3
Furniture, fixtures and office equipment	3 - 7	79.8	69.1
Construction work in progress		48.8	67.9
Land and improvements		33.3	27.8
Other		10.5	10.3
Plant, property and equipment, gross		1,580.6	1,497.3
Less: accumulated depreciation		(1,049.1)	(978.5)
Plant, property and equipment, net		\$ 531.5	\$ 518.8

Depreciation expense of \$84.1, \$82.8 and \$78.3 was recognized in 2019, 2018 and 2017, respectively.

NOTE 12 GOODWILL AND OTHER INTANGIBLE ASSETS, NET

Goodwill

Changes in the carrying amount of goodwill for the years ended December 31, 2019 and 2018 by segment are as follows:

	 lotion inologies	Industrial Process	-	onnect & Control chnologies	Total
Goodwill - December 31, 2017	\$ 295.6	\$ 324.5	\$	266.7 \$	886.8
Adjustments to purchase price allocations	3.3			—	3.3
Foreign currency	(4.4)	(8.7)		(1.1)	(14.2)
Goodwill - December 31, 2018	\$ 294.5	\$ 315.8	\$	265.6 \$	875.9
Goodwill acquired	—	40.1		14.3	54.4
Foreign currency	(0.9)	(1.8)		(0.4)	(3.1)
Goodwill - December 31, 2019	\$ 293.6	\$ 354.1	\$	279.5 \$	927.2

Goodwill acquired in 2019 is related to our acquisitions of Rheinhütte Pumpen Group (Rheinhütte) and Matrix Composites, Inc. (Matrix). Goodwill acquired represents the preliminary calculation of the excess of the purchase price over the net assets acquired, the valuation of which is pending completion. Upon completion of the valuation, goodwill acquired will be adjusted to reflect the final fair value of the net assets acquired. Goodwill adjustments to purchase price allocations in 2018 are related to our acquisition of Axtone Railway Components (Axtone) in 2017. See Note 22, Acquisitions, for further information.

Other Intangible Assets

Information regarding our other intangible assets is as follows:

	 D	ecer	nber 31, 201	9		December 31, 2018								
	Gross Carrying Amount	arrying Accumulated Net Carrying Accumulated						Net Intangibles						
Customer relationships	\$ 176.3	\$	(99.6)	\$	76.7	\$	164.1	\$	(86.2)	\$	77.9			
Proprietary technology	58.4		(28.1)		30.3		53.7		(25.6)		28.1			
Patents and other	21.8		(13.0)		8.8		12.3		(9.4)		2.9			
Finite-lived intangible total	256.5		(140.7)		115.8		230.1		(121.2)		108.9			
Indefinite-lived intangibles	22.2		_		22.2		27.2		_		27.2			
Other Intangible Assets	\$ 278.7	\$	(140.7)	\$	138.0	\$	257.3	\$	(121.2)	\$	136.1			

Customer relationships, proprietary technology and patents and other intangible assets are amortized over weighted average lives of approximately 12.4 years, 12.6 years and 6.1 years, respectively. Indefinite-lived intangibles primarily consist of brands and trademarks.

The fair value of intangible assets acquired in connection with the purchase of Rheinhütte includes \$7.4 of proprietary technology with a useful life of 7 years, \$4.5 of customer relationships with a useful life of 9 years, and \$3.3 for a trade name with an indefinite life. The fair value of intangible assets acquired in connection with the purchase of Matrix includes \$8.5, primarily related to customer relationships with a useful life of 14.0 years.

Amortization expense related to intangible assets for 2019, 2018 and 2017 was \$20.8, \$17.6 and \$18.9, respectively. Estimated amortization expense for each of the five succeeding years is as follows:

2020	\$ 24	4.5
2021	18	8.6
2022	18	8.4
2023	15	5.8
2024	ç	9.3
Thereafter	29	9.2

NOTE 13 ACCRUED LIABILITIES AND OTHER NON-CURRENT LIABILITIES

	2019	2018
Compensation and other employee-related benefits	\$ 145.4	\$ 152.2
Contract liabilities and other customer-related liabilities	74.6	82.2
Asbestos-related liability	86.0	74.2
Accrued income taxes and other tax-related liabilities	27.0	33.7
Operating lease liabilities (see Note 2)	19.9	_
Environmental and other legal matters	17.9	24.0
Accrued warranty costs	18.5	16.2
Other	41.5	34.2
Accrued and other current liabilities	\$ 430.8	\$ 416.7
Environmental liabilities	\$ 55.8	\$ 59.5
Operating lease liabilities (see Note 2)	76.0	_
Compensation and other employee-related benefits	32.4	34.2
Deferred income taxes and other tax-related liabilities	24.0	25.0
Other	46.5	47.8
Other non-current liabilities	\$ 234.7	\$ 166.5

NOTE 14 LEASES

The Company's lease portfolio primarily relates to real estate, which may be used for manufacturing or nonmanufacturing purposes, and contains lease terms generally ranging between one and 18 years. Our lease portfolio also includes vehicles and other equipment such as forklifts. Substantially all of our leases are classified as operating leases. Short-term lease costs, variable lease costs, and sublease income are not considered material. Operating lease costs were \$25.1, \$25.1, and \$25.4 for the year ended December 31, 2019, 2018 and 2017, respectively.

Future operating lease payments under non-cancellable operating leases with an initial term in excess of 12 months as of December 31, 2019 are shown below.

2020	\$ 22.5
2021	18.4
2022	15.0
2023	10.7
2024	7.2
Thereafter	54.4
Total future lease payments	128.2
Less: amount of lease payments representing interest	32.3
Present value of future lease payments	\$ 95.9
Short-term lease liability	\$ 19.9
Long-term lease liability	76.0
Present value of future lease payments	\$ 95.9

Future minimum operating lease payments under non-cancellable operating leases with an initial term in excess of 12 months as of December 31, 2018 are shown below.

2019	\$ 22.2
2020	16.8
2021	12.6
2022	10.2
2023	8.1
Thereafter	46.4
Total minimum lease payments	\$ 116.3

Our lease portfolio has a weighted average remaining lease term of 13.8 years, and the weighted average discount rate is 3.2%. During the year ended December 31, 2019, we recognized non-cash right-of-use assets of \$31.6 for new leases entered into during the period, primarily related to the lease renewal of a key manufacturing site in our Connect & Control segment. Operating cash outflows from operating leases during the year ended December 31, 2019 were \$22.6.

NOTE 15 DEBT

	2019	2018
Commercial paper	\$ 84.2	\$ 114.4
Current maturities of long-term debt and finance leases	2.3	1.8
Commercial paper and current maturities of long-term debt	86.5	116.2
Long-term debt and finance leases	12.9	8.8
Total debt and finance leases	\$ 99.4	\$ 125.0

Commercial Paper

Commercial paper outstanding as of December 31, 2019 and 2018 was issued entirely through the Company's euro program and had an associated weighted average interest rate of 0.05% and 0.06%, respectively. The outstanding commercial paper for both periods had maturity terms less than three months from the date of issuance.

Short-term Loans

On November 25, 2014, we entered into a competitive advance and revolving credit facility agreement (the Revolving Credit Agreement) with a consortium of third party lenders including JP Morgan Chase Bank, N.A., as administrative agent, and Citibank, N.A., as syndication agent. On November 5, 2019, we amended the Revolving Credit Agreement to extend the maturity date from November 25, 2021 to November 25, 2022. The interest rate and fees associated with drawn amounts are unchanged. The Revolving Credit Agreement provides for an aggregate principal amount of up to \$500 of (i) revolving extensions of credit (the revolving loans) outstanding at any time, (ii) competitive advance borrowing option which will be provided on an uncommitted competitive advance basis through an auction mechanism (the competitive advances), and (iii) letters of credit in a face amount up to \$100 at any time outstanding. Subject to certain conditions, we are permitted to terminate permanently the total commitments and reduce commitments in minimum amounts of \$10. We are also permitted, subject to certain conditions, to request that lenders increase the commitments under the facility by up to \$200 for a maximum aggregate principal amount of \$700. Borrowings under the credit facility are available in U.S. dollars, Euros or British pound sterling.

At our election, the interest rate per annum applicable to the competitive advances will be obtained from bids in accordance with competitive auction procedures. At our election, interest rate per annum applicable to the revolving loans will be based on either (i) a Eurodollar rate determined by reference to LIBOR, adjusted for statutory reserve requirements, plus an applicable margin or (ii) a fluctuating rate of interest determined by reference to the greatest of (a) the prime rate of JPMorgan Chase Bank, N.A., (b) the federal funds effective rate plus one-half of 1% or (c) the 1-month LIBOR rate, adjusted for statutory reserve requirements, plus 1%, in each case, plus an applicable margin. As of December 31, 2019 and 2018, we had no outstanding obligations under the credit facility.

The credit facility contains customary affirmative and negative covenants that, among other things, will limit or restrict our ability to: incur additional debt or issue guarantees; create liens; enter into certain sale and lease-back transactions; merge or consolidate with another person; sell, transfer, lease or otherwise dispose of assets; liquidate or dissolve; and enter into restrictive covenants. Additionally, the Revolving Credit Agreement requires us not to permit the ratio of consolidated total indebtedness to consolidated earnings before interest, taxes, depreciation and amortization (EBITDA) (leverage ratio) to exceed 3.00 to 1.00 at any time, or the ratio of consolidated EBITDA to consolidated interest expense (interest coverage ratio) to be less than 3.00 to 1.00. At December 31, 2019, our interest coverage ratio and leverage ratio were within the prescribed thresholds. In the event of a ratings downgrade of the Company to a level below investment grade, the direct and indirect significant U.S. subsidiaries of the Company would be required to guarantee the obligations under the Revolving Credit Agreement.

NOTE 16 POSTRETIREMENT BENEFIT PLANS

Defined Contribution Plans

Substantially all of ITT's U.S. and certain international employees are eligible to participate in a defined contribution plan. ITT sponsors numerous defined contribution savings plans, which allow employees to contribute a portion of their pre-tax and/or after-tax income in accordance with specified guidelines. Certain plans require us to match a portion of the employee contributions. Company contributions charged to expense amounted to \$17.6, \$17.1 and \$16.7 for 2019, 2018 and 2017, respectively.

The ITT Stock Fund, an investment option in our U.S. based defined contribution plan, is considered an employee stock ownership plan and, as a result, participants in the ITT Stock Fund may receive dividends in cash or may reinvest such dividends into the ITT Stock Fund. The ITT Stock Fund held approximately 0.2 shares of ITT common stock at December 31, 2019.

Defined Benefit Plans

ITT sponsors numerous defined benefit pension plans which have approximately 1,800 active participants. As of December 31, 2019, of our total projected benefit obligation, our U.S. plans represented 76% and international pension plans represented 24%. The U.S. plans are frozen. International plan benefits are primarily determined based on participant years of service, future compensation, and age at retirement or termination.

ITT also provides health care and life insurance benefits for eligible U.S. employees upon retirement. In some cases, the plan is still open to certain union employees, but for the majority of our businesses these plans are closed to new participants. The majority of the liability pertains to retirees with postretirement medical insurance.

U.S. Qualified Pension Plan Termination

On February 19, 2020, the Company's Board of Directors conditionally authorized the termination of our U.S. qualified pension plan by offering lump sum distributions to certain participants and transferring the plan's remaining benefit obligations to an insurance company through one or more group annuity contracts. The current projected benefit obligation is \$296. Ultimate plan termination is subject to certain considerations, including regulatory review, interest rates and annuity pricing. If we proceed with the termination of the plan, the transaction is expected to occur in the second half of 2020 and would be funded with plan assets, \$319.9 as of December 31, 2019. Any additional funding, if necessary, would be made with cash. Our investment strategy has since been updated to reduce risk by increasing the asset allocation to 100% fixed income and cash (see investment policy below). At the time such a transaction were to close, an insurance company (or companies) would assume responsibility for paying and administering pension benefits that had been an obligation of the plan to plan participants and their beneficiaries. Upon transfer of the pension obligation, we expect to recognize a non-cash pension settlement charge of approximately \$130 to \$140 before tax, which includes recognition of the remaining pension losses, currently recorded in accumulated other comprehensive loss, and derecognition of the net assets of the plan. As a result of the plan transfer, the amount of benefits to be received by participants will not be impacted and will be protected by state guaranty associations.

Balance Sheet Information

The following table provides a summary of the funded status of our postretirement benefit plans and the presentation of the funded status within our Consolidated Balance Sheet as of December 31, 2019 and 2018.

		2019		2018								
	Pension	Other Benefits	Total	Pension	Other Benefits	Total						
Fair value of plan assets	\$ 320.5	\$ 1.3	\$ 321.8	\$ 278.4	\$ 2.9	\$ 281.3						
Projected benefit obligation	408.8	116.6	525.4	381.2	118.6	499.8						
Funded status	\$ (88.3)	\$ (115.3)	\$ (203.6)	\$ (102.8)	\$ (115.7)	\$ (218.5)						
Amounts reported within:												
Non-current assets	\$ 24.5	\$ —	\$ 24.5	\$ 1.7	\$ —	\$ 1.7						
Accrued liabilities	(4.9)	(9.3)	(14.2)	(4.1)	(7.9)	(12.0)						
Non-current liabilities	(107.9)	(106.0)	(213.9)	(100.4)	(107.8)	(208.2)						

A portion of our projected benefit obligation includes amounts that have not yet been recognized as expense in our results of operations. Such amounts are recorded within accumulated other comprehensive loss until they are amortized as a component of net periodic postretirement cost. The following table provides a summary of amounts recorded within accumulated other comprehensive loss at December 31, 2019 and 2018.

		2019			2018	
	Other Pension Benefits Total		Total	Pension	Other Benefits	Total
Net actuarial loss	\$ 143.4	\$ 37.8	\$ 181.2	\$ 148.7	\$ 36.7	\$ 185.4
Prior service cost (benefit)	0.4	(32.2)	(31.8)	1.1	(39.0)	(37.9)
Total	\$ 143.8	\$ 5.6	\$ 149.4	\$ 149.8	\$ (2.3)	\$ 147.5

The following tables provide a rollforward of the benefit obligation, plan assets and funded status for our U.S. and international pension plans and our other employee-related defined benefit plans for the years ended December 31, 2019 and 2018.

		2	019		2018						
	U.S.	Int'l	Other Benefits	Total	U.S.	Int'l	Other Benefits	Total			
Change in benefit obligation											
Benefit obligation – January 1	\$291.8	\$ 89.4	\$ 118.6	\$ 499.8	\$ 325.7	\$ 93.3	\$ 138.1	\$ 557.1			
Service cost	0.2	1.2	0.7	2.1	0.4	1.3	0.9	2.6			
Interest cost	11.1	1.5	4.0	16.6	10.1	1.4	4.5	16.0			
Amendments	_	_	1.7	1.7	_	(0.1)	_	(0.1)			
Actuarial loss (gain)	31.0	10.4	3.6	45.0	(18.9)	0.9	(15.8)	(33.8)			
Benefits paid	(23.7)	(3.0)	(12.0)	(38.7)	(19.6)	(3.0)	(9.1)	(31.7)			
Acquired	_	0.5	_	0.5	_	_	_	_			
Settlement	_	_	_	_	(5.9)	(0.4)	_	(6.3)			
Foreign currency translation		(1.6)	_	(1.6)	_	(4.0)	_	(4.0)			
Benefit obligation – December 31	\$310.4	\$ 98.4	\$ 116.6	\$ 525.4	\$ 291.8	\$ 89.4	\$ 118.6	\$ 499.8			

			2	019		2018							
	U.S.		Int'l	Other Benefits	Total	U.S.		Int'l	E	Other Benefits	Tota		
Change in plan assets													
Plan assets – January 1	\$277.8	\$	0.6	\$ 2.9	\$ 281.3	\$ 320.9	\$	0.6	\$	5.2	\$ 326.7		
Actual return on plan assets	57.7		—	0.4	58.1	(16.8)		—		(0.1)	(16.9		
Employer contributions	9.9		3.0	10.0	22.9	0.9		3.4		6.9	11.2		
Benefits and expenses paid	(25.5)	(3.0)	(12.0)	(40.5)	(21.3)		(3.0)		(9.1)	(33.4		
Settlement			_	_	_	(5.9)		(0.4)		_	(6.3		
Plan assets – December 31	\$319.9	\$	0.6	\$ 1.3	\$ 321.8	\$ 277.8	\$	0.6	\$	2.9	\$ 281.3		
Funded status at end of year	\$ 9.5	\$	(97.8)	\$ (115.3)	\$ (203.6)	\$ (14.0)	\$	(88.8)	\$	(115.7)	\$ (218.5		

The accumulated benefit obligation for all defined benefit pension plans was \$406.3 and \$379.1 at December 31, 2019 and 2018, respectively. Information for pension plans with an accumulated benefit obligation in excess of plan assets is included in the following table.

	2019	2018
Projected benefit obligation	\$ 112.8	\$ 233.2
Accumulated benefit obligation	110.3	231.0
Fair value of plan assets	_	128.6

Statements of Operations Information

The following table provides the components of net periodic postretirement cost and other amounts recognized in other comprehensive loss for each of the years ended December 31, 2019, 2018 and 2017 as they pertain to our defined benefit pension plans.

	2019						2018					2017					
	ι	J.S.		Int'l		Total	U.S.		Int'l	Т	otal	ι	J.S.		Int'l		Total
Net periodic postretirement cost - pens	ion																
Service cost	\$	0.2	\$	1.2	\$	1.4	\$ 0.4	\$	1.3	\$	1.7	\$	1.5	\$	1.4	\$	2.9
Interest cost	1	1.1		1.5		12.6	10.1		1.4	1	1.5	1	0.5		1.6		12.1
Expected return on plan assets	(1	4.8)		—		(14.8)	(15.8)		—	(1	5.8)	(1	5.2)		—	1	(15.2)
Amortization of net actuarial loss		4.3		0.8		5.1	4.9		0.9		5.8		6.6		1.0		7.6
Amortization of prior service cost		0.7		_		0.7	0.9		_		0.9		1.0		_		1.0
Net periodic postretirement cost		1.5		3.5		5.0	0.5		3.6		4.1		4.4		4.0		8.4
Curtailment or settlement charges		_		_		_	1.7		_		1.7		3.7		_		3.7
Total net periodic postretirement cost		1.5		3.5		5.0	2.2		3.6		5.8		8.1		4.0		12.1
Other changes in plan assets and bener recognized in other comprehensive inc		ligat	tion	S													
Net actuarial (gain) loss	(1	0.2)		10.3		0.1	15.4		0.8	1	6.2	(7.9)		(0.3)		(8.2)
Prior service cost		—		_		_	_		(0.1)	(0.1)		1.6		—		1.6
Amortization of net actuarial loss	(4.3)		(0.8)		(5.1)	(6.6)		(0.9)	(7.5)	(6.6)		(1.0)		(7.6)
Amortization of prior service cost	(0.7)		—		(0.7)	(0.9)		_	(0.9)	(4.7)		_		(4.7)
Foreign currency translation		_		(0.3)		(0.3)	—		(1.0)	(1.0)		—		2.9		2.9
Total change recognized in other comprehensive income	(1	5.2)		9.2		(6.0)	7.9		(1.2)		6.7	(1	7.6)		1.6		(16.0)
Total impact from net periodic postretirement cost and changes in other comprehensive income	\$ (1	3.7)	\$	12.7	\$	(1.0)	\$ 10.1	\$	2.4	\$1	2.5	\$ (9.5)	\$	5.6	\$	(3.9)

In 2018, we recorded a settlement loss of \$1.7 related to retiree lump sum pension payments in our Industrial Process segment. In 2017, we recorded a curtailment loss of \$3.7 related to a freeze of benefit accruals for certain employees at our Industrial Process segment.

The following table provides the components of net periodic postretirement cost and other amounts recognized in other comprehensive loss for each of the years ended December 31, 2019, 2018 and 2017 as they pertain to other employee-related defined benefit plans.

	2019	2018	2017
Net periodic postretirement cost - other postretirement			
Service cost	\$ 0.7	\$ 0.9	\$ 0.8
Interest cost	4.0	4.5	4.4
Expected return on plan assets	(0.2)	(0.1)	(0.3)
Amortization of net actuarial loss	2.3	4.0	4.4
Amortization of prior service credit	(5.1)	(5.3)	(5.8)
Total net periodic postretirement cost	1.7	4.0	3.5
Other changes in plan assets and benefit obligations recognized in other comprehensive income			
Net actuarial (gain) loss	3.4	(15.6)	1.0
Prior service cost	1.7	_	0.5
Amortization of net actuarial loss	(2.3)	(4.0)	(4.4)
Amortization of prior service credit	5.1	5.3	5.8
Total changes recognized in other comprehensive income	 7.9	(14.3)	2.9
Total impact from net periodic postretirement cost and changes in other comprehensive income	\$ 9.6	\$ (10.3)	\$ 6.4

Postretirement Plan Assumptions

The determination of projected benefit obligations and the recognition of expenses related to postretirement benefit plans are dependent on various assumptions that are judgmental and developed in consultation with external advisors. Management develops each assumption using relevant Company experience in conjunction with market-related data for each individual country in which such plans exist. Periodically, the Company performs experience studies to validate certain actuarial assumptions such as age of retirement, rates of turnover, utilization of optional forms of payments. In 2015, the Company performed such study for its U.S. pension and other benefit plans and reflected the results in its valuation. The actuarial assumptions are based on the provisions of the applicable accounting pronouncements, review of various market data and discussion with our external advisors. Assumptions are reviewed annually and adjusted as necessary. Changes in these assumptions could materially affect our financial statements.

The following table provides the weighted-average assumptions used to determine projected benefit obligations and net periodic postretirement cost, as they pertain to our U.S. and non-U.S. defined benefit pension plans and other employee-related defined benefit plans.

	2019			2018			
	U.S.	Int'l	Other Benefits	U.S.	Int'l	Other Benefits	
Obligation Assumptions:							
Discount rate	3.2%	1.0%	3.2%	4.3%	1.7%	4.3%	
Rate of future compensation increase	N/A	3.0%	N/A	N/A	3.2%	N/A	
Cost Assumptions:							
Discount rate	4.3%	1.7%	4.3%	3.6%	1.7%	3.6%	
Expected return on plan assets	6.0%	1.0%	6.0%	6.0%	1.0%	6.0%	

The discount rate is used to calculate the present value of expected future benefit payments at the measurement date. The discount rate assumption is based on current investment yields of high-quality fixed income investments during the retirement benefits maturity period. The pension discount rate is determined by considering an interest rate yield curve comprising AAA/AA bonds, with maturities that are generally between zero and 30 years, developed by the plan's actuaries. Annual benefit payments are then discounted to present value using this yield curve to develop a single discount rate matching the plan's characteristics.

We estimate the service and interest components of net periodic benefit cost of the U.S. defined benefit plans by discounting the individual expected cash flows underlying the service cost and interest cost using the applicable spot rates from the yield curve used to discount the cash flows in measuring the benefit obligation.

The rate of future compensation increase assumption for foreign plans reflects our long-term actual experience and future and near-term outlook. The rate of future compensation increase assumption is not applicable for U.S. plans because the plan is frozen.

The Company has updated the mortality assumption to reflect the most recent projection update.

The assumed rate of future increases in the per capita cost of health care (the health care trend rate) is 6.8% for pre-age 65 retirees and 6.0% for post-age 65 retirees for 2020, decreasing ratably to 4.5% in 2028. To the extent that actual experience differs from these assumptions, the effect will be amortized over the average future working life or life expectancy of the plan participants.

The expected long-term rate of return on assets reflects the expected returns for each major asset class in which the plans invest, the weight of each asset class in the target mix, the correlations among asset classes, and their expected volatilities. Our expected return on plan assets is estimated by evaluating both historical returns and estimates of future returns based on our target asset allocation. Specifically, we estimate future returns based on independent estimates of asset class returns weighted by the target investment allocation.

The chart below shows actual returns compared to the expected long-term returns for our postretirement plans that were utilized in the calculation of the net periodic postretirement cost for each respective year.

	2019	2018	2017
Expected rate of return on plan assets	6.0%	6.0 %	7.0%
Actual rate of return on plan assets	21.7%	(5.4)%	18.0%

For the recognition of net periodic postretirement cost, the calculation of the expected return on plan assets is generally derived using a market-related value of plan assets based on average asset values at the measurement date over the last five years. The use of fair value, rather than a market-related value, of plan assets could materially affect net periodic postretirement cost.

Investment Policy

The investment strategy for managing worldwide postretirement benefit plan assets is to seek an optimal rate of return relative to an appropriate level of risk for each plan. Investment strategies vary by plan, depending on the specific characteristics of the plan, such as plan size and design, funded status, liability profile and legal requirements. Pursuant to our potential U.S. qualified plan termination, the investment policy was updated in December 2019 to reduce risk by increasing the target allocation to 100% fixed income and cash. In fiscal 2020, we expect our estimate of the long term annual return on assets to be 4% for the U.S. defined benefit plans reflecting the current asset allocation.

Substantially all of the postretirement benefit plan assets are managed on a commingled basis in a master investment trust. With respect to the master investment trust, the Company allows itself broad discretion to invest tactically to respond to changing market conditions, while staying reasonably within the target asset allocation ranges prescribed by its investment guidelines. In making these asset allocation decisions, the Company takes into account recent and expected returns and volatility of returns for each asset class, the expected correlation of returns among the different investments, as well as anticipated funding and cash flows. To enhance returns and mitigate risk, the Company diversifies its investments by strategy, asset class, geography and sector.

The following table provides the allocation of postretirement benefit plan assets by asset category, as of December 31, 2019 and 2018, and the current asset allocation ranges by asset category.

	2019	2018	Asset Allocation Range
U.S. equities	—%	18%	0-50 %
International equities	—%	9%	0-25 %
Fixed income	74%	72%	50-100 %
Cash and other	26%	1%	0-50 %

Fair Value of Plan Assets

In measuring plan assets at fair value, a fair value hierarchy is applied which categorizes and prioritizes the inputs used to estimate fair value into three levels. The fair value hierarchy is based on maximizing the use of observable inputs and minimizing the use of unobservable inputs when measuring fair value. Classification within the fair value hierarchy is based on the lowest level input that is significant to the fair value measurement. The three levels of the fair value hierarchy are defined as follows:

- Level 1 inputs are quoted prices (unadjusted) in active markets for identical assets or liabilities.
- Level 2 inputs are other than quoted prices included within level 1 that are observable for the asset or liability, either directly or indirectly. Level 2 inputs include quoted prices (in non-active markets or in active markets for similar assets or liabilities), inputs other than quoted prices that are observable, and inputs that are derived principally from or corroborated by observable market data by correlation or other means.
- Level 3 inputs are unobservable inputs for the assets or liabilities.

Collective trusts are valued at net asset value (NAV) as a practical expedient and thus are not leveled in this table, but are included in the totals column to assist in reconciling to fair value of plan assets. Mutual funds are valued at quoted market prices that represent the NAV of shares and are classified within level 1 of the fair value hierarchy. Cash and cash equivalents are held in money market or short-term investment funds and are classified within level 1 of the fair value hierarchy.

The following table provides the investments at fair value held by our postretirement benefit plans at December 31, 2019 and 2018, by asset class.

	-			P	ension		Other Benefits			
2019		Le	vel 1		asured t NAV	Total	Le	evel 1	Total	
Collective Trusts:										
Fixed income		\$	_	\$	238.8	\$ 238.8	\$	—	\$	_
Mutual funds					_			1.3		1.3
Cash and other			81.7		_	81.7				_
Total		\$	81.7	\$	238.8	\$ 320.5	\$	1.3	\$	1.3
	-	Pension			Other Benef			s		
2018		Lev	el 1		asured NAV	Total	Level 1		Т	otal
Collective Trusts:										
U.S. equity	9	\$		\$	49.4	\$ 49.4	\$		\$	_
International equity			—		25.1	25.1				—
Fixed income					201.8	201.8				_
Mutual funds			—			—		2.9		2.9
Cash and other			2.1			2.1				_
Total		\$	2.1	\$	276.3	\$ 278.4	\$	2.9	\$	2.9

Contributions

While we make contributions to our postretirement benefit plans when considered necessary or advantageous to do so, the minimum funding requirements established by local government funding or taxing authorities, or established by other agreements, may influence future contributions. Funding requirements under IRS rules are a major consideration in making contributions to our defined benefit pension plans in the U.S. In addition, we fund certain of our international pension plans in countries where funding is allowable and tax-efficient. During 2019 and 2018, we contributed \$12.9 and \$4.3 to our global pension plans which includes a \$9.0 discretionary contribution to our U.S. pension plans in 2019. We anticipate making contributions to our global pension plans of approximately \$5 during 2020 which excludes cash funding required to terminate the U.S. qualified pension plan.

We contributed \$10.0 and \$6.9 to our other employee-related defined benefit plans during 2019 and 2018, respectively. We estimate that the 2020 contributions to our other employee-related defined benefit plans will be approximately \$10.

Estimated Future Benefit Payments

The following table provides the projected timing of payments for benefits earned to date and the expectation that certain future service will be earned by current active employees for our pension and other employee-related benefit plans.

	Pe	U.S. ension ^(a)	Pe	Int'l ension	В	Other enefits
2020	\$	23.5	\$	4.0	\$	10.4
2021		23.1		3.8		9.3
2022		22.4		3.5		8.9
2023		21.6		3.7		8.5
2024		20.9		3.9		8.2
2025 - 2029		96.9		19.1		35.4

(a) Excludes any impact of a potential U.S. pension plan termination.

NOTE 17 LONG-TERM INCENTIVE EMPLOYEE COMPENSATION

The 2011 Omnibus Incentive Plan (2011 Incentive Plan) was approved by shareholders and established in May of 2011 to provide for the awarding of options on common shares and full value restricted common shares or units to employees and non-employee directors. As of December 31, 2019, 37.5 shares were available for future grants under the 2011 Incentive Plan. The Company makes shares available for the exercise of stock options or vesting of restricted shares or units by purchasing shares in the open market.

Our long-term incentive plan (LTIP) awards are comprised of two components: restricted stock units (RSUs) and performance stock units (PSUs). Prior to 2017, our LTIP awards also included non-qualified stock options (NQOs). The majority of RSUs settle in shares; however RSUs and PSUs granted to certain international employees are settled in cash. We account for NQOs and equity-settled RSUs and PSUs as equity-based compensation awards and cash-settled RSUs and PSUs are accounted for as liability-based awards. PSUs contain equally weighted performance conditions for total shareholder return (TSR) and return on invested capital (ROIC). PSUs vest based on predetermined performance metrics that align with the Company's stock price and financial performance following a three-year performance period and are subject to a payout factor which includes a maximum and minimum payout. PSUs are accounted for as two distinct awards, a TSR award and a ROIC award.

LTIP costs are primarily recorded within general and administrative expenses, at fair value over the requisite service period (typically three years) on a straight-line basis and are reduced by forfeitures as they occur. These costs impacted our consolidated results of operations as follows:

	2019	2018	2017
Equity-based awards	\$ 15.7	\$ 21.6	\$ 18.1
Liability-based awards	2.8	1.5	2.8
Total share-based compensation expense	\$ 18.5	\$ 23.1	\$ 20.9

As of December 31, 2019, there was \$16.8 of total unrecognized compensation cost related to non-vested equity awards. This cost is expected to be recognized ratably over a weighted-average period of 1.7 years. Additionally, unrecognized compensation cost related to liability-based awards was \$1.6, which is expected to be recognized ratably over a weighted-average period of 1.4 years.

Non-Qualified Stock Options

NQOs generally vest over or at the conclusion of a 3-year period and are exercisable over 10 years, except in certain instances of death, retirement or disability. The weighted average exercise price per share is the fair market value of the underlying common stock on the date each option is granted.

A summary of activity related to our NQOs as of December 31, 2019, 2018 and 2017 is presented below.

	2019			2018			2017			
Stock Options	Shares		leighted Average Exercise Price	Shares		/eighted Average Exercise Price	Shares		/eighted Average Exercise Price	
Outstanding – January 1	0.7	\$	35.04	0.9	\$	34.07	1.4	\$	30.57	
Granted	_		_	_		_	_		_	
Exercised	(0.4)		36.08	(0.2)		30.52	(0.5)		22.95	
Forfeited or expired	_		_	_		_	_		_	
Outstanding – December 31	0.3	\$	33.55	0.7	\$	35.04	0.9	\$	34.07	
Options exercisable – December 31	0.3	\$	33.55	0.5	\$	36.04	0.5	\$	32.24	

The aggregate intrinsic value of options exercised (which is the amount by which the stock price exceeded the exercise price of the options on the date of exercise) as of December 31, 2019, 2018 and 2017 was \$11.1, \$4.5 and \$10.6, respectively.

The amount of cash received from the exercise of stock options was \$14.9, \$5.8 and \$11.2 for 2019, 2018 and 2017, respectively. The income tax benefit realized during 2019, 2018 and 2017 associated with exercised stock options and vested restricted stock was \$6.5, \$3.0 and \$7.0, respectively. Excess tax benefits arising from exercised stock options and vested restricted stock were \$4.6, \$2.2 and \$2.7 for 2019, 2018 and 2017, respectively.

The following table summarizes information about our outstanding and exercisable stock options at December 31, 2019.

Exercise Prices	Number of shares	Weighted Average Remaining Contractual Life (in years)	Aggregate Intrinsic Value
\$19.97 - \$26.76	0.1	2.3	5.0
\$33.01	0.1	6.1	2.9
\$41.52 - \$43.52	0.1	4.9	3.7
	0.3	4.3	\$ 11.6

As of December 31, 2019, there were no options "out-of-the-money" and all options outstanding were fully vested. The aggregate intrinsic value in the preceding table represents the total pre-tax intrinsic value, based on ITT's closing stock price of \$73.91 as of December 31, 2019, which would have been received by the option holders had all option holders exercised their options as of that date.

The fair value of each option grant was estimated on the date of grant using the binomial lattice pricing model which incorporates multiple and variable assumptions over time, including assumptions such as employee exercise patterns, stock price volatility and changes in dividends. There were no NQOs granted in 2019, 2018 or 2017.

Restricted Stock Units and Performance Stock Units

The fair value of equity-settled restricted stock units is determined using the closing price of the Company's common stock on the date of grant. The fair value of cash-settled RSUs is remeasured using the closing price of ITT's common stock at the end of each reporting period. Recipients do not have voting rights and do not receive cash dividends during the restriction period. Dividend equivalents on RSUs, which are subject to forfeiture, are accrued and paid in cash upon vesting of the RSU. If a recipient retires or is terminated other than for cause, a pro rata portion of the RSU may vest.

For PSUs, the fair value of the ROIC award is based on the closing price of ITT common stock on the date of grant less the present value of expected dividend payments during the vesting period. For ROIC awards granted in 2019, a dividend yield of 1.01% was assumed based on ITT's annualized dividend payment of \$0.588 per share and the March 4, 2019 closing stock price of \$58.36. The fair value of the ROIC award is fixed on the grant date; however, a probability assessment is performed each reporting period to estimate the likelihood of achieving the ROIC targets and the amount of compensation to be recognized.

The fair value of the TSR award is measured using a Monte Carlo simulation on the date of grant, measuring potential total shareholder return for ITT relative to the other companies in the S&P 400 Capital Goods Index (the TSR Performance Group). The expected volatility of ITT's stock price is based on the historical volatility of a peer group while expected volatility for the other companies in the TSR Performance Group is based on their own stock price history. For TSR awards granted in 2019, all volatility and correlation measures were based on three years of daily historical price data through March 4, 2019, corresponding to the three-year performance period of the award. As the grant date occurs after the beginning of the performance period, actual TSR performance between the beginning of the performance period (December average closing stock price) and the grant date was reflected in the valuation. For TSR awards granted in 2019, a dividend yield of 1.01% was assumed based on ITT's annualized dividend payment of \$0.588 per share and the March 4, 2019 closing stock price of \$58.36.

The table below provides a rollforward of outstanding RSUs and PSUs for each of the years ended December 31, 2019, 2018 and 2017.

		2019			201	8	2017			
Restricted Stock and Performance Units	Shares		Weighted rage Grant Fair Value	Shares	A١	Weighted verage Grant Date Fair Value	Shares		Weighted Average Grant Date Fair Value	
Outstanding – January 1	1.2	\$	42.94	1.2	\$	38.74	1.1	\$	38.24	
Granted	0.3		60.91	0.4		54.79	0.5		42.52	
Performance adjustment ^(a)	0.1		44.87				_		—	
Vested and issued	(0.6)		38.03	(0.3)		41.09	(0.2)		41.42	
Forfeited	_		_	(0.1)		42.55	(0.2)		41.75	
Outstanding – December 31	1.0	\$	51.24	1.2	\$	42.94	1.2	\$	38.74	
Vested pending issuance	0.2	\$	44.87	0.2	\$	33.27	0.1	\$	42.90	

(a) Represents an adjustment for performance results achieved related to outstanding PSU shares that vested during the period and are pending issuance.

The table below provides the number of the outstanding shares by award type as of December 31, 2019, 2018 and 2017. Cash settled PSUs outstanding are not material.

	2019	2018	2017
Equity settled RSUs	0.5	0.7	0.7
Cash settled RSUs	0.1	0.1	0.1
PSUs	0.4	0.4	0.4

As of December 31, 2019, substantially all RSUs outstanding are expected to vest. As of December 31, 2019, the total number of PSUs expected to vest based on current performance estimates, including those vested but pending issuance, was 0.6.

NOTE 18 CAPITAL STOCK

ITT has authority to issue an aggregate of 300 shares of capital stock, of which 250 shares have been designated as Common Stock having a par value of \$1 per share and 50 shares have been designated as Preferred Stock not having any par or stated value. There was no Preferred Stock outstanding as of December 31, 2019 and 2018.

The holders of ITT common stock are entitled to receive dividends when and as declared by ITT's Board of Directors. Dividends are paid quarterly. Dividends declared were \$0.588, \$0.536 and \$0.512 per common share in 2019, 2018, and 2017, respectively.

On October 27, 2006, our Board of Directors approved a three-year \$1 billion share repurchase program, which it modified in 2008 to make the term indefinite. During 2019, 2018, and 2017, we repurchased and retired 0.5 shares, 1.0 shares, and 0.8 shares of common stock for \$28.7, \$50.0 and \$30.0, respectively. Through December 31, 2019, we had repurchased 22.7 shares for \$938.1, including commissions, under this program. On October 30, 2019, the Board of Directors approved a new indefinite term \$500 share repurchase program.

Separate from the share repurchase program, the Company repurchased 0.3 shares, 0.1 shares, and 0.1 shares for an aggregate price of \$12.7, \$6.1, and \$2.9, during 2019, 2018 and 2017, respectively, in settlement of employee tax withholding obligations due upon the vesting of RSUs and PSUs. All repurchased shares are canceled immediately following the repurchase.

NOTE 19 ACCUMULATED OTHER COMPREHENSIVE LOSS

	 Cumulative ostretirement Translation Benefit Plans Adjustment			 cumulated Other nprehensive Loss
As of December 31, 2016	\$ (145.2)	\$	(306.0)	\$ (451.2)
Net change during period	7.6		95.4	103.0
As of December 31, 2017	(137.6)		(210.6)	(348.2)
Net change during period	6.0		(33.3)	(27.3)
As of December 31, 2018	(131.6)		(243.9)	(375.5)
Net change during period	(1.7)		(8.1)	(9.8)
As of December 31, 2019	\$ (133.3)	\$	(252.0)	\$ (385.3)

NOTE 20 COMMITMENTS AND CONTINGENCIES

From time to time, we are involved in litigation, claims, government inquiries, investigations and proceedings, including but not limited to those relating to environmental exposures, intellectual property matters, personal injury claims, regulatory matters, commercial and government contract issues, employment and employee benefit matters, commercial or contractual disputes, and securities matters.

Although the ultimate outcome of any legal matter cannot be predicted with certainty, based on present information including our assessment of the merits of the particular claim, as well as our current reserves and insurance coverage, we do not expect that such legal proceedings will have any material adverse impact on our financial statements, unless otherwise noted below. However, there can be no assurance that an adverse outcome in any of the proceedings described below will not result in material fines, penalties or damages, changes to the Company's business practices, loss of (or litigation with) customers or a material adverse effect on our financial statements.

Asbestos Matters

Our subsidiaries, ITT LLC and Goulds Pumps LLC, have been sued, along with many other companies in product liability lawsuits alleging personal injury due to asbestos exposure. These claims generally allege that certain products sold by our subsidiaries prior to 1985 contained a part manufactured by a third party (e.g., a gasket) which contained asbestos. To the extent these third-party parts may have contained asbestos, it was encapsulated in the gasket (or other) material and was non-friable. As of December 31, 2019, there were 24 thousand pending active claims against our subsidiaries, including Goulds Pumps LLC, filed in various state and federal courts alleging injury as a result of exposure to asbestos. Activity related to these asserted asbestos claims during the period was as follows:

_(in thousands)	2019	2018	2017
Pending claims – Beginning	24	26	30
New claims	4	4	4
Settlements	(1)	(1)	(2)
Dismissals	(3)	(5)	(6)
Pending claims – Ending	24	24	26

Frequently, plaintiffs are unable to identify any ITT LLC or Goulds Pumps LLC products as a source of asbestos exposure. Our experience to date is that a majority of resolved claims are dismissed without any payment from our subsidiaries. Management believes that a large majority of the pending claims have little or no value. In addition, because claims are sometimes dismissed in large groups, the average cost per resolved claim, as well as the number of open claims, can fluctuate significantly from period to period. We expect more asbestos-related suits will be filed in the future, and we will aggressively defend or seek a reasonable resolution, as appropriate.

Estimating the Liability and Related Asset

The Company records an asbestos liability, including legal fees, for costs estimated to be incurred to resolve all pending claims, as well as unasserted claims estimated to be filed against the Company over the next 10 years. The asbestos liability has not been discounted to present value due to an inability to reliably forecast the timing of future cash flows. The methodology used to estimate our asbestos liability for pending claims and claims estimated to be filed over the next 10 years relies on and includes the following:

- interpretation of a widely accepted forecast of the population likely to have been exposed to asbestos in the workplace;
- widely accepted epidemiological studies estimating the number of people likely to develop mesothelioma and lung cancer from exposure to asbestos;
- the Company's historical experience with the filing of non-malignant claims against it and the historical relationship between non-malignant and malignant claims filed against the Company;
- analysis of the number of likely asbestos personal injury claims to be filed against the Company based on such epidemiological and historical data and the Company's recent claims experience;
- analysis of the Company's pending cases, by disease type;
- analysis of the Company's recent experience to determine the average settlement value of claims, by disease type;
- analysis of the Company's recent experience in the ratio of settled claims to total resolved claims, by disease type;
- analysis of the Company's defense costs in relation to its indemnity costs and agreements in place with external counsel;
- adjustment for inflation in the average settlement value of claims and defense costs estimated to be paid in the future; and
- analysis of the Company's recent experience with regard to the length of time to resolve asbestos claims.

Asbestos litigation is a unique form of litigation. Frequently, the plaintiff sues a large number of defendants and does not state a specific claim amount. After filing of the complaint, the plaintiff engages defendants in settlement negotiations to establish a settlement value based on certain criteria, including the number of defendants in the case. Rarely do the plaintiffs seek to collect all damages from one defendant. Rather, they seek to spread the liability, and thus the payments, among many defendants. As a result, the Company is unable to estimate the maximum potential exposure to pending claims and claims estimated to be filed over the next 10 years.

The forecast period used to estimate our potential liability to pending and projected asbestos claims is a judgment based on a number of factors, including the number and type of claims filed, recent experience with pending claims activity, and whether that experience is expected to continue into the future, the jurisdictions where claims are filed, the effect of any legislative or judicial developments, and the likelihood of any comprehensive asbestos legislation at the federal level. These factors have both positive and negative effects on the dynamics of asbestos litigation in the tort system and, accordingly, our estimate of the asbestos exposure. Developments related to asbestos tend to be long-cycle, changing over multi-year periods. Accordingly, we monitor these and other factors and assess whether an alternative forecast period is appropriate.

The Company retains a consulting firm to assist management in estimating the potential liability for pending asbestos claims and for claims estimated to be filed over the next 10 years based on the methodology described above. Our methodology determines a point estimate based on our assessment of the value of each underlying assumption, rather than a range of reasonably possible outcomes. Projecting future asbestos costs is subject to numerous variables and uncertainties that are inherently difficult to predict. In addition to the uncertainties surrounding the key assumptions discussed above, additional uncertainty related to asbestos claims and estimated costs arises from the long latency period prior to the manifestation of an asbestos-related disease, changes in available medical treatments and changes in medical costs, changes in plaintiff behavior resulting from bankruptcies of other companies that are or could be co-defendants, uncertainties surrounding the litigation process from jurisdiction to jurisdiction and from case to case, and the impact of potential legislative or judicial changes. At December 31, 2019, approximately 25% of the recorded asbestos liability relates to pending claims, with the remainder relating to claims estimated to be filed over the next 10 years.

We record a corresponding undiscounted asbestos-related asset that represents our best estimate of probable recoveries from our insurers for the estimated asbestos liabilities. In developing this estimate, the Company considers coverage-in-place and other agreements with its insurer, and a number of additional factors. These additional factors reviewed include the financial viability of our insurance carriers and any related solvency issues, the method by which losses will be allocated to the various insurance policies and the years covered by those policies, the extent to which settlement and defense costs will be reimbursed by the insurance policies and interpretation of the various policy and contract terms and limits and their interrelationships, and various judicial determinations relevant to our insurance programs. The timing and amount of reimbursements will vary due to a time lag between when ITT pays an amount to defend or settle a claim and when a reimbursement is received from an insurer, differing policy terms and certain gaps in our insurance coverage as a result of uninsured periods, insurer insolvencies, and prior insurance settlements.

Approximately 80% of our estimated receivables are due from insurers that had credit ratings of A- or better from A.M. Best as of December 31, 2019.

In addition, the Company retains an insurance consulting firm to assist management in estimating probable recoveries for pending asbestos claims and for claims estimated to be filed over the next 10 years based on the analysis of policy terms, the likelihood of recovery provided by external legal counsel, and incorporating risk mitigation judgments where policy terms or other factors are not certain. The aggregate amount of insurance available to the Company for asbestos-related claims was acquired over many years and from many different carriers. Amounts deemed not recoverable generally are due from insurers that are insolvent, or result from disagreements with the insurers over policy terms, coverage limits or coverage disputes. Such limitations in our insurance coverage are expected to result in projected payments to claimants substantially exceeding the probable insurance recovery.

The Company has negotiated with certain of its insurers to reimburse the Company for a portion of its indemnity and defense costs through "coverage-in-place" agreements or policy buyout agreements. The agreements are designed to facilitate the collection of the Company's insurance portfolio, to mitigate issues that insurers may raise regarding their responsibility to respond to claims, and to promote an orderly exhaustion of the policies. As of December 31, 2019, approximately 57% of our asbestos-related assets were related to coverage-in-place agreements and buyout agreements with insurers.

After reviewing our portfolio of insurance policies, with consideration given to applicable deductibles, retentions and policy limits, the solvency and historical payment experience of various insurance carriers, existing insurance settlements, and the advice of outside counsel with respect to the applicable insurance coverage law relating to the terms and conditions of its insurance policies, we believe that its recorded receivable for insurance recoveries is probable of collection.

Estimating our exposure to pending asbestos claims and those that may be filed in the future is subject to significant uncertainty and risk as there are multiple variables that can affect the timing, severity, quality, quantity and resolution of claims. Any predictions with respect to the variables impacting the estimate of the asbestos liability and related asset are subject to even greater uncertainty as the projection period lengthens. In light of the uncertainties and variables inherent in the long-term projection of the Company's asbestos exposures, although it is probable that the Company will incur additional costs for asbestos claims filed beyond the next 10 years which could be material to the financial statements, we do not believe there is a reasonable basis for estimating those costs at this time.

The asbestos liability and related receivables reflect management's best estimate of future events. However, future events affecting the key factors and other variables for either the asbestos liability or the related receivables could cause actual costs or recoveries to be materially higher or lower than currently estimated. Due to these uncertainties, as well as our inability to reasonably estimate any additional asbestos liability for claims which may be filed beyond the next 10 years, it is difficult to predict the ultimate cost of resolving all pending and unasserted asbestos claims. We believe it is possible that future events affecting the key factors and other variables within the next 10 years, as well as the cost of asbestos claims filed beyond the next 10 years, net of expected recoveries, could have a material adverse effect on our financial statements.

Settlement Agreements

The company periodically enters into settlement agreements with insurers to settle responsibility for insurance claims. Under the terms of the settlements, the insurers agree to a payment or specified series of payments to a QSF for past costs and/or agree to provide coverage for certain future asbestos claims on specified terms and conditions.

In February 2020, ITT signed an agreement-in-principle with a group of insurers to settle responsibility for certain insurance claims for \$66.4. We are currently evaluating the impact of this agreement on our insurance asset and estimate that the settlement will result in an increase to our insurance asset in the first quarter of 2020.

Statements of Operations Charges

The table below summarizes the total net asbestos-related charge for the years ended December 31, 2019, 2018 and 2017.

	2019	2018	201
Asbestos provision, net ^(a)	\$ 47.9	\$ 53.8	\$ 56.
Asbestos remeasurement, net	(68.1)	10.0	(76.
Settlement agreements and other	_	(58.9)	-
Asbestos-related (benefit) cost, net	\$ (20.2)	\$ 4.9	\$ (19.

Changes in Financial Position

The following table provides a rollforward of the estimated asbestos liability and related assets for the years ended December 31, 2019 and 2018.

	2019						2018						
		Liability		Asset		Net		Liability		Asset		Net	
Balance as of January 1	\$	849.3	\$	376.7	\$	472.6	\$	877.2	\$	368.7	\$	508.5	
Asbestos provision ^(a)		59.4		11.5		47.9		66.1		12.3		53.8	
Asbestos remeasurement		(4.5)		63.6		(68.1)		(5.8)		(15.8)		10.0	
Settlement agreements		—		_		_		_		58.9		(58.9)	
Net cash activity and other ^(a)		(86.6)		(65.0)		(21.6)		(88.2)		(47.4)		(40.8)	
Balance as of December 31	\$	817.6	\$	386.8		430.8	\$	849.3	\$	376.7	\$	472.6	
Current portion		86.0		67.2				74.2		67.1			
Noncurrent portion		731.6		319.6				775.1		309.6			

(a) Includes certain administrative costs such as legal-related costs for insurance asset recoveries.

Environmental Matters

In the ordinary course of business, we are subject to federal, state, local, and foreign environmental laws and regulations. We are responsible, or are alleged to be responsible, for ongoing environmental investigation and site remediation. These sites are in various stages of investigation and/or remediation and in many of these proceedings our liability is considered de minimis. We have received notification from the U.S. Environmental Protection Agency, and from similar state and foreign environmental agencies, that a number of sites formerly or currently owned or operated by the Company, and other properties or water supplies that may be or have been impacted from those operations, contain disposed or recycled materials or wastes and require environmental investigation or remediation. These sites include instances where we have been identified as a potentially responsible party under federal and state environmental laws and regulations.

Accruals for environmental matters are recorded on a site-by-site basis when it is probable that a liability has been incurred and the amount of the liability can be reasonably estimated.

The following table provides a rollforward of the estimated current and long-term environmental liability for the years ended December 31, 2019 and 2018.

	2	019	2018
Balance as of January 1	\$ 6	6.8 \$	73.9
Changes in estimates for pre-existing accruals		0.5	6.6
Accruals added during the period for new matters		_	2.0
Net cash activity ^(a)		5.4)	(15.8)
Foreign currency		_	0.1
Balance as of December 31	\$6	1.9 \$	66.8

(a) Includes cash payments for the year ended December 31, 2018 of \$10.2, related to the sale of a former operating location.

Environmental-related assets represent estimated recoveries from insurance providers and other third parties. The total environmental-related asset as of December 31, 2019 and 2018 was \$22.2 and \$23.4, respectively.

The following table illustrates the reasonably possible high range of estimated liability, and number of active sites for environmental matters.

	2019	2018
High end range	\$ 108.4	\$ 115.9
Number of active environmental investigation and remediation sites	28	31

As actual costs incurred at identified sites in future periods may vary from our current estimates given the inherent uncertainties in evaluating environmental exposures, management believes it is possible that the outcome of these uncertainties may have a material adverse effect on our financial statements.

Other Matters

In 2019, the Company settled a civil matter with the U.S. Department of Justice (DOJ) related to an investigation that began in 2015 involving certain connector products manufactured by the Company's Connect & Control Technologies segment that are purchased or used by the U.S. government. The Company paid \$11 to DOJ, acting on behalf of the U.S. government, to settle this matter and avoid the expense and uncertainty of litigation. The Company also received a related insurance recovery of \$1.

NOTE 21 GUARANTEES, INDEMNITIES AND WARRANTIES

Indemnities

Since our founding in 1920, we have acquired and disposed of numerous businesses. The related acquisition and disposition agreements allocate certain assets and liabilities among the parties and contain various representation and warranty clauses and may provide indemnities for a misrepresentation or breach of the representations and warranties by either party or for assumed or excluded liabilities. These provisions address a variety of subjects. The term and monetary amounts of each such provision are defined in the specific agreements and may be affected by various conditions and external factors. Many of the provisions have expired either by operation of law or as a result of the terms of the agreement. We do not have a liability recorded for these expired provisions and are not aware of any claims or other information that would give rise to material payments under such provisions.

As part of the 2011 spin-off, ITT LLC agreed to assume certain liabilities and provide certain indemnifications and cross-indemnifications among ITT LLC, Exelis and Xylem, subject to limited exceptions with respect to certain employee claims and other liabilities and obligations. These provisions address a variety of subjects, including asserted and unasserted product liability matters (*e.g.*, asbestos claims, product warranties) which relate to certain products manufactured, repaired or sold prior to the 2011 spin-off. These provisions last indefinitely and are not affected by Harris' acquisition of Exelis, or Harris' subsequent merger with L3 Technologies. ITT LLC expects Exelis and Xylem to fully perform under the terms of the Distribution Agreement and therefore has not recorded a liability for matters for which we have been assumed or indemnified. In addition, both Exelis and Xylem have made asbestos indemnity claims that could give rise to material payments under the indemnity provided by ITT LLC; such claims are included in our estimate of asbestos liabilities.

Guarantees

We have \$138.1 of guarantees, letters of credit and similar arrangements outstanding at December 31, 2019, primarily pertaining to commercial or performance guarantees and insurance matters. We have not recorded any material loss contingencies under these guarantees, letters of credit and similar arrangements as of December 31, 2019 as the likelihood of nonperformance by ITT is considered remote. From time to time, we may provide certain third-party guarantees that may be affected by various conditions and external factors, some of which could require that payments be made under such guarantees. We do not consider the maximum exposure or current recorded liabilities under our third-party guarantees to be material either individually or in the aggregate. We do not believe such payments would have a material adverse impact on our financial statements.

Warranties

ITT warrants numerous products, the terms of which vary widely. In general, ITT warrants its products against defect and specific non-performance. In certain markets, such as automotive, aerospace and rail, liability for product defects could extend beyond the selling price of the product and could be significant if the defect interrupts production or results in a recall. The table included below provides changes in the warranty accrual for December 31, 2019 and 2018.

	2019	2018
Warranty accrual – January 1	\$ 17.3	\$ 18.3
Warranty expense	10.5	6.3
Payments	(8.5)	(6.7)
Foreign currency and other	1.2	(0.6)
Warranty accrual – December 31	\$ 20.5	\$ 17.3

NOTE 22 ACQUISITIONS

Rheinhütte Pumpen Group (Rheinhütte)

On April 30, 2019, we completed the acquisition of 100% of the privately held stock of Rheinhütte for a purchase price of €82.5 euros, net of cash acquired. The transaction was funded from the Company's cash and European commercial paper program. Rheinhütte, with 2018 revenue of approximately €61.5 euros and approximately 430 employees, has manufacturing locations in Germany and Brazil. Rheinhütte is a designer and manufacturer of highly engineered pumps suited for harsh and corrosive environments for the industrial market. Rheinhütte is reported within the Industrial Process segment.

Matrix Composites, Inc. (Matrix)

On July 3, 2019, we completed the acquisition of 100% of the privately held stock of Matrix for a purchase price of \$25.8, net of cash acquired, that is subject to change based on customary net working capital adjustments. The transaction was funded from the Company's cash. Matrix, a manufacturer of precision composite components within the aerospace and defense market, had 2018 revenue of approximately \$12.0 with growth expected due to a ramp up in production on several next-generation aircraft engine platforms. Matrix has approximately 115 employees and is reported within the Connect & Control Technologies segment.

The purchase prices for Rheinhütte and Matrix were allocated to net assets acquired and liabilities assumed based on their preliminary fair values as of the respective acquisition date, with the excess of the purchase price of \$40.1 and \$14.3 recorded as goodwill, respectively. Other intangibles identified for Rheinhütte include customer relationships, proprietary technology and trade names. Other intangibles for Matrix primarily consist of customer relationships. The primary areas of the purchase price allocations that are not yet finalized relate to the valuation of certain tangible assets, liabilities, income tax, and residual goodwill. For each acquisition, we expect to obtain the information necessary to finalize the fair value of the net assets and liabilities during the measurement period, not to exceed one year from the relevant acquisition date. Changes to the preliminary estimates of the fair value during the measurement period will be recorded as adjustments to those assets and liabilities with a corresponding adjustment to goodwill in the period they occur. The goodwill arising from these acquisitions is not expected to be deductible for income tax purposes.

	Rhe	einhütte	ſ	Matrix
Cash	\$	4.7	\$	0.5
Receivables		9.7		1.1
Inventory		15.2		1.8
Plant, property and equipment		19.9		2.9
Goodwill		40.1		14.3
Other intangible assets		15.2		8.5
Other assets		3.9		1.9
Accounts payable and accrued liabilities		(6.7)		(2.0)
Other liabilities		(5.3)		(2.7)
Net assets acquired	\$	96.7	\$	26.3

Preliminary Allocations of Purchase Price

Pro forma results of operations have not been presented because the acquisitions were not deemed material at the acquisition date.

SUPPLEMENTAL FINANCIAL DATA

SELECTED QUARTERLY FINANCIAL DATA (UNAUDITED)

	2019 Quarters					2018 Quarters								
	F	ourth	•	Third	S	econd	First	F	ourth		Third	S	econd	First
Revenue	\$	719.1	\$	711.9	\$	719.9	\$ 695.5	\$	678.4	\$	680.6	\$	696.8	\$ 689.3
Gross profit		228.0		231.3		232.0	218.8		210.5		226.5		226.0	224.2
Income from continuing operations attributable to ITT Inc.		66.5		118.7		66.9	71.3		50.6		111.0		69.7	101.1
Income (loss) from discontinued operations		1.9		(0.1)		(0.1)	_		1.3		(0.1)		_	0.1
Net income attributable to ITT Inc.		68.4		118.6		66.8	71.3		51.9		110.9		69.7	101.2
Basic earnings per share attributable to ITT Inc.:														
Continuing operations	\$	0.76	\$	1.35	\$	0.76	\$ 0.81	\$	0.58	\$	1.27	\$	0.80	\$ 1.15
Discontinued operations		0.02		—		—	—		0.01				—	
Net income	\$	0.78	\$	1.35	\$	0.76	\$ 0.81	\$	0.59	\$	1.27	\$	0.80	\$ 1.15
Diluted earnings per share attributable to ITT Inc.:														
Continuing operations	\$	0.75	\$	1.34	\$	0.75	\$ 0.80	\$	0.57	\$	1.25	\$	0.79	\$ 1.14
Discontinued operations		0.02		_		_	_		0.01		_		_	_
Net income	\$	0.77	\$	1.34	\$	0.75	\$ 0.80	\$	0.58	\$	1.25	\$	0.79	\$ 1.14

EXHIBIT INDEX

Exhibit Number	Description
3.1	ITT Inc.'s Amended and Restated Articles of Incorporation, effective as of May 25, 2018 (Incorporated by reference to Exhibit 3.1 of ITT Inc.'s Form 8-K dated May 25, 2018 (File No. 001-05672)
3.2	Amended and Restated By-laws of ITT Inc., effective as of May 25, 2018 Incorporated by reference to Exhibit 3.2 of ITT Inc.'s Form 8-K dated May 25, 2018 (File No. 001-05672)
4.1	Description of Registrant's Securities
10.1	Distribution Agreement, dated as of October 25, 2011, among ITT Corporation, Xylem Inc. and Exelis Inc. (Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended September 30, 2011 (File No. 001-05672).)
10.2	Benefits and Compensation Matters Agreement, dated as of October 25, 2011, among ITT Corporation, Xylem Inc. and Exelis Inc.
	Incorporated by reference to Exhibit 10.2 of ITT Inc.'s Form 10-Q for the quarter ended September 30, 2011 (File No. 001-05672).
10.3	First Amendment to Benefits and Compensation Matters Agreement, dated as of October 25, 2011 Incorporated by reference as Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2013
10.4	Tax Matters Agreement, dated as of October 25, 2011, among ITT Corporation, Xylem Inc. and Exelis Inc. Incorporated by reference to Exhibit 10.3 of ITT Inc.'s Form 10-Q for the quarter ended September 30, 2011 (File No. 001-05672).
10.5	Master Transition Services Agreement, dated as of October 25, 2011, among ITT Corporation, Xylem Inc. and Exelis Inc.
	Incorporated by reference to Exhibit 10.4 of ITT Inc.'s Form 10-Q for the quarter ended September 30, 2011 (File No. 001-05672).
10.6	ITT Transitional Trademark License Agreement - Exelis, dated as of October 25, 2011, between ITT Manufacturing Enterprises LLC and Exelis Inc.
	Incorporated by reference to Exhibit 10.5 of ITT Inc.'s Form 10-Q for the quarter ended September 30, 2011 (File No. 001-05672).
10.7	Master Lease Agreement and Master Sublease Agreement, dated as of October 25, 2011 and September 30, 2011, respectively
	Incorporated by reference to Exhibit 10.6 of ITT Inc.'s Form 10-Q for the quarter ended September 30, 2011 (File No. 001-05672).
10.8	Five Year Competitive Advance and Revolving Credit Facility Agreement, dated as of November 25, 2014 among ITT Corporation and the Other Parties Signatory Thereto
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 8-K dated November 25, 2014 (File No. 001-05672).
10.9	Instrument of Assumption and Amendment Agreement, dated as of May 16, 2016, to the Five-Year Competitive Advance and Revolving Credit Facility Agreement, dated as of among ITT Inc., ITT LLC and the Administrative Agent Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 8-K dated May 16, 2016 (File No. 001-05672).
10.10	First Amendment to Five-Year Competitive Advance and Revolving Credit Facility Agreement, dated as of November 29, 2016, among ITT Inc. and the lenders party thereto
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 8-K dated November 30, 2016 (File No. 001-05672).
10.11	Second Amendment to Five-Year Competitive Advance and Revolving Credit Facility Agreement, dated as of June 1, 2018, among ITT Inc. and the lenders party thereto
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2018 (File No. 001-05672).
10.12	Third Amendment to Five-Year Competitive Advance and Revolving Credit Facility Agreement, dated as of November 5, 2019, among ITT Inc. and the lenders party thereto
10.13	Indenture between ITT Corporation and Union Bank N.A., as Trustee dated May 1, 2009 Incorporated by reference to Exhibit 4.3 of ITT Inc.'s Form S-3 dated September 18, 2015 (File No. 001-05672).
10.14	First Supplemental Indenture, dated as of May 16, 2016, between ITT Corporation, ITT Inc. and MUFG Union Bank, N.A. as Trustee
	Incorporated by reference to Exhibit 4.2 of ITT Inc.'s Post-Effective Amendment No.1 to Registration Statement on Form S-3 dated May 16, 2016 (File No. 333-207006).
10.15*	ITT Annual Incentive Plan for Executive Officers, amended and restated as of May 16, 2016 Incorporated by reference to Exhibit 10.5 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2016 (File No. 001-05672).
10.16*	ITT Retirement Savings Plan for Salaried Employees (amended and restated effective January 1, 2018) Incorporated by reference to Exhibit 10.15 of ITT Inc.'s Form 10-K for the year ended December 31, 2018 (File No. 001-05672).

Exhibit Number Description

10.17*	Supplemental Retirement Savings Plan, amended and restated as of January 1, 2016 Incorporated by reference to Exhibit 10.6 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2016 (File No. 001-05672).
10.18*	ITT Senior Executive Severance Pay Plan, amended and restated as of June 17, 2019
10.10	Incorporated by reference to Exhibit 10.2 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2019 (File No. 001-05672).
10.19*	ITT Senior Executive Change in Control Severance Pay Plan, amended and restated as of June 17, 2019
	Incorporated by reference to Exhibit 10.3 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2019 (File No. 001-05672).
10.20*	ITT Change in Control Severance Plan, amended and restated as of May 16, 2016
	Incorporated by reference to Exhibit 10.10 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2016 (File No. 001-05672).
10.21*	ITT Deferred Compensation Plan, as amended and restated as of May 16, 2016 Incorporated by reference to Exhibit 10.4 of ITT Inc.'s Form 8-K dated May 16, 2016 (File No. 001-05672).
10.22*	ITT Deferred Compensation Plan for Non-Employee Directors, amended and restated as of December 31, 2019
10.23*	Non-Employee Director Compensation Summary
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2019 (File No. 001-05672).
10.24*	2011 Omnibus Incentive Plan
	Incorporated by reference to Exhibit 4.3 of ITT Inc.'s Registration Statement on Form S-8 as filed on October 28, 2011 (File No. 001-05672).
10.25*	ITT 2003 Equity Incentive Plan, amended and restated as of February 15, 2008 and approved by shareholders on May 13, 2008 (previously amended and restated as of July 13, 2004 and subsequently amended as of December 18, 2006) and previously known as ITT Industries, Inc. 2003 Equity Incentive Plan
	Incorporated by reference to Exhibit 10.5 of ITT Inc.'s Form 10-Q for the quarter ended June 30, 2008 (File No. 001-05672).
10.26*	Omnibus Amendment to Long-Term Incentive Plans, dated as of May 16, 2016
	Incorporated by reference to Exhibit 10.2 of ITT Inc.'s Current Report on Form 8-K dated May 16, 2016 (File No. 001-05672).
10.27*	Separation Agreement and General Release, dated November 26, 2018, between ITT Inc. and Victoria L. Creamer Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 8-K dated November 30, 2018 (File No. 001-05672)
10.28*	Form of 2019 Performance Unit Award Agreement
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended March 31, 2019 (File No. 001-05672).
10.29*	Form of 2019 Restricted Stock Unit Award Agreement
	Incorporated by reference to Exhibit 10.2 of ITT Inc.'s Form 10-Q for the quarter ended March 31, 2019 (File No. 001-05672).
10.30*	Form of 2018 Performance Unit Award Agreement
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended March 31, 2018 (File No. 001-05672).
10.31*	Form of 2018 Restricted Stock Unit Award Agreement
	Incorporated by reference to Exhibit 10.2 of ITT Inc.'s Form 10-Q for the quarter ended March 31, 2018 (File No. 001-05672).
10.32*	Form of 2017 Performance Unit Award Agreement
	Incorporated by reference to Exhibit 10.1 of ITT Inc.'s Form 10-Q for the quarter ended March 31, 2017 (File No. 001-05672).
10.33*	Form of 2017 Restricted Stock Unit Award Agreement
	Incorporated by reference to Exhibit 10.2 of ITT Inc.'s Form 10-Q for the quarter ended March 31, 2017 (File No. 001-05672).
10.34	Form of ITT Inc. Indemnification Agreement with its directors and officers Incorporated by reference to Exhibit 10.5 to ITT Inc.'s Form 8-K dated May 16, 2016 (File No. 001-05672).
21.1	Subsidiaries of the Registrant
23.1	Consent of Deloitte & Touche LLP
31.1	Certification pursuant to Rule 13a-14(a)/15d-14(a) of the Securities Exchange Act of 1934, as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
31.2	Certification pursuant to Rule 13a-14(a)/15d-14(a) of the Securities Exchange Act of 1934, as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002

Exhibit Number Description

32.1 Certification Pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002
32.2 Certification Pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002
101 The following materials from ITT Inc.'s Annual Report on Form 10-K for the year ended December 31, 2019, formatted in iXBRL (inline Extensible Business Reporting Language): (i) Consolidated Statements of Operations, (ii) Consolidated Statements of Comprehensive Income, (iii) Consolidated Balance Sheets, (iv) Consolidated Statements of Cash Flows, (v) Consolidated Statements of Changes in Shareholders' Equity and (vi) Notes to the Consolidated Financial Statements
104 Cover Page Interactive Data File (embedded within the Inline XBRL document).

* Management 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.

ITT Inc. (Registrant)

By:

/S/ JOHN CAPELA

John Capela Vice President and Chief Accounting Officer (Principal Accounting Officer)

February 21, 2020

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.

SIGNATURE	TITLE	DATE
/S/ LUCA SAVI	Chief Executive Officer, President and Director	February 21, 2020
Luca Savi (Principal Executive Officer)	Fresident and Director	
/S/ THOMAS M. SCALERA	Executive Vice President and	February 21, 2020
Thomas M. Scalera (Principal Financial Officer)	Chief Financial Officer	
/S/ JOHN CAPELA	Vice President and	February 21, 2020
John Capela (Principal Accounting Officer)	Chief Accounting Officer	
/S/ ORLANDO D. ASHFORD	Director	February 21, 2020
Orlando D. Ashford		
/S/ GERAUD DARNIS	Director	February 21, 2020
Geraud Darnis		
/S/ DONALD DEFOSSET, JR.	Director	February 21, 2020
Donald DeFosset, Jr.		
/S/ NICHOLAS C. FANANDAKIS	Director	February 21, 2020
Nicholas C. Fanandakis		
/S/ CHRISTINAA. GOLD	Director	February 21, 2020
Christina A. Gold		
/S/ RICHARD P. LAVIN	Director	February 21, 2020
Richard P. Lavin		
/S/ MARIO LONGHI	Director	February 21, 2020
Mario Longhi		
/S/ FRANK T. MACINNIS	Director	February 21, 2020
Frank T. MacInnis		
/S/ REBECCAA. MCDONALD	Director	February 21, 2020
Rebecca A. McDonald		
/S/ TIMOTHY H. POWERS	Director	February 21, 2020
Timothy H. Powers		
/S/ CHERYL L. SHAVERS	Director	February 21, 2020
Cheryl L. Shavers		
/S/ SABRINA SOUSSAN	Director	February 21, 2020
Sabrina Soussan		



OUR GLOBAL MANUFACTURING FOOTPRINT

NORTH & SOUTH AMERICA



EUROPE, MIDDLE EAST & AFRICA ITT is a diversified leading global manufacturer of highly engineered critical components and customized technology solutions for the transportation, industrial, and oil and gas markets. With a strong global footprint of more than 100 facilities, including about 60 manufacturing sites, we are well positioned to solve the most critical challenges of our customers around the world. Our locations include manufacturing facilities and global service capabilities in 35 countries. Through these worldwide operations and building on our heritage of innovation, our more than 10,000 team members partner with customers to deliver enduring solutions that make a lasting difference and help the world move forward. ITT is headquartered in White Plains, NY, with sales in well over 100 countries. The company generated 2019 revenues of \$2.85 billion. For more information, visit www.itt.com.

INDUSTRIAL PROCESS

Designs and manufactures pumps, valves, monitoring and control solutions, water treatment systems and aftermarket parts for the chemical, oil and gas, mining and other industrial process markets, as well as global service capabilities.

Amory, Mississippi Axminster, United Kingdom Buenos Aires, Argentina Cataguases, Brazil Chungbuk, South Korea City of Industry, California Dammam, Saudi Arabia Lancaster, Pennsylvania Obernkirchen, Germany Rennerod, Germany Salto, Brazil Santiago, Chile Seneca Falls, New York The Woodlands, Texas Tizayuca, Mexico Vadodara, India Wangara, Australia Wiesbaden, Germany Zachary, Louisiana

MOTION TECHNOLOGIES

Designs and manufactures brake pads, shock absorbers and sealing solutions for the automotive and rail markets.

Barge, Italy Blacksburg, Virginia Changshu, China Dearborn, Michigan Hebron, Kentucky Kańczuga, Poland Leesburg, Florida Lünen. Germanv Neitersen, Germany Novi, Michigan Öhringen, Germany Ostrava, Czech Republic **Oud-Beijerland**, Netherlands Prosteiov, Czech Republic Silao Mexico Stalowa Wola, Poland Termoli, Italy Vauda Canavese, Italy Wuxi, China

CONNECT AND CONTROL TECHNOLOGIES

Designs and manufactures composite materials, harsh-environment connectors and critical energy absorption and flow control components primarily for the aerospace, defense and industrial markets.

Bad König, Germany Irvine, California Lainate, Italy Nogales, Mexico Orchard Park, New York Rockledge, Florida Santa Rosa, California Shenzhen, China Valencia, California Weinstadt, Germany Westminster, South Carolina Wuxi, China Zama, Japan

ITT WORLD HEADQUARTERS White Plains, New York

ITT has a global footprint representing manufacturing, office and sales, and global service facilities, including the identified locations by segment.





1133 Westchester Avenue White Plains, New York 10604 (914) 641-2000

www.itt.com