Annual Report and Form 10-K

2020



PURIFY I PROTECT I ENHANCE

ingevity

About Ingevity

PURIFY I PROTECT I ENHANCE

Ingevity provides products and technologies that purify, protect, and enhance the world around us. Through a team of talented and experienced people, we develop, manufacture and bring to market solutions that help customers solve complex problems and make the world more sustainable. We operate in two reporting segments: Performance Chemicals, which includes specialty chemicals

and engineered polymers; and Performance Materials, which includes high-performance activated carbon. These products are used in a variety of demanding applications, including asphalt paving, oil exploration and production, agrochemicals, adhesives, lubricants, publication inks, coatings, elastomers, bioplastics and automotive components that reduce gasoline vapor emissions. Headquartered in North Charleston, South Carolina, Ingevity operates from 25 locations around the world and employs approximately 1,750 people. The company is traded on the New York Stock Exchange (NYSE: NGVT). For more information visit www.ingevity.com.

1,750

Employees

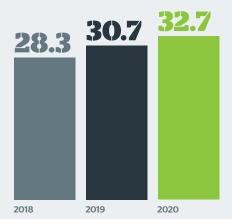
Manufacturing Sites

6Technical Centers

10
Principal Offices

Financial Highlights

Adjusted EBITDA Margin¹



Net Debt Ratio¹

2.45x

Adjusted Earnings per Share¹

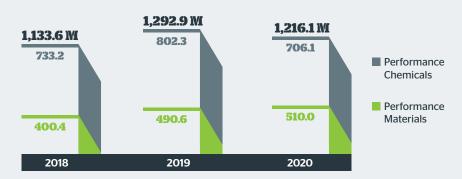
\$4.88

'See page 119 for the reconciliation of this non-GAAP financial measure to the nearest GAAP financial measure.

Total Shareholder Return (January 1, 2020 to December 31, 2020)



Total Revenue in Millions (U.S. \$)



Total Adjusted Earnings Before Interest, Taxes, Depreciation and Amortization (EBITDA) in Millions (U.S. \$)¹



A Message from the CEO



Dear Shareholders,

2020 was a challenging year by most measures. Yet in many ways, it was these challenges that have, in the long run, enabled us to become a better, stronger company. During the course of the year, we experienced a CEO transition and endured the significant economic downturn caused by COVID-19. Despite these hurdles, we strengthened our senior management team; reduced costs; placed greater emphasis on organic growth and innovation; and saw our gross margins and adjusted EBITDA margin accrete.

Given all that we faced in 2020, I am personally so very proud of how our employees – particularly our manufacturing teams – adjusted to difficult circumstances, adapted to working conditions aimed at ensuring health and safety, and got the job done nonetheless. Our accomplishments in 2020 are due to all their efforts.

With respect to our business, we delivered solid performance in a tumultuous year. We skillfully navigated the ups and downs in both of our segments. Our

Performance Chemicals segment delivered mixed results in the face of demand weakened by COVID-19, particularly in oilfield technologies and industrial specialties applications. Sales to pavement technologies customers grew slightly, buoyed by continued adoption of our Evotherm® warm-mix asphalt technology. Pavement product sales in North America were strong and we saw moderate growth in overseas markets. Our engineered polymers business held steady through the COVID-19 storm as we launched a new innovation center and completed a significant reactor replacement project to support future growth in this chemistry. Revenues for Performance Chemicals were down 12% and segment EBITDA were down 19% versus the prior year.

Our Performance Materials segment delivered another year of record revenue and earnings as the team adapted to the strong decline and then snap-back in global automotive production. This required the Performance Materials team to skillfully manage global production planning, inventory and logistics. Toward the end of the year, this put particular strain on our Waynesboro, Ga., "honeycomb" scrubber facility. The employees there stepped up and routinely set new production records to meet strong customer demand. In addition, we executed a kiln replacement at our Covington, Va., facility and increased capacity at our Zhuhai, China, plant despite COVID-related complications. We continue to innovate in this business; in 2020, we advanced our adsorbed natural gas program by acquiring the assets of ANGP, Inc., and embarked on new pilot initiatives with several natural gas utilities. Revenues for Performance Materials were up 4%, while segment EBITDA were up 17% versus the prior year.

For the company overall, in light of the global macroeconomic headwinds created by COVID-19, our financial performance is something for which I believe we can be proud. Revenues for the year were \$1.216 billion, down 6%. Our adjusted EBITDA of \$398 million was even with the prior year. Adjusted EBITDA margin accreted to 33% of sales, up approximately 200 basis points from 2019.

Free cash flow was strong at \$270 million. Trade working capital was lower than the previous year by \$15 million. Our balance sheet remains strong. In 2020, we restructured our debt profile and sold \$550 million of senior unsecured notes. We ended the year with leverage of 2.45x, which is back in our 2.0 - 2.5x target leverage range. We also returned value to shareholders in the form of share repurchases. In March, our board authorized \$500 million in share repurchases. In the year, we bought back \$88 million, leaving \$412 million remaining from the authorization.

After an improvement in occupational safety performance in 2019 versus 2018, our results in 2020 were disappointing. We experienced 11 total recordable employee injuries in the year, an increase of 37%, which resulted in an employee case incident rate (TCIR) of 0.59. We are placing greater emphasis on our safety initiative and are focusing on "near misses" to drive improved performance. We are reworking processes to operate safely in the COVID-19 environment.

We continue to make significant strides in the implementation of our sustainability program. Our sustainability report issued in September included our announcement of four corporate sustainability goals to help build accountability for our environmental, social and governance (ESG) efforts. In July, we published two reports that outline the net positive greenhouse gas (GHG) reduction benefit of two of our key products, Nuchar® and Evotherm. These reports demonstrate that the use of these products offsets GHGs generated in their manufacture by 10x and up to 23x, respectively. In 2020, we maintained our Silver rating from EcoVadis for Corporate Social Responsibility, and significantly improved our

rating with the Dow Jones Sustainability Index, moving from the 40th percentile to the 70th percentile. With 77% of our revenues coming from sustainable products, we are uniquely positioned to leverage the importance of this macro-trend to drive organic growth in the future and expect to do so.

In 2020, the work of our Inclusion and Diversity Task Force took on greater importance and urgency with the events related to racial injustice in the U.S. Through their enhanced activities – including "book club" discussions, a listening series and new managerial training – we united as a team to denounce discrimination and recommit to our "IngeviWay" values of fairness and respect.

In August 2020, we rolled out an organic growth strategy we've dubbed "Ingevity 2.0." Within this re-energized approach to our vision and strategy, we'll be placing greater emphasis on sustainability, customer-centricity and innovation. We expect to significantly increase our revenues by leveraging our inherent strengths in building technology-based customer solutions, creating greater value and driving increased growth and profitability for our customers, ourselves and our stakeholders.

To help us achieve our "Ingevity 2.0" goals, we have bolstered our leadership team with a critical new addition. As we announced earlier this year, Stacy Cozad has joined us as executive vice president, general counsel and secretary. We're very much looking forward to having an executive of Stacy's caliber joining us at Ingevity.

In closing, I would be remiss if I didn't acknowledge our sadness over the passing of Chairman Rick Kelson in February of this year. His leadership through challenging times in 2020 was vital toward enabling the company to perform well beyond expectations and perhaps most importantly, his wisdom and warmth were critical to the formation and success of Ingevity since our spin-off from WestRock in May 2016. We are pleased to now have Jean Blackwell as our chair and look forward to a new chapter under her guidance.

I firmly believe Ingevity is well positioned for success in 2021 and beyond. Despite challenging global macroeconomic conditions, we expect our performance to improve from 2020's levels. Longer term, we believe that given the attractiveness of our markets, the soundness of our strategy, and the strength of our people, our future has never been brighter. On behalf of all of Ingevity's employees, we thank you for your interest in Ingevity.

Best regards,

John Fortson

John Fortson President, Chief Executive Officer Up to

23x

offset in GHG volume with Evotherm® warm mix asphalt

20%

addition of Capa® caprolactones into plastics enables home compostability

of Ingevity's revenue comes from sustainable products

10x

offset in GHG volume with Nuchar® activated carbon

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

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	FORM	I 10-K	
■ ANNUAL REPORT PURSUANT	TO SECTION 13 OR 15(d) OF THE	E SECURITIES EXCHANGE ACT	 Г OF 1934
	For the fiscal year end		
	0.		
☐ TRANSITION REPORT PURSUA	ANT TO SECTION 13 OR 15(d) OF Commission File N		ACT OF 1934
-	Inge	avity	
	_	evity.	
	INGEVITY CO (Exact name of registrant :		
	(Exact name of registrant a	as specified in its charter)	
Delav			7-4027764
(State or other jurisdiction of in	ncorporation or organization)	(I.R.S. Emplo	yer Identification No.)
(Address of principal executive offices) 843-740-2300		South Carolina	29405
		2200	(Zip code)
	(Registrant's tele		
	Securities registered pursuan	t to Section 12(b) of the Act:	
Title of Each Class:	Trading Symbol(s)	Name of Each Exchange on Wh	nich Registered:
Common Stock (\$0.01 par value)	NGVT	New York Stock Exchange	
Indicate by check mark if the registrant is a w	Securities registered pursuant to rell-known seasoned issuer, as defined in		Yes ⊠ No □
Indicate by check mark if the registrant is not	required to file reports pursuant to Section	on 13 or Section 15(d) of the Act.	
, ,		()	Yes □ No ⊠
Indicate by check mark whether the registrant preceding 12 months (or for such shorter peridays.	1 1	` '	· ·
Indicate by check mark whether the registrant and posted pursuant to Rule 405 of Regulatio submit and post such files).			orter period that the registrant was required to
Indicate by check mark whether the registrant "large accelerated filer," "accelerated filer" at	- ·		
Large accelerated filer	⊠ A	accelerated filer	
Non-accelerated filer	=	maller reporting company	
		merging growth company	
If an emerging growth company, indicate by a financial accounting standards provided pursu			for complying with any new or revised
Indicate by check mark whether the registrant reporting under Section 404(b) of the Sarbane			repared or issued its audit report.
Indicate by check mark whether the Registrar	nt is a shell company (as defined by Rule	12b-2 of the Exchange Act). Yes □ No	· X

At June 30, 2020, the aggregate market value of common stock held by non-affiliates of the Registrant was \$2,162,317,073. The market value held by non-affiliates

excludes the value of those shares held by executive officers and directors of the Registrant.

The Registrant had 40,468,010 shares of common stock, \$0.01 par value, outstanding at February 15, 2021.

Documents Incorporated by Reference

Ingevity Corporation Form 10-K INDEX

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CAUTIONARY STATEMENT REGARDING FORWARD-LOOKING STATEMENTS

This Annual Report on Form 10-K contains forward-looking statements within the meaning of the Securities Exchange Act of 1934, as amended (the "Exchange Act"), and the Private Securities Litigation Reform Act of 1995 that reflect our current expectations, beliefs, plans or forecasts with respect to, among other things, future events and financial performance. Forward-looking statements are often characterized by words or phrases such as "may," "will," "could," "should," "would," "anticipate," "estimate," "expect," "project," "intend," "plan," "believe," "target," "prospects," "potential" and "forecast," and other words, terms and phrases of similar meaning.

These statements, by their nature, involve certain estimates, expectations, projections, forecasts and assumptions and are subject to various risks and uncertainties that are difficult to predict and often beyond our control. These risks and uncertainties may, and often do, cause actual results to differ materially from those contained in a forward-looking statement. Accordingly, readers are cautioned not to place undue reliance on any forward-looking statement. Any forward-looking statement is based on information currently available to us and speaks only as of the date that it is made. We have no duty, and undertake no obligation, to update any forward-looking statement to reflect developments occurring after the statement is made.

The risks and uncertainties that may cause actual results to differ materially from those indicated in any forward-looking may be included with the forward-looking statement itself. Other such risks and uncertainties include, but are not limited to, those discussed in Item 1A. Risk Factors in this report, as well as the following:

- adverse effects from the novel coronavirus ("COVID-19") pandemic;
- we may be adversely affected by general economic and financial conditions beyond our control;
- we are exposed to risks related to our international sales and operations;
- our reported results could be adversely affected by currency exchange rates and currency devaluation could impair our competitiveness;
- our operations outside the U.S. require us to comply with a number of U.S. and foreign regulations, violations of which could have a material adverse effect on our financial condition and results of operations;
- we may be adversely affected by changes in trade policy, including the imposition of tariffs and the resulting consequences;
- adverse conditions in the global automotive market or adoption of alternative and new technologies may adversely affect demand for our automotive carbon products;
- we face competition from producers of alternative products and new technologies, and new or emerging competitors;
- we face competition from infringing intellectual property activity;
- if increasingly more stringent air quality standards worldwide are not adopted, our growth could be impacted;
- we may be adversely affected by a decrease in government infrastructure spending;
- adverse conditions in cyclical end markets may adversely affect demand for our engineered polymers products;
- our printing inks business serves customers in a market that is facing declining volumes and downward pricing;
- our Performance Chemicals segment is highly dependent on crude tall oil ("CTO") which is limited in supply;
- lack of access to sufficient CTO would impact our ability to produce CTO-based products;
- a prolonged period of low energy prices may materially impact our results of operations;
- our engineered polymers product line may be adversely affected by the United Kingdom's ("UK") withdrawal from the European Union;
- the acquisition (the "Caprolactone Acquisition") of Perstorp Holding AB's caprolactone division (the "Caprolactone Business") may expose us to unknown or understated liabilities;
- we are dependent upon third parties for the provision of certain critical operating services at several of our facilities;
- we may be adversely affected by disruptions in our supply chain;
- the occurrence of natural disasters, such as hurricanes, winter or tropical storms, earthquakes, tornadoes, floods, fires or other unanticipated problem such as labor difficulties (including work stoppages), equipment failure or unscheduled maintenance and repair, which could result in operational disruptions of varied duration;

CAUTIONARY STATEMENT REGARDING FORWARD-LOOKING STATEMENTS (CONTINUED)

- we are dependent upon attracting and retaining key personnel;
- from time to time, we are called upon to protect our intellectual property rights and proprietary information though litigation and other means;
- if we are unable to protect our intellectual property and other proprietary information, we may lose significant competitive advantage;
- information technology security breaches and other disruptions;
- complications with the design or implementation of our new enterprise resource planning system;
- government policies and regulations, including, but not limited to, those affecting the environment, climate change, tax policies, tariffs and the chemicals industry; and
- losses due to lawsuits arising out of environmental damage or personal injuries associated with chemical or other manufacturing processes.

PART I

Item 1. Business

General

Ingevity provides products and technologies that purify, protect, and enhance the world around us. Through a diverse team of talented and experienced people, we develop, manufacture, and bring to market solutions that are both largely renewably sourced and help customers solve complex problems, while making the world more sustainable. We operate in two reporting segments: Performance Materials and Performance Chemicals. Our products are used in a variety of demanding applications, including automotive components that reduce gasoline vapor emissions, asphalt paving, oil exploration and production, agrochemicals, adhesives, lubricants, publication inks, coatings, elastomers, and bioplastics.

Throughout this Annual Report on Form 10-K, except where otherwise stated or indicated by the context, "Ingevity", the "Company", "we", "us", or "our" means Ingevity Corporation and its consolidated subsidiaries and their predecessors.

Our business originated as part of the operations of our former parent company, Westvaco Corporation, in 1964, and we operated as a division of Westvaco Corporation and its corporate successors, including MeadWestvaco Corporation and WestRock Company ("WestRock") until our separation from WestRock in May 2016 (the "Separation"). Our common stock began "regular-way" trading on the New York Stock Exchange in May 2016 under the symbol "NGVT." Since the Separation, we acquired substantially all of the assets used in Georgia-Pacific Chemicals LLC's pine chemical business (the "Pine Chemical Business") in March 2018 and acquired Perstorp Holding AB's entire caprolactone business (the "Caprolactone Business") in February 2019. For additional information on these acquisitions, see Note 17 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K.

Our principal executive offices are located at 4920 O'Hear Avenue, Suite 400, North Charleston, South Carolina 29405. Ingevity maintains a website at www.ingevity.com. We make available, free of charge through our website, our filings with the Securities and Exchange Commission (the "SEC"), including our annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K and any amendments to those reports, as soon as reasonably practicable after such items are filed with, or furnished to, the SEC. We also use our website to publish additional information that may be important to investors, such as presentations to analysts. Information contained in or connected to our website is not incorporated by reference into this Annual Report on Form 10-K. Reports we file with the SEC may also be viewed at www.sec.gov.

The table below illustrates our product lines and the primary end uses for our products by segment, as well as our revenue by segment for fiscal year 2020. For more information on our U.S. and foreign operations, see Notes 5 and 20, to the consolidated financial statements included within Part II. Item 8 of this Form 10-K.

	Performan	ce Materials	Performance Chemicals						
Product Lines	Automotive Technologies	Process Purification	Pavement Technologies	Oilfield Technologies	Industrial Specialties	Engineered Polymers			
Primary End Uses	Gasoline vapor emissions control	Purification of food, water, beverages and chemicals	Warm mix asphalt Pavement preservation Pavement reconstruction and recycling	Well service additives Production and downstream applications	Adhesives Agrochemicals Lubricants Printing inks Industrial intermediates	Coatings Resins Elastomers Adhesives Bioplastics Medical devices			
2020 Revenue	\$510.0) million	\$706.1 million						

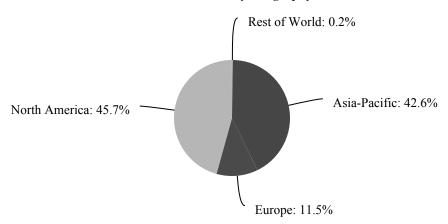
Segments

Performance Materials

Our automotive technologies product line engineers, manufactures, and sells hardwood-based, chemically activated carbon products, produced through a highly technical and specialized process primarily for use in gasoline vapor emission control systems in cars, trucks, motorcycles, and boats. To maximize the productivity of our manufacturing assets, we also produce a number of other activated carbon products for food, water, beverage, and chemical purification applications, which are sold through our process purification product line.

Our automotive activated carbon products primarily take the form of granular, pellets and honeycomb "scrubber", which are primarily utilized in vehicle-based gasoline vapor emission control systems that capture gasoline vapor emissions that would otherwise be released into the atmosphere as volatile organic compounds. The captured gasoline vapors are largely purged from the activated carbon and directed to the engine where they are used as supplemental power for the vehicle. In this way, our automotive activated carbon products are part of a system that provides for both environmental control and energy recovery. Performance Materials' net sales for 2020, 2019, and 2018 were \$510.0 million, \$490.6 million, and \$400.4 million, respectively; the chart below allocates our 2020 Performance Materials' net sales by geography. Sales are assigned to geographic areas based on the location of the third party to which product was shipped.

2020 Net Sales by Geography



Customers

We sell our automotive technologies products to over 60 customers around the globe. In 2020, our ten largest customers accounted for approximately 90 percent of the product line's sales. We are the trusted source of these products for many of the world's largest automotive parts manufacturers, including BorgWarner Inc. (previously Delphi Technologies PLC), A. Kayser Automotive System GmbH, Korea Fuel-Tech Corporation, MAHLE GmbH, and many other large and small component manufacturers throughout the global automotive supply chain. Our process purification products are sold to approximately 70 customers globally. We sell our automotive technologies and process purification products primarily through our own direct sales force in North America, Europe, South America and Asia and also have a smaller, focused network of third-party distributors that have established a strong direct sales and marketing presence in North America and China.

Competition

Our automotive technologies competitors include Cabot Corp., Kuraray Co., Ltd., and several Chinese manufacturers. Ingevity has a decades-long track record of providing activated carbon that achieves life-of-vehicle emission standards. Given the imperative for automotive manufacturers to produce vehicles for the U.S., Canadian, and Chinese markets capable of meeting life-of-vehicle emission standards, or potentially face expensive recalls and unfavorable publicity, our automotive activated carbon products provide our customers the low-risk choice for this high performance application.

Competitors in our process purification product line include Cabot Corp., Kuraray Co., Ltd., Osaka Gas Chemicals Co., Ltd., and several domestic U.S. manufacturers and distributors of imported products.

Raw Materials and Production

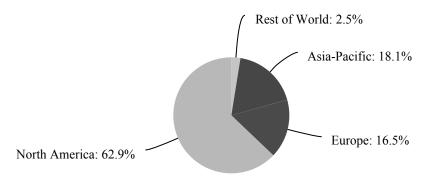
Our Performance Materials segment serves customers globally from three manufacturing locations in the U.S. and two in China. The primary raw material (by volume) used in the manufacture of our activated carbon is hardwood sawdust. Sawdust is readily available and is sourced through multiple suppliers to protect against supply disruptions and to maintain competitive pricing.

We also utilize phosphoric acid, which is used to chemically activate the hardwood sawdust. This phosphoric acid is sourced through multiple suppliers to protect against supply disruptions and to maintain competitive pricing. The market price of phosphoric acid is affected by the global agriculture market as the majority of global phosphate rock production is used for fertilizer production and only a portion of that production is used to manufacture purified phosphoric acid.

Performance Chemicals

Ingevity's Performance Chemicals segment is comprised of four product lines: pavement technologies, oilfield technologies, industrial specialties, and engineered polymers. Our products are utilized in warm mix paving, pavement preservation, pavement reconstruction and recycling, oil well service additives, oil production and downstream applications, adhesives, agrochemical dispersants, lubricants, printing inks, coatings, resins, elastomers, bioplastics, medical devices, and other diverse industrial uses. Our application expertise is often called upon by our customers to provide unique solutions that maximize resource efficiency. We have a broad and diverse customer base in this segment. In 2020, our top ten customers accounted for approximately 20 percent of our segment revenue, with the next 100 customers making up approximately 45 percent of our segment revenue. Performance Chemicals' net sales for 2020, 2019 and 2018 were \$706.1 million, \$802.3 million, and \$733.2 million, respectively; the chart below allocates our 2020 Performance Chemicals' net sales by geography. Sales are assigned to geographic areas based on the location of the third party to which product was shipped.

2020 Net Sales by Geography



Markets Served

Pavement Technologies

Our pavement technologies product line produces a broad line of innovative additives and technologies utilized globally in road construction and pavement preservation, including pavement reconstruction and recycling.

Warm Mix Asphalt. Evotherm®, our premier road construction additive, is a warm mix asphalt technology that promotes adhesion by acting as both a liquid antistrip and a warm mix asphalt. Once Evotherm is mixed into the binder utilized for road layer construction, production temperatures can be significantly cooler than conventional hot mix asphalt. Lower production temperatures allow our customers to reduce emissions and fuel use during road construction as well as extend their paying seasons into colder months.

Pavement Preservation. We provide an array of pavement preservation products that eliminate many traditional asphalt heating, mixing and transportation demands – saving our customers time, energy and money. Our technical team matches the right emulsifier and design to our customers' materials and conditions to create high-performing emulsions. We offer a full range of specialized cationic, anionic and amphoteric emulsifiers with additional, custom-formulated specialty additives.

Pavement Reconstruction and Recycling. We provide an array of pavement reconstruction and recycling additives that reduce the life cycle cost of pavement by enabling the milling and reuse of existing roadways. Our cold in-place recycling additives allow our customers to reopen existing roadways faster, while also lowering overall costs and jobsite emissions.

Customers

We supply our pavement technologies products to approximately 500 customers in 60 countries through our own direct sales force, primarily in North America and Asia, as well as a network of third-party distributors. In 2020, our ten largest customers accounted for 40 percent of the product line's sales. Our largest customers include: Colas SA, Ergon, Inc., Associated Asphalt Inc., and Idaho Asphalt Supply Inc.

Competition

Our primary competitors in pavement technologies are Nouryon Chemicals B.V., Arkema S.A., and Kao Specialties Americas LLC. We compete based on deep knowledge of our customers' businesses and extensive insights into road building technologies and trends globally. We use these strengths to develop consulting relationships with government departments of transportation, facilitating new technology introduction into key markets around the world. Our combined expertise in the disciplines of chemistry and civil engineering provides us with a comprehensive understanding of the relationship between the molecular structure of our products and their impact on the performance of pavement systems. This allows us to develop products customized to local markets and to consistently deliver cost-effective solutions for our customers.

Oilfield Technologies

Our oilfield technologies product line produces and sells a wide range of innovative specialty chemical products for the global oilfield industry, including well service additives and chemical solutions for production and downstream applications.

Well Service Additives. Our well service additive products are formulated to increase emulsion stability and aid in fluid loss control for oil-based drilling fluids. Other additives include rheology modifiers, which are used to improve the viscosity properties of oil-based fluids and are typically used in deep water applications and wetting agents, which provide improved wetting of solids and aid in the efficiency of the drilling process. This family of products aids in accessing difficult to reach oil and gas reserves, both on and offshore around the globe.

Production and Downstream Applications. Our production and downstream products serve as corrosion inhibitors or their components. Crude oil and natural gas production are characterized by variable production rates and unpredictable changes due to the nature of the produced fluids including but not limited to water and salt content. Our corrosion inhibitors maximize production rates by reducing the downtime for key equipment and pipes due to corrosion.

Customers

We sell our oilfield technologies products to approximately 70 customers around the globe using our own sales representatives and third-party distributors. In 2020, our ten largest customers accounted for 70 percent of the product line's sales. Our largest customers include Ecolab, Inc., Halliburton Co., Schlumberger Ltd., and Newpark Resources, Inc.

Competition

Our primary oilfield technologies competitors include Lamberti S.p.A., Mobile Rosin Oil Company, Inc., and First Source Technologies, Inc. We compete based on our ability to understand our customers' applications and deliver solutions that aid in their improvement of the exploration and production of oil and gas for end users. Our scale and manufacturing flexibility help us deliver the creativity, expedience, and confidence that customers in oilfield technologies require.

Industrial Specialties

Our industrial specialties product line produces and sells chemicals utilized in several industrial applications, including adhesive tackifiers, agrochemical dispersants, lubricant additives, printing ink resins, and industrial intermediates.

Adhesives. We are a global supplier of tackifier resins, which provide superior adhesion to difficult-to-bond materials, to the adhesives industry. Adhesive applications for our products include construction, product assembly, packaging, pressure sensitive labels and tapes, hygiene products, and road markings.

Agrochemicals. We produce dispersants for crop protection products as well as other naturally derived products for agrochemicals. Crop protection formulations are highly engineered, specifically formulated and cover a range of different formulation types, from liquids to solids. We deliver a wide range of dispersants that are high performing and consistent. In addition, our crop protection products are approved for use as inert ingredients in agrochemicals by regulatory agencies throughout the world.

Lubricants. We supply lubricant additives and corrosion inhibitors for the metalworking and fuel additives markets. Our lubricant products are multi-functional additives that contribute to lubricity, wetting, corrosion inhibition, emulsification, and general performance efficiency. Our products are valued because of their ease in handling, robust performance, and improved formulation stability.

Printing Inks. We are a leading supplier of ink resins from renewable resources to the global graphic arts industry for the preparation of printing inks. Our products improve gloss, drying speed, viscosity, adhesion, and rub resistance of the finished ink to the substrate. We produce a wide array of resins, typically specifically tailored to a customer's use, which can vary by application, pigment type, end use, formulation, manufacturing, and printing process.

Industrial Intermediates. Our functional chemistries are sold across a diverse range of industrial markets including, among others, paper chemicals, textile dyes, rubber, cleaners, mining, and nutraceuticals.

Customers

We sell our industrial specialties products to approximately 500 customers around the globe in over 45 countries through our own direct sales representatives and third-party sales representatives and distributors. In 2020, our ten largest customers accounted for 40 percent of the product line's sales. Our largest customers include Ennis-Flint, Inc., H.B. Fuller Co., Syngenta Crop Protection AG, and Flint Group.

Competition

Our competitors, which differ depending on the product, application, and region, include Kraton Corp., Eastman Chemical Co., ExxonMobil Corp., Borregaard ASA, Lawter, Inc., Respol S.A., Firmenich SA, as well as several others. Specific to our industrial specialty products, our customers select the product that provides the best balance of performance, consistency, and price. Reputation and loyalty are also valued by our customers and allow us to win business when other factors are equal. In adhesives, our products compete against other tackifiers, including other tall oil resin ("TOR") based tackifiers as well as tackifiers produced from gum rosin and hydrocarbon starting materials. In addition, the choice of polymer used in an adhesive formulation drives the selection of tackifier. In agrochemicals, the selection of a dispersant is made early in the product development cycle and the formulator has a choice among our sulfonated lignin products, lower quality lignosulfonates and other surfactants such as naphthalene sulfonates. In lubricants, we compete against other producers of distilled tall oil and additives. In printing inks, our products compete against other resins that can be derived from TOR, gum rosin and, to a lesser extent, hydrocarbon sources. In our industrial intermediates business, our tall oil fatty acid ("TOFA") competes against widely available fats and oils derived from tallow, soy, rapeseed, palm, and cotton sources.

Engineered Polymers

Our engineered polymers product line includes caprolactone and caprolactone based specialty chemicals for use in coatings, resins, elastomers, adhesives, bioplastics, and medical devices.

Coatings. We supply coating products that are used in automobile refinishing, sports floors, and marine applications. Our products enhance product performance by providing abrasion resistance, long durability, high quality finish, and enhanced performance in resin modification. Our products are often preferred because they provide a combination of traits that allows customers to displace several combinations of other products.

Resins. We supply resin products that are used in acrylic resins, polyurethane, and inks. Our products enhance product performance due to their protective properties, all weather performance and reduction or elimination of the need for solvents in formulations. Our products tend to be preferred where superior or particular performance levels are required.

Elastomers. We supply products that are used in wheel seals, mining screens, and polyurethane films. Our products enhance product performance due to their resistance to wear and tear, ability to maintain form and function under pressure and temperature and excellent UV resistance. Our products are often used in highly demanding applications where competing products do not reach required performance levels.

Adhesives. We supply products that are used in hot-melts, fabric lamination, and miscellaneous footwear components. Our products enhance product performance through their durability and substrate compatibility. Our products are often preferred because they are found to be easier to process and apply compared to competitive offerings.

Bioplastics. We supply products that are used in films, paper coatings, disposable cups, utensils, and packaging. Our products enhance product performance due to the combination of their biodegradability, improved mechanical properties, and wide processability when used in combination with other bioplastic solutions. Special grades are also available to help comply with food contact legislation in various regions and applications.

Medical Devices. We also supply products that are used in medical devices. Our products enhance end product performance due to their low melting point and ability to be thermoformed. Our products improve process conditions and provide patient comfort compared to competitive thermoplastic offerings.

Customers

We sell our engineered polymers chemicals to over 300 customers around the globe through our own direct sales representatives and third-party sales representatives and distributors. In 2020, our ten largest customers accounted for 40 percent of the product line's sales. Our largest customers include polyurethane, adhesive, coatings, and bioplastics manufacturers.

Competition

Our primary caprolactone competitors are Daicel, Corp. and BASF SE, but we also face competition from other competing materials. We compete based on performance as compared to the other competitive materials. We also compete by strengthening our technology-focused relationships with our customers.

Raw Materials and Production

Our Performance Chemicals segment serves customers globally from three manufacturing locations in the U.S. and one in the U.K. Most of our pavement technologies, oilfield technologies, and industrial specialties products are derived from CTO, a co-product of the kraft pulping process, where pine is used as the source of the pulp. We also produce products derived from lignin, which is extracted from black liquor, another co-product of the kraft pulping process.

In 2016, we entered into a long-term supply agreement with WestRock pursuant to which we purchase all of the CTO and CTO equivalent tons of black liquor soap skimming ("BLSS"), the precursor to CTO, from WestRock's kraft mills as of such date, subject to certain exceptions. In 2018, we entered into a 20-year supply agreement with Georgia-Pacific LLC ("Georgia-Pacific"), pursuant to which we purchase the lesser of 125,000 tons of CTO and the aggregate output of CTO produced and originating at certain of Georgia-Pacific's paper mills.

These relationships with WestRock and Georgia-Pacific are strategically important to our Performance Chemicals business due to the limited supply of CTO globally, of which we believe a significant portion is already under long-term supply agreements with other consumers of CTO. Under these agreements, we currently expect to source approximately 60 to 70 percent of our CTO requirements through 2025 based on the maximum operating rates of our three Performance Chemicals' pine chemicals facilities. The remainder of our CTO needs are sourced through short-term contracts in the open market.

We believe the supply from Georgia-Pacific, WestRock, and our other contracted sources of CTO will allow us to serve expected customer demand through 2021.

Our engineered polymers' products are caprolactone based, which is derived from cyclohexanone, a benzene derivative, and hydrogen peroxide, both of which are readily available in the market. We maintain multiple suppliers of

cyclohexanone to protect against supply disruptions and to maintain competitive pricing. Our hydrogen peroxide is currently supplied by Solvay Interox Limited, a co-located supplier at our Warrington, UK facility under a long-term supply agreement.

The other key raw materials used in the Performance Chemicals business are nonylphenol, pentaerythritol, and ethylene amines. These are sourced where possible through multiple suppliers to protect against supply disruptions and to maintain competitive pricing.

Energy

Our manufacturing processes require a significant amount of energy. We are dependent on natural gas to fuel the processes in our chemical refineries and activated carbon plants. Although we believe that we currently have a stable natural gas supply and infrastructure for our operations, we are subject to volatility in the market price of natural gas. We enter into certain derivative financial instruments in order to mitigate expected fluctuations in market prices and the volatility to earnings and cash flow resulting from changes to pricing of natural gas purchases. All of our manufacturing processes also consume a significant amount of electricity. Each of these facilities are located in regulated service areas that have stable rate structures with reliable electricity supply.

Governmental Regulations

Our manufacturing operations are subject to regulation by governmental and other regulatory authorities with jurisdiction over our operations. These regulations include regulations concerning the discharge of materials into the environment, the handling, storage, transportation, disposal, and clean-up of chemicals and waste materials, and otherwise relating to the protection of the environment, as well as other operational regulations, such as the Occupational Safety and Health Act and the Toxic Substances Control Act in the U.S. and the Registration, Evaluation and Authorization of Chemicals, or REACH, directive in Europe, the UK, and other countries. It is not possible to quantify with certainty the material effects that compliance with these regulations may have upon the capital expenditures, earnings or competitive position of Ingevity, but we currently anticipate that such compliance will not have a material adverse effect on any of the foregoing. Environmental and other regulations and related legal proceedings have the potential to involve significant costs and liability for Ingevity.

Intellectual Property

Intellectual property, including patents, closely guarded trade secrets and highly proprietary manufacturing know-how, as well as other proprietary rights, is a critical part of maintaining our technology leadership and competitive edge. Our business strategy includes filing patent and trademark applications where appropriate for proprietary developments, as well as protecting our trade secrets. We actively create, protect, and enforce our intellectual property rights. We are filing for and being granted patents for product and process developments for our Performance Materials business that we believe are both novel and consistent with trends in the technological development of engines. Our Evotherm Warm Mix Asphalt technology is supported by numerous global patents. Additionally, our Caprolactone Business and related technologies are supported by numerous global patents and trademarks, as well as proprietary manufacturing and technical know-how. The protection afforded by our patents and trademarks varies based on country, scope, and coverage, as well as the availability of legal remedies. Although our intellectual property taken as a whole is material to the business, there is no individual patent or trademark the loss of which could have a material adverse effect on the business.

In November 2020, we received an adverse decision finding some, but not all, of the claims in our "canister bleed emissions" patent invalid in our infringement action against BASF Corp in the U.S. District Court for the District of Delaware. We intend to challenge the decision, however in the meantime we anticipate the decision having limited impact on our commercial operations or financial results through the patent's expiration in March 2022.

Seasonality

There are a variety of seasonal dynamics, including global climate and weather conditions, that impact our businesses, though none materially affect financial results, except in the case of the pavement technologies product line, where roughly 70 to 75 percent of revenue is generated between April and September. From a supply perspective, this seasonality is effectively managed through pre-season inventory build and active inventory management throughout the year.

Human Capital Management

Our employees are critical to our success and we strive to provide a safe, rewarding and respectful workplace where our people are provided with opportunities to pursue career paths based on skills, performance and potential. Ingevity is

dependent upon our talented production workers who are key to ensuring safe and successful operations, as well as upon engineering, technical, sales and application specialists, together with experienced industry professionals, who are integral to our success. Additionally, we rely on senior management in order to establish and execute our business strategies. Our success depends, in part, on our ability to attract, retain and motivate these key performers. Our failure to attract and retain those making significant contributions could adversely affect our financial condition and results of operations.

We currently employ approximately 1,750 employees, of whom approximately 76 percent are employed in the U.S. Approximately 20 percent of our employees are represented by domestic (i.e. U.S.) labor unions under various collective bargaining agreements ("CBA"). We engage in negotiations with labor unions for new CBAs from time to time based upon expiration dates of agreements and statutory requirements. We consider our relationships with all salaried, union hourly and non-hourly employees to be positive and collaborative.

During the first quarter of 2020, at our Wickliffe, Kentucky Performance Materials' manufacturing facility, the United Steel, Paper and Forestry, Rubber, Manufacturing, Energy, Allied Industrial and Service Workers International Union, AFL-CIO-CLC ratified a three-year collective bargaining agreement ("CBA"), which expires February 1, 2023. Additionally, at our Crossett, Arkansas Performance Chemicals' manufacturing facility, the International Association of Machinists and Aerospace Workers Union ("IAM") agreed to extend the existing CBA by one year until January 15, 2021, in exchange for economic considerations. The Company and IAM resumed negotiations in Crossett in the first quarter of 2021, and the parties continue to operate under the expired CBA. In addition, at our Covington, Virginia Performance Materials' manufacturing facility, the CBA with Covington Local Union 464 of the International Brotherhood of Electrical Workers ("IBEW") agreement expired on January 15, 2021 and the CBA with Covington Local 675 affiliated with The Association of Western Pulp and Paper Workers ("AWPPW") will expire on December 1, 2021. The Company and Covington IBEW began negotiations in the first quarter of 2021, and the parties continue to operate under the expired CBA. Negotiations with the Covington AWPPW will begin in the fourth quarter of 2021.

Item 1A. Risk Factors

Based on the information currently known to us, we believe that the following information identifies the most significant risk factors affecting our company. However, the risks and uncertainties our company faces are not limited to those set forth in the risk factors described below. Additional risks and uncertainties not presently known to us or that we currently believe to be immaterial may also adversely affect our business. In addition, past financial performance may not be a reliable indicator of future performance, and historical trends should not be used to anticipate results or trends in future periods.

If any of the following risks and uncertainties develops into actual events, these events could have a material adverse effect on our business, financial condition or results of operations. In such case, the trading price of our common stock could decline.

Operational and Market Risks

The Novel Coronavirus (COVID-19) pandemic has and may continue to have an adverse effect our business, financial condition, results of operations, cash flows and stock price.

COVID-19 continues to spread in areas where we operate and transact business and the related pandemic continues to impact our operations and financial results. We have been classified as an essential business in the jurisdictions that have made this determination to date and have been allowed to continue our operations. However, our facilities - as well as the operations of our suppliers, customers and third-party sales representatives and distributors - have been, and will continue to be, disrupted by governmental and private sector responses to the COVID-19 pandemic. This includes business shutdowns, work-from-home orders and social distancing protocols, travel or health-related restrictions, as well as quarantines, self-isolations, and disruptions to transportation channels. Additional government shutdown orders or stay-at-home directives, or an outbreak among or quarantine of the employees in any of our facilities, could cause significant interruptions to, or temporary closures of our operations and could materially adversely affect our ability to adequately staff and maintain our operations. Furthermore, we may be unsuccessful at continuing to manage our business effectively due to the extended period of working from home by some of our employees. Working remotely may eventually lead to inefficiencies, as well as technology and security risks. Additionally, we are unsure if the extended period during which our employees are unable to travel to our facilities or those of our customers and suppliers may negatively impact our business.

Disruptions to the operations of our suppliers have at times, and may again, negatively impact our ability to purchase goods and services for our business at efficient prices and in sufficient amounts. Additionally, the operations of our customers have been, and could be further, disrupted, which can result in customers attempting to delay or cancel orders, reduce future orders or seek extended payment terms. Furthermore, the negative impact of the COVID-19 pandemic on the global economy, adverse changes in the industries that our products serve or adverse changes in the financial condition of our customers could further adversely impact demand for our products, particularly in the automotive industry and industrial and consumer applications. During 2020, many of our customers experienced extensive disruptions due to the COVID-19 pandemic, which directly impacted sales of our products, most particularly in the automotive industry during the second quarter of 2020. In addition, the significant decrease in energy prices resulting from the COVID-19 pandemic, including crude oil and gas prices, negatively impacted and could further impact the activities of our oilfield customers, resulting in a corresponding adverse effect on demand for our oilfield products. Furthermore, the markets for our engineered polymers products have also been negatively impacted due to reduced global industrial and consumer demand, and the markets for our industrial specialties products have also been negatively impacted due to reduced global industrial demand.

The extent of the impact that the COVID-19 pandemic will continue to have on our business and financial results will depend on various uncertainties and future developments, including the ultimate duration, severity and spread of the virus in the countries where we operate and transact business, additional actions taken by government authorities in their efforts to contain or treat the virus and to mitigate the economic disruptions and the global economic downturn resulting from the pandemic, the speed at which vaccines are deployed and their effectiveness against COVID-19 variants. These impacts, together with the other factors discussed, are highly uncertain and cannot be predicted, however they have and may continue to have an adverse effect on our business, financial condition, results of operations, cash flows and a negative impact on our stock price. There can be no assurance that any decrease in sales resulting from the COVID-19 pandemic will be offset by increased sales in subsequent periods.

If increasingly more stringent air quality standards worldwide are not adopted, our growth could be impacted.

Environmental standards drive the implementation of gasoline vapor emission control systems by automotive manufacturers. Given increasing societal concern over global warming and health hazards associated with poor air quality, there is growing pressure on regulators across the globe to take meaningful action. For those countries that have not significantly regulated gasoline vapor emissions, enacting more stringent regulations governing gasoline vapor emissions represents a significant upside to the Company's automotive carbon business. However, regulators may react to a variety of considerations, including economic and political, that may mean that any such more stringent regulations are delayed or shelved entirely, in one or more countries or regions. As the adoption of more stringent regulations governing gasoline vapor emissions is expected to drive significant growth in our automotive carbon applications, the failure to enact such regulations will have a significant impact on the growth prospects for these products.

In order to compete successfully, we must develop new products and technologies meeting evolving market and customer needs; disruptive technologies could reduce the demand for the Company's products.

Our industries and the end-use markets into which we sell our products experience periodic technological change and product improvement. Our future growth will depend on our ability to gauge the direction of commercial and technological progress in key end-use markets and on our ability to fund and successfully develop, manufacture and market products in such changing end-use markets. If we fail to keep pace with the evolving technological innovations in our end-use markets on a competitive basis, including with respect to innovation with regard to the development of alternative uses for, or application of, products developed that utilize such end-use products, our financial condition and results of operations could be adversely affected. Similarly, we face competition in our applications. Disruptive technology involving new or superior solutions could reduce the demand for the Company's products.

Adverse conditions in the automotive market may adversely affect demand for our automotive carbon products.

Sales of our automotive activated carbon products are tied to global automobile production levels. Automotive production in the markets we serve can be affected by macro-economic factors such as interest rates, fuel prices, shifts in vehicle mix (including shifts toward alternative energy vehicles), consumer confidence, employment trends, regulatory and legislative oversight requirements and trade agreements. For example, the global economic downturn in 2008/2009, led to a drastic reduction in vehicle sales and an even greater reduction in vehicle production as OEMs right-sized their inventories to meet the lower sales volumes. Furthermore, primarily during the first half of 2020, the COVID-19 pandemic led to a significant reduction in vehicle production and vehicles sales were negatively impacted by government shutdown orders and stay-at-home directives. Regional disruptions due to localized natural disasters or multi-month strikes at suppliers or OEMs can also

significantly impact vehicle production and therefore demand for our automotive carbon products. Additionally, if the COVID-19 pandemic continues, it could negatively impact demand for automotive sales, which would adversely impact sales of our carbon products, as was the case in the second quarter of 2020. The extent to which COVID-19 pandemic impacts our results will depend on future developments, which are highly uncertain and cannot be predicted, including the severity of the COVD-19 pandemic, actions to contain COVID-19 or treat its impact, among others.

The Company's pavement technologies product line is heavily dependent on government infrastructure spending.

A significant portion of our customers' revenues in our pavement technologies business is derived from contracts with various foreign and U.S. governmental agencies, and therefore, when government spending is reduced, our customers' need for our products is similarly reduced. While we do not do business directly with governmental agencies, our customers provide paving services to, for example, the governments of various jurisdictions within North America, South America, Europe, China, Brazil and India, and revenue either directly or indirectly attributable to such government spending continues to remain a significant portion of our revenues. Government business is, in general, subject to special risks and challenges, including: delays in funding and uncertainty regarding the allocation of funds to federal, state and local agencies, delays in the expenditures and delays or reductions in other state and local funding dedicated for transportation projects; other government budgetary constraints, cutbacks, delays or reallocation of government funding; long purchase cycles or approval processes; our customers' competitive bidding and qualification requirements; changes in government policies and political agendas; and international conflicts or other military operations that could cause the temporary or permanent diversion of government funding from transportation or other infrastructure projects.

The Company's engineered polymers product line is reliant on cyclical end-markets, such as the automotive market and the apparel market, which are impacted by changes in consumer and industrial demand.

Our engineered polymers product line end-markets are subject to constant and rapid technology changes, changes in consumer preferences, evolving standards, and changes in product supply and demand. For example, demand for our engineered polymers products in the automotive market, where our products are formulated into automotive resins and coatings and various components, may be affected by technological advances, changing automotive OEM specifications and global automobile production levels. In the footwear market, demand for our engineered polymers products, where our products are sold into footwear adhesives, may be affected by consumer discretionary spending and changes in consumer preferences. The impact of these changes may lead to increased competition from competing and substitute products and downward pricing pressures on our customers, and therefore, our engineered polymers product offerings. Additionally, if the COVID-19 pandemic continues, it could negatively impact demand for consumer and industrial demand, which would continue to adversely impact sales of our engineered polymers products.

The Company's oilfield technologies business is significantly affected by trends in oil and natural gas prices that affect the level of exploration, development and production activity.

Demand for our oilfield technologies services and products is particularly sensitive to the level of exploration, development and production activity of, and the corresponding capital spending by, oil and natural gas companies, including national oil companies. The level of exploration, development and production activity is directly affected by trends in oil and natural gas prices, which historically have been volatile. Crude oil prices have declined significantly during 2020. Pricing moved from \$58 per barrel in January to a low of \$16 per barrel in April to \$48 per barrel in December. Pricing is not currently forecasted to change significantly from these levels during 2021. While these pricing levels show recovery from the lows reached during the first half of 2020, they remain off their highs seen in the last decade.

Any prolonged low pricing environment for oil and natural gas is likely to result in reduced demand for our oilfield technology products, which may have a material adverse effect on our results of operations.

The Company's printing inks business serves customers in a market that is facing declining volumes and downward pricing.

The use of inks in which our printing ink resins are used, such as those made for magazines and catalogs, has significantly decreased, as the printing industry has experienced a reduction in demand due to various factors including competition from alternative sources of communication, including email, the Web, electronic readers, interactive television and electronic retailing. The impacts of these changes have led to continued intense competition and downward pricing pressures on printing inks, and therefore, our ink products.

A prolonged period of low energy prices may materially impact our results of operations.

The price of energy may directly or indirectly impact demand, pricing or the profitability for certain Ingevity products. As petroleum oil prices fall or change rapidly, Ingevity products may be disadvantaged due to the fact that CTO and BLSS are thinly traded commodities with pricing commonly established for periods ranging from one quarter to one year periods of time. Due to this, alternative technologies which compete with product offerings provided by Ingevity may be advantaged from time to time in the marketplace. Protracted periods of high volatility or sustained oversupply of petroleum oil may also translate into increased competition from petroleum-based alternatives which would otherwise be consumed in petroleum transportation fuel blends. In addition, pricing for competing naturally derived oils such as palm or soybean is likely to provide further pressure on pricing of the Company's products during periods of depressed petroleum prices.

We face competition from producers of substitute products and new technologies, and new or emerging competitors.

In the Performance Materials segment, there is competition from various other activated carbon manufacturers. These competitors are actively trying to develop more advanced and alternative activated carbon products that would more effectively compete with our products in the automotive applications. There is also competition in the automotive applications from non-activated carbon competitors or product offerings. For example, at least one OEM is using sealed tanks in certain subsets of its vehicles to comply with the Tier 3/LEV III regulations. While the sealed tank fuel systems generally require a similarly sized pelleted activated carbon canister to deal with refueling emissions, in most cases, they do not use an extruded honeycomb to meet current U.S. and California regulations. There is also emerging competition in the "honeycomb" space, which may impact sales of the Company's products. If a competitor were to succeed in developing products that are better suited for automotive evaporative emissions capture applications and/or a competitive technology, such as, but not limited to, sealed gas tanks, were to be implemented across a material number of vehicle platforms, our financial results could be negatively impacted.

In addition, growth in alternative vehicles, such as all-electric vehicles and hydrogen fuel cell vehicles, which do not use gasoline, may also adversely affect the demand for our products.

In the Performance Chemicals segment, hydrocarbon resins and gum rosin-based products compete with TOR-based resins in the adhesives and printing inks markets. The price of gum rosin has a significant impact on the market price for TOR and rosin derivatives and the price of gum rosin is driven by labor rates, land leasing costs and various other factors that are not within our control. Hydrocarbon resins, for example, C5 resins, are co-products from isoprene (synthetic rubber). Availability and pricing are determined by the supply and demand for synthetic rubber as well as crude oil prices as the feedstock for isoprene and various other factors that are not within our control. Animal and vegetable-based fatty acids compete with TOFA products in lubricant and industrial specialties. The market price for TOFA products is impacted by the prices of other fats and oils and the prices for other fats and oils is driven by actual and expected harvest rates, crude oil prices and the biofuel market. Other monomers, thermoplastics and polyols compete with our caprolactone based products. The price for our products is impacted by the prices of competitive substitutes which are influenced by petroleum prices as well as other supply and demand factors. Additionally, the Company faces competition from competitors that are actively developing new technologies and competing products across the segment. A significant investment by a competitor in a competitive technology or product line could negatively impact our financial results.

Disruptions at any of our manufacturing facilities could negatively impact our production, financial condition and results of operations.

An operational disruption in any of our facilities could negatively impact production and our financial results. The occurrence of a natural disaster, such as a hurricane, tropical storm, earthquake, tornado, severe weather, flood, fire, as well as risk that may result from climate change, could cause operational disruptions. Additionally, other unanticipated problems such as labor difficulties, health epidemics (including the COVID-19 pandemic), equipment failure, cyberattack or other cybersecurity incident, capacity expansion difficulties or unscheduled maintenance could also cause operational disruptions of varied duration. These types of disruptions could materially adversely affect our financial condition and results of operations to varying degrees dependent upon the facility, the duration of the disruption, our ability to shift business to another facility or find alternative sources of materials or energy. In certain cases, we have some products that are only made at one facility. For example, in the case of our Waynesboro, Georgia facility, while we have some redundancies within the facility, we only have one facility that makes our extruded honeycomb products. In the case of our Warrington, UK facility, while we have some redundancies within the facility, we only have one facility that makes our caprolactone products. As other examples, in our Charleston SC facility, we source black liquor from an adjacent paper mill to isolate and subsequently modify lignin to serve

our agriculture customers while we make the vast majority of our ink resin products in our DeRidder, Louisiana facility. While we have redundancies within these facilities, we have limited ability to make these products at other facilities. Finally, the COVID-19 pandemic is causing travel disruptions, quarantines and/or closures, which could result in disruptions to our manufacturing and production operations at our facilities, as well as those of our suppliers and customers. Any losses due to these events may not be covered by our existing insurance policies or may be subject to certain deductibles.

We are dependent upon third parties for the provision of certain critical operating services at several of our facilities.

We are dependent upon third parties for the provision of certain critical operating services at our Covington, Virginia Performance Materials facility and at the following Performance Chemicals facilities: Crossett, Arkansas; North Charleston, South Carolina; and Warrington, UK.

We are dependent on: (i) the WestRock Covington, Virginia paper mill ("WestRock VA Paper Mill") for the provision of electricity, water, compressed air, steam and wastewater treatment to our Covington Performance Materials facility; (ii) the WestRock North Charleston, South Carolina paper mill ("WestRock SC Paper Mill") for the provision of water, compressed air, steam and wastewater treatment at our North Charleston Performance Chemicals facility; (iii) the Georgia-Pacific Crossett, Arkansas paper mill and chemicals plant (collectively, "Georgia-Pacific Mill") for the provision of natural gas, water, compressed air and wastewater treatment to our Crossett Performance Chemicals facility; and (iv) Solvay Plant for the provision of water, compressed air, nitrogen, natural gas, electricity, steam, and wastewater treatment and waste management at our Warrington Performance Chemicals facility. We have existing long-term contractual arrangements covering these services for our Covington, Crossett, North Charleston and Warrington facilities. The provision of these services would be at risk if any of the counterparties were to idle or permanently shut down the associated mill, or if operations at the associated mill were disrupted due to natural or other disaster, or by reason of strikes or other labor disruptions, or if there were a significant contractual dispute between the parties.

In the event that WestRock VA Paper Mill, WestRock SC Paper Mill, Georgia-Pacific Mill or Solvay Plant were to fail to provide the contracted services, we would be required to obtain these services from other third parties at an increased cost or to expend capital to provide these services ourselves. The expenses associated with obtaining or providing these services, as well as any interruption in our operations as a result of the failure of the counterparty to provide these services, may be significant and may adversely affect our financial condition and results of operations.

Furthermore, in the event that WestRock VA Paper Mill wastewater treatment operations do not comply with permits or applicable law and the WestRock VA Paper Mill is unable to determine the cause of such compliance, then we will be responsible for between 10 percent and 50 percent of the costs and expenses of such noncompliance (increasing in 10 percent increments per violation during each twelve month period) despite representing less than 3 percent of the total wastewater volume. These costs and expenses may be significant and may adversely affect our financial condition and results of operations.

Additionally, (i) our Covington Performance Materials facility is located on real property leased from WestRock pursuant to a long-term lease agreement, and is surrounded by the WestRock VA Paper Mill, (ii) a portion of our North Charleston Performance Chemicals facility is located on real property leased from WestRock and is adjacent to the WestRock SC Paper Mill; (iii) our Crossett Performance Chemicals facility is located on real property leased from Georgia-Pacific pursuant to a long-term lease agreement, and is surrounded by the Georgia-Pacific Paper Mill and (iv) our Warrington, UK Performance Chemicals facility is located on real property leased from Solvay pursuant to multiple long-term lease agreements, and is surrounded by the Solvay Plant. In the event we were to have a dispute with WestRock, Georgia-Pacific or Solvay regarding the terms of the relevant lease agreements, or we were otherwise unable to fully access or utilize the leased property, the associated business disruption may be significant and may adversely affect our financial condition and results of operations.

We are also dependent on third parties for the disposal of brine, which results from our own conversion of BLSS into CTO. If these service providers do not perform under their contracts, the costs of disposing of brine ourselves, including, for example, the transportation costs, could be significant.

We are dependent on certain customers.

We have certain large customers in particular businesses, the loss of which could have a material adverse effect on the applicable segment's sales and, depending on the significance of the loss, our results of operations, financial condition or cash flows. Sales to the Company's ten largest customers (across both segments) accounted for 36 percent of total sales for 2020. No customer accounted for more than 10 percent of total sales for 2020. With some exceptions, our business with those large

customers is based primarily upon individual purchase orders. As such, our customers could cease buying our products from us at any time, for any reason, with little or no recourse. If a major customer or multiple smaller customers elected not to purchase products from us, our financial condition and results of operations would be materially adversely affected.

We are dependent on attracting and retaining key personnel.

The Company is dependent upon its production workers, as well as upon engineering, technical, sales and application specialists, together with experienced industry professionals and senior management. Our success depends, in part, on our ability to attract, retain and motivate these key performers. Our failure to attract and retain those making significant contributions could adversely affect our financial condition and results of operations.

Work stoppages and other labor relations matters may have an adverse effect on our financial condition and results of operations.

Many of our production employees are governed by collective bargaining agreements ("CBAs"). From time to time the Company engages in negotiations to renew CBAs as those contracts are scheduled to expire. During the first quarter of 2020, at our Wickliffe, Kentucky Performance Materials' manufacturing facility, the United Steel, Paper and Forestry, Rubber, Manufacturing, Energy, Allied Industrial and Service Workers International Union, AFL-CIO-CLC ratified a three-year collective bargaining agreement ("CBA"), which expires February 1, 2023. Additionally, at our Crossett, Arkansas Performance Chemicals' manufacturing facility, the International Association of Machinists and Aerospace Workers Union ("IAM") agreed to extend the existing CBA by one year until January 15, 2021, in exchange for economic considerations. The Company and IAM resumed negotiations in Crossett in the first quarter of 2021, and the parties continue to operate under the expired CBA. In addition, at our Covington, Virginia Performance Materials' manufacturing facility, the CBA with Covington Local Union 464 of the International Brotherhood of Electrical Workers ("IBEW") agreement expired on January 15, 2021 and the CBA with Covington Local 675 affiliated with The Association of Western Pulp and Paper Workers ("AWPPW") will expire on December 1, 2021. The Company and Covington IBEW began negotiations in the first quarter of 2021, and the parties continue to operate under the expired CBA. Negotiations with the Covington AWPPW will begin in the fourth quarter of 2021.

While the Company has generally positive relations with its labor unions, there is no guarantee the Company will be able to successfully negotiate new union contracts without work stoppages, labor difficulties or unfavorable terms. If we were to experience any extended interruption of operations at any of our facilities because of strikes or other work stoppages, our results of operations and financial condition could be materially and adversely affected. In addition, due to the co-location of our Covington, Crossett, North Charleston, and Warrington facilities within the WestRock VA Paper Mill, Georgia-Pacific Mill, WestRock SC Paper Mill and Solvay Plant facilities, a strike or work stoppage at any of these facilities could cause disruptions at our facilities, and our results of operations could be materially and adversely affected.

As we rely on information technologies to conduct our business, security breaches and other disruptions could compromise our information and expose us to liability, which could cause our business and reputation to suffer.

We rely on information technologies, some of which are managed by third parties, to manage the day-to-day operations and activities of our business, operate elements of our manufacturing facilities, manage our customer and vendor transactions, and maintain our financial, accounting and business records. In addition, we collect and store certain data, including proprietary business information, and may have access to confidential or personal information that is subject to privacy and security laws and regulations.

The secure processing, maintenance and transmission of sensitive, confidential and personal data is critical to our operations and business strategy. We follow industry best practices and have instituted a system of security policies, procedures, capabilities, and internal controls designed to protect this information. Additionally, we engage third-party threat detection and monitoring services which includes a global cyber security incident response team and our auditor conducts periodic ISO 27001 gap assessments on our information technology systems. Despite our security design and controls, and those of our third-party providers, we may be vulnerable to cyber- attacks, computer viruses, security breaches, inadvertent or intentional employee actions, system failures and other risks that could potentially lead to the compromising of sensitive, confidential or personal data, improper use of our, or our third-party provider systems, solutions or networks, unauthorized access, use, disclosure, modification or destruction of information, and operational disruptions. In addition, the global regulatory environment pertaining to information security and privacy is increasingly demanding, with new and changing requirements, such as the European Union's General Data Protection Regulation ("GDPR"), California Consumer Privacy Act ("CCPA"), and the China Cybersecurity Law. GDPR, which applies to the collection, use, retention, security, processing, and

transfer of personally identifiable information of residents of European Union ("EU") countries, mandates new compliance obligations, and imposes significant fines and sanctions for violations. CCPA requires companies to provide new data disclosure, access, deletion and opt-out rights to consumers in California. Implementing and complying with these laws and regulations may be more costly or take longer than we anticipate, or could otherwise affect our business operations. Such breaches, cyber incidents and disruptions, or failure to comply with laws and regulations related to information security or privacy, could result in legal claims or proceedings against us by governmental entities or individuals, significant fines, penalties or judgements, disruption of our operations, remediation requirements, changes to our business practices, and damage to our reputation, which could adversely affect our business, financial condition or results of operations.

Complications with the design or implementation of our new enterprise resource planning ("ERP") system could adversely impact our business and operations.

We are in the process of a complex, multi-year implementation of a new ERP system necessary due to the finite life of the existing operating system. The ERP system implementation requires the integration of the new ERP system with multiple new and existing information systems and business processes in order to maintain the accuracy of our books and records and to provide our management team with information important to the operation of our business. Such an initiative is a major financial undertaking and will require substantial time and attention of management and key employees. The implementation of the ERP system may prove to be more difficult, costly, or time consuming than expected, and it is possible that the system will not yield the benefits anticipated. Failure to successfully design and implement the new ERP system as planned could harm our business, financial condition, and operating results. Additionally, if we do not effectively implement the ERP system as planned or the ERP system does not operate as intended, the effectiveness of our internal control over financial reporting could be negatively affected.

Supply Chain Risks

Disruptions within our supply chain could negatively impact our production, financial condition and results of operations.

We could be adversely affected by disruptions within our supply chain and transportation network. Our products are transported by truck, rail, barge or ship by third-party providers. The costs of transporting our products could be negatively affected by factors outside of our control, including rail service interruptions or rate increases, extreme weather events, tariffs, rising fuel costs and capacity constraints. Significant delays or increased costs affecting these transportation methods could materially affect our financial condition and results of operations. Disruptions at our suppliers could lead to short term or longer rises in raw material or energy costs and/or reduced availability of materials or energy, potentially affecting our financial condition and results of operations. For example, Solvay is our primary provider of hydrogen peroxide to our Warrington, UK Performance Chemicals facility, which is co-located with the Solvay Warrington, UK chemical plant ("Solvay Plant"). Disruptions at the Solvay Plant impacting Solvay's ability to supply hydrogen peroxide could adversely affect our financial condition and results of operations. See also "—General Business and Economic Risks—Our engineered polymers product line may be adversely affected by the UK's withdrawal from the European Union" and "Operational and Market Risks - We are dependent upon third parties for the provision of certain critical operating services at several of our facilities."

Our Performance Chemicals segment is highly dependent on CTO, which is limited in supply; lack of access to sufficient CTO would impact our ability to produce CTO-based products.

The availability of CTO is essential to the Company's Performance Chemicals segment. Availability of CTO is directly linked to the production output of kraft mills using pine as their source of pulp, which is the predominant fiber source for packaging grades of paper as well as fluff pulp for personal care products. As a result, there is a finite global supply of CTO-with global demand for softwood pulp driving the global supply of CTO, rather than demand for CTO itself. Most of the CTO made available for sale by its producers in North America is covered by long-term supply agreements, further constraining availability.

In 2016, we entered into a long-term supply agreement with WestRock pursuant to which we purchase all of the BLSS and CTO output from WestRock's existing (at the time of separation) kraft mills, subject to certain exceptions. This agreement includes pricing terms based on market prices.

Pricing for the products in our agreement with WestRock is based on the prevailing market prices of products at the time of purchase. The pricing formulas are subject to certain pricing floors as set forth in the agreement with WestRock. Given

the take-or-pay requirements of the agreement with WestRock, in adverse market conditions we could be required to purchase BLSS and CTO from WestRock at prices where our results of operations could be materially and adversely affected.

In 2018, we entered into a 20-year CTO supply agreement with Georgia-Pacific, pursuant to which we purchase the lesser of 125,000 tons of CTO and the aggregate output of CTO produced and originating at certain of Georgia-Pacific's paper mills.

Pricing for the CTO in our agreement with Georgia-Pacific is a market-based price, subject to ongoing adjustments. Given the take-or-pay requirements of the agreement with Georgia-Pacific, in adverse market conditions we could be required to purchase CTO from Georgia-Pacific at prices where our results of operations could be materially and adversely affected.

If any of our suppliers (including WestRock or Georgia-Pacific) fail to meet their respective obligations under our supply agreements or we are otherwise unable to procure an adequate supply of CTO, we would be unable to maintain our current level of production and our results of operations would be materially and adversely affected.

Beginning in 2025, either party to the WestRock agreement may provide a notice to the other party terminating the WestRock agreement five years from the date of such notice. Beginning one year after such notice, the quantity of products provided by WestRock under the agreement will be gradually reduced over a four-year period based on the schedule set forth in the agreement. In addition, from 2022 until 2025, either party may provide notice to remove a kraft mill as a supply source. The two largest kraft mills under the WestRock agreement currently supply approximately 17 to 19 percent and 18 to 20 percent, respectively, of the total amount of products supplied under our agreement with WestRock. If WestRock exercises its rights to terminate the agreement or remove a kraft mill as a supply source, and we are unable to arrange for a substitute supply of CTO, we would be unable to continue to produce the same quantity of products and our results of operations could be materially and adversely affected.

There are other pressures on the availability of CTO. Some pulp or paper mills may choose to consume their production of CTO to meet their energy needs or reduce their carbon footprint rather than sell the CTO to third parties. Also, as described below, there are regulatory pressures that may incentivize suppliers of CTO to sell CTO into alternative fuel markets rather than to historical end users such as Ingevity. Furthermore, weather conditions have in the past and may in the future affect the availability and quality of pine trees used in the kraft pulping process and therefore the availability of CTO meeting Ingevity's quality standards. For example, the combined impact of Hurricane Katrina in August 2005 and Hurricane Rita in September 2005 caused significant damage to forests throughout the southern U.S. This significantly affected the availability and quality of the supply of CTO during late 2005 and into 2006. In addition, Hurricanes Florence and Michael in 2018 disrupted vendor operations and reduced availability of CTO supply well into 2019.

The European Union's Directive 2009/28 on the promotion of the use of energy from renewable resources ("Renewable Energy Directive" or "RED"), which will be repealed on July 1, 2021 (the "RED"), and the new Directive replacing Directive 2009/28, which has to be implemented by Member States by June 30, 2021 (the "RED II")) and similar legislation in the U.S. and elsewhere may incentivize the use of CTO as a feedstock for production of alternative fuels.

In December 2008, the EU adopted the Renewable Energy Directive, which established a 20 percent EU-wide target for energy consumed from renewable sources relative to the EU's gross final consumption of energy, as well as a 10 percent target for energy consumed from renewable sources in the transport section. In order to reach these targets, the RED established mandatory targets for each Member State and required each Member State to adopt a national renewable energy action plan setting forth measures to achieve its national targets. The RED also established sustainability criteria for biofuels, which must be satisfied in order for the consumption of a fuel to count toward a Member State's national targets. CTO-based biofuel currently satisfies the RED's biofuel sustainability criteria.

In spring 2015, the EU adopted amendments to the Renewable Energy Directive. RED now expressly lists CTO as a residue-type feedstock whose use in biofuel would make that biofuel eligible for double counting towards national targets of the Member States, and at least two Member States additionally have or plan fiscal incentives for the domestic marketing of CTO-based and other qualifying biofuels. In 2018, the EU adopted RED II (effective 2021-2030) which increased the target for energy consumed from renewable sources in the transport section to 14 percent by 2030. Advanced biofuels must comprise 0.2% of the transport sector by 2022 and 3.5% by 2030. CTO remains an expressly listed feedstock for advanced biofuels and may be doubled counted toward these goals. RED II requires Member States shall prepare plans to set national targets and growth trajectories for their contributions to the EU-wide target. The RED II now includes language to consider the potential for undue market distortion for the raw materials used to meet these targets.

In addition to these developments in the European Union, various pieces of legislation regarding the use of alternative fuels have been introduced in the United States at both the Federal and State level. Currently, none of the legislation mandates or provides incentives for the use of CTO as a transportation fuel. Some regional cap and trade programs may incentivize the use of CTO in stationary sources. Future legislation in the U.S. and elsewhere may promote the use of CTO as a feedstock for production of alternative fuels.

Because the supply of CTO is inherently constrained by the volume of kraft pulp processing, any diversion of CTO for production of alternative fuels would reduce the available supply of CTO as the principal raw material of the pine chemicals industry. As described above, the Company is highly dependent on CTO as an essential raw material, and if the Company is unable to procure an adequate supply of CTO due to competing new uses such as for biofuel production, the Company's results of operations would be materially and adversely affected.

Pricing for CTO is subject to particular pricing pressures by reason of limited supply and competing demands for end use, and we may be limited in our ability to pass on increased costs to our customers.

Pricing for CTO (which accounted for approximately 11 percent of all of our cost of sales and 37 percent of our raw materials purchases for 2020) is subject to particular pricing pressures by reason of the limited supply elasticity of the product and competing demands for its use, all of which drive pressure on price:

- CTO is a product of the kraft pulping process, and the global supply of CTO is inherently constrained by the volume of kraft pulping processing;
- CTO can be burned as alternative fuels, either in support of the originating pulp mill operations, by energy companies or biofuel companies; and
- Regulations or other incentives that mandate or encourage the consumption of CTO for use in biofuels or alternatives.

We may not have the ability to pass through any increases in our cost of CTO to our customers in the form of price increases or other adjustments, with a resulting material adverse effect on our results of operations. Additionally, we may be placed at a competitive disadvantage relative to our competitors who rely on different primary raw materials or who have more favorable terms with their suppliers.

We are also dependent on other raw materials, and these are also subject to pricing pressures; lack of access to these raw materials and inability to pass on price increases could adversely affect our financial condition and results of operations.

The Company is dependent on other raw materials, including, but not limited to, hardwood sawdust, phosphoric acid, ethylene amines, black liquor, nonylphenol, hydrogen peroxide, cyclohexanone, and pentaerythritol. Raw material costs are a significant operating expense of the Company. The cost of raw materials can be volatile and subject to increases as a result of, among other things, changing economic conditions, political or policy considerations, supply and demand levels, instability in energy producing nations, and natural events such as extreme weather events or even insect infestations. Any interruption in the supply of the raw materials on which we depend, and any increases in the cost of raw materials that we are not able to pass on to customers in the form of price increases or other adjustments, may materially impact our financial condition and results of operations.

International Operations Risks

We are exposed to the risks inherent in international sales and operations.

In 2020, sales to customers outside of the U.S. made up approximately 50 percent of our total sales, and we sell our products to customers in approximately 75 countries. We have exposure to risks of operating in many foreign countries, including:

- fluctuations in foreign currency exchange rates, including the euro, pound sterling, Japanese yen and Chinese renminbi:
- restrictions on, or difficulties and costs associated with, the repatriation of cash from foreign countries to the U.S.;

- difficulties and costs associated with complying with a wide variety of complex laws, treaties and regulations;
- unexpected changes in political or regulatory environments;
- earnings and cash flows that may be subject to tax withholding requirements or the imposition of tariffs, exchange controls or other restrictions;
- political and economic instability;
- unforeseen public health crises, such as pandemic and epidemic diseases (including the COVID-19 pandemic);
- import and export restrictions, tariffs, and other trade barriers or retaliatory actions;
- difficulties in maintaining overseas subsidiaries and international operations;
- difficulties in obtaining approval for significant transactions;
- government limitations on foreign ownership;
- government takeover or nationalization of business; and
- government mandated price controls.

Any one or more of the above factors could adversely affect our international operations and could significantly affect our financial condition and results of operations. We have also expanded our participation in certain markets. As our international operations and activities expand, we inevitably have greater exposure to the risks of operating in many foreign countries.

Our reported results could be adversely affected by currency exchange rates and currency devaluation could impair our competitiveness.

Due to our international operations, we transact in many foreign currencies, including but not limited to the euro, pound sterling, Japanese yen and Chinese renminbi. As a result, we are subject to the effects of changes in foreign currency exchange rates. During times of a strengthening U.S. dollar, our reported net revenues and operating income will be reduced because the local currency will be translated into fewer U.S. dollars. During periods of local economic crisis, local currencies may be devalued significantly against the U.S. dollar, potentially reducing our margin. Ingevity may enter forward exchange contracts and other financial contracts in an attempt to mitigate the impact of currency rate fluctuations. However, there can be no assurance that such actions will eliminate any adverse impact from variation in currency rates. Also, actions to recover margins may result in lower volume and a weaker competitive position, which may have an adverse effect on our profitability.

Our operations outside the U.S. require us to comply with a number of U.S. and foreign regulations, violations of which could have a material adverse effect on our financial condition and results of operations.

Our operations outside the U.S. require us to comply with a number of U.S. and international regulations. For example, our operations in countries outside the U.S. are subject to the U.S. Foreign Corrupt Practices Act ("FCPA"), which prohibits U.S. companies and their agents and employees from providing anything of value to a foreign official for the purposes of influencing any act or decision of these individuals in their official capacity to help obtain or retain business, direct business to any person or corporate entity, or obtain any unfair advantage. Additionally, certain of our operations are subject to the UK Bribery Act, which prohibits public and commercial bribery. Our activities may create the risk of unauthorized payments or offers of payments by our employees, agents or joint venture partners that could be in violation of anti-corruption laws, even though these parties are not subject to our control. We have internal control policies and procedures and training and compliance programs for our employees and agents with respect to the FCPA, UK Bribery Act and other applicable anti-corruption laws. However, we cannot assure that our policies, procedures and programs always will protect us from reckless or criminal acts committed by our employees or agents. Allegations of violations of applicable anti-corruption laws may result in internal, independent or government investigations. Violations of anti-corruption laws may result in severe criminal or civil sanctions, and we may be subject to other liabilities, which could have a material adverse effect on our financial condition and results of operations.

In addition, the shipment of goods, services and technology across international borders subjects us to extensive trade laws and regulations. Our import activities are governed by the unique customs laws and regulations in each of the countries where we operate. Moreover, many countries, including the U.S., control the export and re-export of certain goods, services and technology and impose related export record-keeping and reporting obligations. Governments may also impose economic sanctions against certain countries, persons and entities that may restrict or prohibit transactions involving such countries, persons and entities, which may limit or prevent our conduct of business in certain jurisdictions. We are also required to comply with similar laws and regulations in other countries where we do business, with the same associated risks.

The laws and regulations concerning import activity, export record-keeping and reporting, export control and economic sanctions are complex and constantly changing. These laws and regulations can cause delays in shipments and unscheduled operational downtime. Moreover, any failure to comply with applicable legal and regulatory trading obligations could result in criminal and civil penalties and sanctions, such as fines, imprisonment, debarment from governmental contracts, seizure of shipments and loss of import and export privileges. In addition, investigations by governmental authorities as well as legal, social, economic and political issues in these countries could have a material adverse effect on our business, results of operations and financial condition. We are also subject to the risks that our employees, joint venture partners and agents outside of the U.S. may fail to comply with other applicable laws.

Changes in trade policy, including the imposition of tariffs and the resulting consequences, could have a material adverse effect on our financial condition and results of operations.

The U.S. has indicated its intent to renegotiate, or potentially terminate, certain existing bilateral or multi-lateral trade agreements. Additionally, the UK and the EU have negotiated the EU-UK Trade and Cooperation Agreement and are in the process of implementing. Furthermore, the U.S. has recently imposed tariffs on certain U.S. imports and is considering the imposition of tariffs on other U.S. imports. China and other countries have responded with retaliatory tariffs on certain U.S. exports and additional tariffs could be imposed. The resulting trade war could have a significant adverse effect on world trade and the world economy. To the extent that changes in trade policies, trade tariffs and other restrictions imposed by the United States, EU, China and other countries increase the price of, or limit the amount of goods imported, the costs of our raw materials and products may be adversely affected and the demand from our customers for products may be diminished, which could adversely affect our revenues and profitability. We cannot predict future trade policy or the terms of any renegotiated trade agreements or their impact on our business. The adoption and expansion of trade restrictions, the occurrence of a trade war, or other governmental action related to tariffs or trade agreements or policies has the potential to adversely impact demand for our products, our costs, our customers, our suppliers, and the global economy, which in turn could adversely impact our business, financial condition and results of operations.

Our engineered polymers product line may be adversely affected by the United Kingdom's withdrawal from the European Union.

Our engineered polymers product line is manufactured in Warrington, UK. On January 31, 2020, the UK ceased to be a member of the EU, an event generally referred to as "Brexit". Effective January 1, 2021, the EU and the UK form two separate markets and two distinct regulatory and legal spaces, creating new barriers to trade in goods and services and to cross-border mobility and exchanges.

Even though the UK reached an agreement with the EU on the terms of their future cooperation, as reflected in the EU-UK Trade and Cooperation Agreement ("TCA") and related documents, it is unclear how the TCA will actually be implemented, how it will affect the nature of the UK's relationship with the EU and how it will impact our business. The scope and implementation of the UK's arrangements with other countries is also unclear. This uncertainty could continue to affect UK, EU and worldwide economic or market conditions and could contribute to instability in global financial markets and the value of the pound sterling or other currencies, including the Euro.

Additionally, the regulatory frameworks of the UK and the EU may subsequently change and potentially divergent laws and regulations may develop, including those relating to UK REACH and EU REACH. This may have adverse practical and/or operational implications for our engineered polymers product line, including potential disruption to supply chains, additional compliance and operational costs, required product modifications and necessary operational changes.

The trade uncertainties stemming from Brexit and the impact of possible regulatory changes may adversely affect our engineered polymers operations, results of operations and financial condition.

Acquisition Risks

The Caprolactone Acquisition may expose us to unknown liabilities.

On February 13, 2019, we acquired all the shares of Perstorp UK Ltd. and, as a result, we are generally subject to all of its liabilities, subject to a warranty and indemnity insurance policy and remedies in the Caprolactone Agreement. We may learn additional information about the Caprolactone Business that adversely affects us, such as unknown liabilities, including liabilities under environmental or tax laws, or issues that could affect our ability to comply with other applicable laws. If previously unknown liabilities or other obligations of the Caprolactone Business emerge in the future, and available remedies are not sufficient, our business could be materially affected.

The inability to make or effectively integrate future acquisitions may affect our results.

As part of our growth strategy, we may pursue acquisitions of complementary businesses and product lines or invest in joint ventures. The ability to grow through acquisitions or other investments depends upon our ability to identify, negotiate, complete and integrate suitable acquisitions or joint venture arrangements. If we fail to successfully integrate acquisitions into our existing business, our financial condition and results of operations could be adversely affected.

Legal and Regulatory Risks

From time to time we may be engaged in legal actions associated with our intellectual property rights and automotive carbon business, including associated potential counterclaims; if we are unsuccessful, these could potentially result in an adverse effect on our financial condition and results of operations.

Intellectual property rights, including patents, trade secrets, confidential information, trademarks, trade names and trade dress, are important to our business. See "Intellectual Property" included within Part I. Item 1 of this Form 10-K for more information on our "canister bleed emissions" patent. We will endeavor to protect our intellectual property rights in key jurisdictions in which our products are produced or used, in jurisdictions into which our products are imported, and in jurisdictions where our competitors have significant manufacturing capabilities. Our success will depend to a significant degree upon our ability to protect and preserve our intellectual property rights. However, we may be unable to obtain or maintain protection for our intellectual property in key jurisdictions. Although we own and have applied for numerous patents and trademarks throughout the world, we may have to rely on judicial enforcement of our patents and other proprietary rights. Our patents and other intellectual property rights may be challenged, invalidated, circumvented and rendered unenforceable or otherwise compromised. We are currently involved in several legal actions relative to intellectual property associated with our "canister bleed emissions" patent. These have resulted in counterclaims against us, including claims alleging antitrust and interference with business relations, which we are vigorously defending. These and other legal actions to protect, defend or enforce our intellectual property rights could result in significant costs and diversion of our resources and our management's attention, and we may not prevail in any such suits or proceedings. In November 2020, we received an adverse decision finding some, but not all, of the claims in our "canister bleed emissions" patent invalid in our infringement action against BASF Corp in the U.S. District Court for the District of Delaware. We intend to challenge the decision, however in the meantime we anticipate the decision having limited impact on our commercial operations or financial results through patent expiration in March 2022. A failure to protect, defend or enforce our intellectual property could have an adverse effect on our financial condition and results of operations. Similarly, third parties may assert claims against us and our customers and distributors alleging our products infringe upon third-party intellectual property rights.

We also rely materially upon unpatented proprietary technology, know-how and other trade secrets to maintain our competitive position. While we maintain policies to enter into confidentiality agreements with our employees and third parties to protect our proprietary expertise and other trade secrets, these agreements may not be enforceable or, even if legally enforceable, we may not have adequate remedies for breaches of such agreements. We also may not be able to readily detect breaches of such agreements. For instance, we manufacture some of our products in China where we may be at a greater risk of a third party misappropriating our intellectual property despite the foregoing policies, procedures and agreements. The failure of our patents or confidentiality agreements to protect our proprietary technology, know-how or trade secrets could result in significantly lower revenues, reduced profit margins or loss of market share.

We face competition from infringing intellectual property activity.

The Company is currently involved in several legal actions relative to intellectual property associated with our "canister bleed emissions" patent. These infringing activities also represent a competitive threat. The Company is vigorously addressing infringing activity through legal actions and other available means. While the Company believes its legal action claims are meritorious, there can be no assurances that the Company will prevail in such actions.

Our business involves hazards associated with chemical manufacturing, storage, transportation and disposal.

There are hazards associated with the chemicals we manufacture and the related storage and transportation of our raw materials, including common solvents, such as toluene and methanol, and reactive chemicals, such as acrylic acid, all of which fall under the OSHA Process Safety Management Code. These hazards could lead to an interruption or suspension of operations and have an adverse effect on the productivity and profitability of a particular manufacturing facility or on us as a whole. While we endeavor to provide adequate protection for the safe handling of these materials, issues could be created by various events, including natural disasters, severe weather events, acts of sabotage and performance by third parties, and as a result we could face the following potential hazards: piping and storage tank leaks and ruptures; mechanical failure; employee exposure to hazardous substances; and chemical spills and other discharges or releases of toxic or hazardous substances or gases.

These hazards may cause personal injury and loss of life, damage to property and contamination of the environment, which could lead to government fines, work stoppage injunctions, lawsuits by injured persons, damage to our public reputation and brand and diminished product acceptance. If such actions are determined adversely to us or there is an associated economic impact to our business, we may have inadequate insurance or cash flow to offset any associated costs. Such outcomes could adversely affect our financial condition and results of operations.

Regulation of exposure to certain process chemicals could require expenditures or changes to our product formulations.

Certain regulations applicable to our operations, including the Occupational Safety and Health Act and the Toxic Substances Control Act in the U.S. and the Registration, Evaluation and Authorization of Chemicals, or REACH, directive in Europe, the UK and other countries, prescribe limits restricting exposure to a number of chemicals used in our operations, including certain forms of formaldehyde, a raw material used in the manufacture of phenolic modified rosin-based ink resins and some lignin-based dispersants. Future studies on the health effects of chemicals used in our operations, including alkylphenols, such as bisphenol A, which are used in our TOR-based ink resins, may result in additional regulation or new requirements in the U.S., Europe and elsewhere, which might further restrict or prohibit the use of, and exposure to, these chemicals. Additional regulation of or requirements for these or other chemicals could require us to change our operations, and these changes could affect the quality or types of products we manufacture and/or materially increase our costs.

The Company's operations are subject to a wide range of general and industry-specific environmental laws and regulations.

The Company's operations are subject to a wide range of general and industry-specific environmental laws and regulations, including, for example, related to bisphenol A, formaldehyde and air emissions. Changes in environmental laws and regulations, or their application, could subject the Company to significant additional capital expenditures and operating expenses in future years. Additionally, changes in the regulation of greenhouse gases, as well as future climate change laws and regulations, depending on their nature and scope, could subject our operations to significant additional costs or limits on operations. Our manufacturing facilities use energy, including electricity and natural gas and some of our plants emit amounts of greenhouse gas that may in the future be affected by legislative and regulatory efforts to limit greenhouse gas emissions. Potential consequences could include increased energy, transportation and raw material costs and may require the Company to make additional investments in facilities and equipment or limit our ability to grow.

However, any such changes are uncertain and, therefore, it is not possible for the Company to predict with certainty the amount of additional capital expenditures or operating expenses that could be necessary for compliance with respect to any such changes. Even without such regulation, increased public awareness and adverse publicity about potential impacts on climate change emanating from us or our industry could have a negative impact on us.

Financial and Economic Risks

We may be adversely affected by general global economic and financial conditions beyond our control.

Our businesses may be affected by a number of factors that are beyond our control such as general economic and business conditions, changes in tax laws or tax rates and conditions in the financial services markets including counterparty risk, insurance carrier risk, rising interest rates, inflation, deflation, fluctuations in the value of local currency versus the U.S. dollar or the impact of a stronger U.S. dollar which may negatively impact our ability to compete. Macro-economic challenges, including conditions in financial and capital markets and levels of unemployment, and the ability of the U.S. and other countries to deal with their rising debt levels may continue to put pressure on the economy or lead to changes in tax laws or tax rates. There can be no assurance that changes in tax laws or tax rates will not have a material impact on our future cash taxes, effective tax rate or deferred tax assets and liabilities. Adverse developments in global or regional economies could drive an increase or decrease in the demand for our products that could increase or decrease our revenues, increase or decrease our manufacturing costs and ultimately increase or decrease our results of operations, financial condition and cash flows. As a result of negative changes in the economy, customers, vendors or counterparties may experience significant cash flow problems or cause consumers of our products to postpone or refrain from spending in response to adverse economic events or conditions. If customers are not successful in generating sufficient revenue or cash flows or are precluded from securing financing, they may not be able to pay or may delay payment of accounts receivable that are owed to us or we may experience lower sales volumes. Our financial condition and results of operations could be materially and adversely affected by any of the foregoing.

Challenges in the commercial and credit environment may materially adversely affect Ingevity's future access to capital.

We have at times relied on various forms of credit to satisfy working capital needs. Ingevity's ability to issue debt or enter into other financing arrangements on acceptable terms could be materially adversely affected if there is a material decline in the demand for Ingevity's products or in the solvency of its customers or suppliers or if other significantly unfavorable changes in economic conditions occur. Volatility in the world financial markets could increase borrowing costs or affect Ingevity's ability to gain access to the capital markets, which could have a material adverse effect on Ingevity's competitive position, business, financial condition, results of operations and cash flows.

Our current level of debt could adversely affect our financial health and prevent us from fulfilling our debt obligations.

Our debt requires significant interest and principal payments. Our ability to make scheduled payments on or to refinance our debt obligations and to fund working capital, planned capital expenditures and expansion efforts and any strategic alliances or acquisitions we may make in the future depends on our ability to generate cash in the future and our financial condition and operating performance, which are subject to prevailing economic and competitive conditions and to certain financial, business, regulatory and other factors beyond our control. There can be no assurance that we will maintain a level of cash flows from operating activities sufficient to permit us to pay the principal, premium, if any, and interest on our debt.

If our cash flows and capital resources are insufficient to fund our debt service obligations, we may be forced to reduce or delay investments and capital expenditures, or to sell assets, seek additional capital or restructure or refinance our debt, including the notes. These alternative measures may not be successful and may not permit us to meet our scheduled debt service obligations. If our operating results and available cash are insufficient to meet our debt service obligations, we could face substantial liquidity problems and might be required to dispose of material assets or operations to meet our debt service and other obligations. We may not be able to consummate those dispositions or to obtain the proceeds sought from them, and these proceeds may not be adequate to meet any debt service obligations then due. Further, we may need to refinance all or a portion of our debt on or before maturity, and there can be no assurances we will be able to refinance any of our debt on commercially reasonable terms or at all. Any inability to generate sufficient cash flow or refinance our indebtedness on favorable terms could have a material adverse effect on our business, results of operations, and financial condition.

There could be significant liability if the Separation were determined to be a taxable transaction.

In connection with the Separation, our former parent received an opinion from outside tax counsel to the effect that the requirements for tax-free treatment under Section 355 of the Code would be satisfied. The opinion relied on certain facts, assumptions, representations and undertakings from our former parent and us regarding the past and future conduct of the companies' respective businesses and other matters. If any of these facts, assumptions, representations or undertakings were incorrect or not satisfied, we and our stockholders may not be able to rely on the opinion of tax counsel and could be subject to significant tax liabilities.

Notwithstanding the opinion of tax counsel, the IRS could determine upon audit that the Separation is taxable if it determines that any of these facts, assumptions, representations or undertakings were incorrect or violated or if it disagrees with the conclusions in the opinion, or for other reasons, including as a result of certain significant changes in the share ownership of our company or our former parent after the Separation. If the Separation were determined to be taxable for U.S. federal income tax purposes, our former parent and its stockholders that are subject to U.S. federal income tax could incur significant U.S. federal income tax liabilities, and we could incur significant liabilities.

We are subject to continuing contingent tax-related liabilities of WestRock.

Under the U.S. Internal Revenue Code of 1986, as amended (the "Code"), each corporation that was a member of WestRock's consolidated tax reporting group during any taxable period or portion of any taxable period ending on or before the effective time of the distribution is severally liable for the U.S. federal income tax liability of the entire consolidated tax reporting group for such taxable period. In connection with the Separation, we entered into the tax matters agreement with WestRock (the "Tax Matters Agreement") that allocates the responsibility for prior period taxes of WestRock's consolidated tax reporting group between Ingevity and WestRock. If WestRock were unable to pay any prior period taxes for which it is responsible, however, we could be required to pay the entire amount of such taxes, and such amounts could be significant. The Tax Matters Agreement generally gives WestRock discretion to handle consolidated tax returns and audits for pre-distribution periods in a manner which may be unfavorable to us and which may result in additional tax costs to us.

ITEM 1B. UNRESOLVED STAFF COMMENTS

None.

ITEM 2. PROPERTIES

We are headquartered in North Charleston, South Carolina and operate manufacturing facilities in the U.S., United Kingdom, and People's Republic of China and warehouse and distribution facilities globally. The following locations represent the principal properties of Ingevity. We believe these facilities are adequate and suitable for our current operations, and that the production capacity of our facilities is sufficient to meet current demand. In the case of the properties identified as "Leased", we nevertheless own the manufacturing assets themselves.

	Own / Lease	Functional Use
North Charleston, South Carolina	Own / Lease (1)	Corporate Headquarters; Application Labs; Performance Chemicals: Manufacturing
Covington, Virginia	Lease	Performance Materials: Manufacturing
Crossett, Arkansas	Lease	Performance Chemicals: Manufacturing
DeRidder, Louisiana	Own	Performance Chemicals: Manufacturing
Waynesboro, Georgia	Own ⁽²⁾	Performance Materials: Manufacturing
Shanghai, People's Republic of China	Lease	Regional Headquarters; Application Lab
Wickliffe, Kentucky	Lease	Performance Materials: Manufacturing
Changshu, People's Republic of China	Lease	Performance Materials: Manufacturing
Warrington, United Kingdom	Lease	Performance Chemicals: Manufacturing, Application Lab
Zhuhai, People's Republic of China	Lease	Performance Materials: Manufacturing, Application Lab

⁽¹⁾ Portions of the manufacturing operations are on leased land and our corporate headquarters building is leased.

ITEM 3. LEGAL PROCEEDINGS

We are from time to time, involved in routine litigation incidental to our operations. None of the litigation in which we are currently involved, individually or in the aggregate, is material to our combined financial condition or results of operations nor are we aware of any material pending or contemplated proceedings.

ITEM 4. MINE SAFETY DISCLOSURES

Not applicable.

⁽²⁾ Certain manufacturing assets are subject to a finance lease with the Development Authority of Burke County (the county in which Waynesboro, Georgia is located).

INFORMATION ABOUT OUR EXECUTIVE OFFICERS

The executive officers of Ingevity Corporation, the offices they currently hold, their business experience over the past five years and their ages are as follows:

Name	Age (1)	Present Position and Business Experience
John C. Fortson	53	President and Chief Executive Officer and Interim Chief Financial Officer & Treasurer (2020-present); Executive Vice President, Chief Financial Officer & Treasurer (2015-2020); Vice President, Chief Financial Officer and Treasurer of AAR Corporation (2013-2015); Managing Director in the Investment Banking Department of Bank of America Merrill Lynch (2007-2013)
Michael P. Smith	60	Executive Vice President & President of Performance Chemicals, Strategy and Business Development (2017-present); Senior Vice President Strategy and Business Development (2016-2017), Vice President of Health and Nutrition at FMC Corporation (2013-2015); Division General Manager of BioPolymer at FMC Corporation (2006-2013)
S. Edward Woodcock	55	Executive Vice President & President of Performance Materials (2015-present); Vice President of MeadWestvaco's Carbon Technologies business (2010-2015)
Stacy L. Cozad	50	Executive Vice President, General Counsel & Secretary (2021-present); Senior Vice President, General Counsel, Chief Compliance Officer and Corporate Secretary at Spirit AeroSystems Holdings, Inc. (2017-2021); Senior Vice President, General Counsel and Corporate Secretary at Spirit AeroSystems Holdings, Inc. (2016-2017); Associate General Counsel – Litigation at Southwest Airlines Co. (2009-2015)

⁽¹⁾ As of December 31, 2020.

All officers are elected to hold office for one year or until their successors are elected and qualified. No family relationships exist among any of our executive officers or directors, and there are no arrangements or understandings between any of the above-listed officers and any other person pursuant to which they serve as an officer.

PART II

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

Market for Registrant's Common Equity and Related Stockholder Matters

Ingevity's common stock (\$0.01 par value) is listed on the New York Stock Exchange, Inc. ("NYSE") under the symbol "NGVT." There were approximately 5,100 record holders of our common stock as of February 15, 2021.

Unregistered Sales of Equity Securities

Not Applicable.

Issuer Purchases of Equity Securities

The following table summarizes information with respect to the purchase of our common stock during the three months ended December 31, 2020.

Period	Total Number of Shares Purchased	Average Price Paid Per Share		Total Number of Shares Purchased as Part of Publicly Announced Plans or Programs	Approximate Dollar Value of Shares that May Yet be Purchased Under the Plans or Programs ⁽¹⁾		
October 1-31, 2020		\$		_	\$	467,615,810	
November 1-30, 2020	145,786	\$	68.49	145,786	\$	457,630,510	
December 1-31, 2020	637,656	\$	71.53	637,656	\$	412,017,195	
Total	783,442			783,442			

⁽¹⁾ On February 28, 2020, our Board of Directors authorized the repurchase of up to \$500.0 million of our common stock. We currently do not have any specific timetable or price targets for repurchasing shares, and may suspend or terminate the program at any time. Shares may be purchased through open market or privately negotiated transactions at the discretion of management based on its evaluation of market prevailing conditions and other factors. Shares may be purchased through open market or privately negotiated transactions at the discretion of management based on its evaluation of market prevailing conditions and other factors.

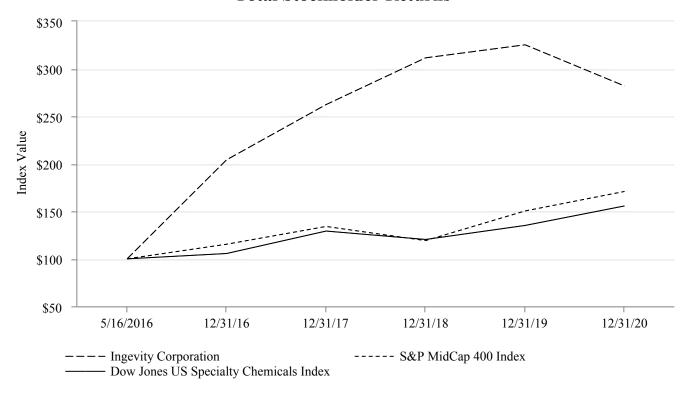
Stock Performance Graph

The following table and graph present the cumulative total stockholder return for Ingevity's common stock compared with the Standard & Poor's (S&P) MidCap 400 Index and the Dow Jones (DJ) U.S. Specialty Chemicals Index since Ingevity's stock began "regular-way" trading on the NYSE on May 16, 2016.

The graph assumes the investment of \$100 in each of Ingevity's common stock, the S&P MidCap 400 Index, and DJ U.S. Specialty Chemicals Index on May 16, 2016, and that all dividends, if any, were reinvested.

		December 31,										
	May 16, 2016		2016		2017		2018		2019			2020
Ingevity Corporation	\$	100.00	\$	204.24	\$	262.36	\$	311.58	\$	325.32	\$	281.94
S&P MidCap 400 Index		100.00		115.37		134.09		119.22		150.41		170.94
Dow Jones U.S. Specialty Chemicals Index	\$	100.00	\$	105.60	\$	129.24	\$	120.40	\$	135.15	\$	155.70

Total Stockholder Returns



The graph and related information set forth above are not deemed to be "filed" with the SEC for purposes of Section 18 of the Exchange Act or incorporated by reference into any future filing made by us with the SEC, except to the extent that we specifically incorporate it by reference into any such filing. The stock price performance included in the graph above is not necessarily indicative of future stock performance.

ITEM 6. SELECTED FINANCIAL DATA

Our consolidated balance sheets as of December 31, 2020, 2019, 2018, 2017, and 2016, respectively, and our consolidated statements of operations, comprehensive income (loss), and cash flows for the years ended December 31, 2020, 2019, 2018, and 2017, respectively, consist of the consolidated balances of Ingevity as prepared on a stand-alone basis. Our consolidated statements of operations, comprehensive income (loss), and cash flows for the year ended December 31, 2016 have been prepared on a "carve out" basis for the periods and dates prior to the Separation. The selected consolidated financial data should be read in conjunction with our consolidated financial statements included within Part II. Item 8 of this Form 10-K.

	Years Ended December 31,									
In millions, except per share and share data		2020		2019		2018		2017		2016
Statements of Operations Data:										
Net sales	\$	1,216.1	\$	1,292.9	\$	1,133.6	\$	972.4	\$	908.3
Gross profit		465.5		482.0		416.8		329.0		274.4
Income (loss) before income taxes		235.1		227.9		221.8		174.8		87.0
Net income (loss) attributable to Ingevity stockholders		181.4		183.7		169.1		126.5		35.2
Per Share Data attributable to Ingevity stockholders (1)										
Basic earnings (loss) per share	\$	4.39	\$	4.39	\$	4.02	\$	3.00	\$	0.83
Diluted earnings (loss) per share	\$	4.37	\$	4.35	\$	3.97	\$	2.97	\$	0.83
Balance Sheet Data (at period end):										
Working capital (2)	\$	405.3	\$	247.7	\$	239.4	\$	215.5	\$	158.3
Property, plant, and equipment, net		703.6		664.7		523.8		438.5		422.8
Total assets		2,334.5		2,141.7		1,315.2		929.6		832.8
Long-term debt including finance lease obligations		1,267.4		1,228.4		741.2		444.0		481.3
Total equity		642.1		530.8		338.7		277.9		134.6
Other Data:										
Capital expenditures	\$	82.1	\$	114.8	\$	93.9	\$	52.6	\$	56.7
Depreciation and amortization expense		100.2		85.0		57.0		40.4		38.8
Weighted average common stock outstanding (in thousands) (1):										
Basic shares		41,330		41,801		42,037		42,130		42,108
Diluted shares		41,547		42,200		42,601		42,529		42,271

⁽¹⁾ Basic and diluted earnings (loss) per share for the year ended December 31, 2016 is calculated using the weighted average number of common shares outstanding for the period beginning after May 15, 2016, the date of Separation.

⁽²⁾ Defined as current assets less current liabilities.

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

Introduction

Management's discussion and analysis of Ingevity's financial condition and results of operations ("MD&A") should be read in conjunction with Item-8. Financial Statements and Supplementary Data. Investors are cautioned that the forward-looking statements contained in this section and other parts of this Annual Report on Form 10-K involve both risk and uncertainty. Several important factors could cause actual results to differ materially from those anticipated by these statements. Many of these statements are macroeconomic in nature and are, therefore, beyond the control of management. See "Cautionary Statements about Forward-Looking Statements" at the beginning of this Annual Report on Form 10-K for further discussion.

Overview

Ingevity Corporation ("Ingevity," "the company", "we," "us" or "our") is a leading global manufacturer of specialty chemicals and high performance activated carbon materials. We provide innovative solutions to meet our customers' unique and demanding requirements through proprietary formulated products. We report in two business segments, Performance Materials and Performance Chemicals.

Our Performance Materials segment consists of our automotive technologies and process purification product lines. Performance Materials manufactures products in the form of powder, granular, extruded pellets, extruded honeycombs, and activated carbon sheets. Automotive technologies products are sold into the gasoline vapor emission control applications within the automotive industry, while process purification products are sold into the food, water, beverage, and chemical purification industries.

Our Performance Chemicals segment consists of our pavement technologies, oilfield technologies, industrial specialties, and engineered polymers product lines. Performance Chemicals manufactures products derived from crude tall oil ("CTO") and lignin extracted from the kraft pulping process as well as caprolactone monomers and derivatives derived from cyclohexanone and hydrogen peroxide. Performance Chemicals products serve as critical inputs used in a variety of high performance applications, including warm mix paving, pavement preservation, and pavement reconstruction and recycling (pavement technologies product line), oil well service additives and oil production and downstream application (oilfield technologies product line), adhesives, agrochemicals, lubricants, printing inks, and industrial intermediates (industrial specialties product line), coatings, resins, elastomers, adhesives, bio-plastics, and medical devices (engineered polymers product line).

Recent Developments

2020 Senior Notes

On October 28, 2020, we issued \$550.0 million aggregate principal amount of 3.875 percent senior unsecured notes due 2028 (the "2020 Notes") in a private placement pursuant to an indenture dated as of October 28, 2020, by and among Ingevity, the subsidiary guarantors party thereto and U.S. Bank National Association, as trustee.

The net proceeds from the sale of the 2020 Notes, after deducting deferred financing fees of \$8.8 million, were used to repay our \$375.0 million term loan from 2019, with the remainder being utilized to repay outstanding balances under our revolving credit facility.

Interest payments on the 2020 Notes are due semiannually in arrears on November 1st and May 1st of each year, beginning on May 1, 2021, at a rate of 3.875 percent per year. The 2020 Notes will mature on November 1, 2028.

Revolving Credit Facility Amendment

On October 28, 2020, we entered into Amendment No. 5 to our existing credit agreement, dated as of March 7, 2016. Among other things, Amendment No. 5 extended the maturity date with respect to our revolving credit facility from August 7, 2023 to October 28, 2025 and reduced the aggregate principal amount of revolving commitments thereunder from \$750.0 million to \$500.0 million.

Coronavirus Pandemic

On March 11, 2020, the World Health Organization declared COVID-19 a global pandemic and recommended containment and mitigation measures worldwide. COVID-19 has led to adverse impacts on the U.S. and global economies, and created uncertainty regarding potential impacts to our supply chain, operations, and customer demand. We have been classified as an essential business in the jurisdictions that have made this determination to date, allowing us to continue operations. However, our facilities - as well as the operations of our suppliers, customers, and third-party sales agents and distributors - have been, and will continue to be, disrupted by governmental and private sector responses to COVID-19. This includes business shutdowns, work-from-home orders and social distancing protocols, travel or health-related restrictions, as well as quarantines, self-isolations, and disruptions to transportation channels.

On March 27, 2020, the U.S. government enacted the Coronavirus Aid, Relief, and Economic Security Act ("CARES Act"), which includes modifications to the limitation on business interest expense and net operating loss provisions, and provided a payment delay of the employer's portion of U.S. Social Security taxes during 2020, after the date of enactment. We deferred \$4.7 million of employer U.S. Social Security taxes due in 2020, with 50 percent due by December 31, 2021 and the remaining 50 percent by December 31, 2022. The CARES Act is not expected to have a material impact on our consolidated financial statements.

In order to strengthen our short-term liquidity and to ensure financial flexibility, in March 2020, we drew down \$250 million from our revolving credit facility as a precautionary measure, all of which was repaid by year end. We also implemented work-from-home policies and protocols for the majority of our global salaried workforce, as well as social distancing practices to ensure the safety of our employees at our manufacturing facilities. During the second quarter, we decreased production at some of our U.S. and China based manufacturing plants due to COVID-19 customer demand impacts and implemented a cost reduction initiative further described in Note 16 to the consolidated financial statements included in Part II Item 8 of this Form 10-K. During the third quarter, we resumed normal production at all manufacturing plants as customer demand improved.

While the disruptions caused by the pandemic are currently expected to be temporary, there is uncertainty regarding the virus's duration and severity and the effectiveness of vaccines. COVID-19 has impacted, and will continue to impact, our results of operations, financial position, and liquidity.

Results of Operations

	Years Ended December 31,							
In millions, except per share data		2020		2019		2018		
Net sales	\$	1,216.1	\$	1,292.9	\$	1,133.6		
Cost of sales		750.6		810.9		716.8		
Gross profit		465.5		482.0		416.8		
Selling, general and administrative expenses		149.4		163.1		132.4		
Research and technical expenses		22.6		19.7		21.5		
Separation costs						_		
Restructuring and other (income) charges, net		18.5		1.8		(0.5)		
Acquisition-related costs		1.8		26.9		10.8		
Other (income) expense, net		(4.1)		(4.3)		1.0		
Interest expense		47.1		54.6		33.2		
Interest income	<u> </u>	(4.9)		(7.7)		(3.4)		
Income (loss) before income taxes		235.1		227.9		221.8		
Provision (benefit) for income taxes	<u> </u>	53.7		44.2		40.0		
Net income (loss)		181.4		183.7		181.8		
Less: Net income (loss) attributable to noncontrolling interests						12.7		
Net income (loss) attributable to Ingevity stockholders	\$	181.4	\$	183.7	\$	169.1		

Net sales

The table below shows 2020 and 2019 Net sales and percentage variances from 2019 and 2018, respectively.

	_	Percentage change vs. prior year					
In millions, except percentages	Net sales	Total change	Currency effect	Price/Mix	Volume		
Year Ended December 31, 2020	\$ 1,216.1	(6)%	%	1%	(7)%		
Year Ended December 31, 2019	1,292.9	14%	(1)%	4%	11%		

Year Ended December 31, 2020 vs. 2019

The sales decrease in 2020 was driven by a volume decline of \$85.2 million (seven percent of sales), primarily related to a volume decline in Performance Chemicals of \$89.1 million, offset slightly by a volume increase in Performance Materials of \$3.9 million, favorable pricing and product mix of \$7.6 million (one percent of sales) and favorable foreign exchange impacts of \$0.8 million (less than one percent of sales).

Year Ended December 31, 2019 vs. 2018

The sales increase in 2019 was driven primarily by a volume increase of \$123.7 million (11 percent of sales). Performance Materials and Performance Chemicals contributed \$70.1 million and \$53.6 million, respectively, to the volume growth during the year. The acquisition of Caprolactone Business ("Caprolactone Acquisition"), completed in the first quarter of 2019, contributed \$122.1 million to the favorable volume growth during the period. Additionally, the favorable pricing and product mix of \$43.2 million (four percent of sales) across both segments, offset partially by unfavorable foreign exchange impacts of \$7.6 million (one percent of sales) resulted in the year over year Net sales increase.

Gross Profit

Year Ended December 31, 2020 vs. 2019

Gross profit decline of \$16.5 million was driven by unfavorable sales volume impacting gross profit by \$35.8 million, increased manufacturing costs of \$2.3 million due to reduced plant throughput, and unfavorable foreign currency exchange of \$0.8 million, which were partially offset by favorable pricing and product mix improvement of \$14.0 million. Additionally, the prior year was negatively impacted by inventory step-up amortization related to the Caprolactone Acquisition of \$8.4 million (see Note 17 within the consolidated financial statements included within Part II. Item 8 of the Form 10-K for more information). Refer to the Segment Operating Results section included within this MD&A for more information on the drivers to the changes in gross profit period over period for both segments.

Year Ended December 31, 2019 vs. 2018

Gross profit improvement of \$65.2 million was driven by favorable sales volume contributing \$62.0 million of additional gross profit, pricing and product mix improvement of \$39.5 million. These positive impacts were offset by increased manufacturing costs of \$26.0 million, inventory step-up amortization related to the acquisitions of the Pine Chemical Business and the Caprolactone Business of \$7.0 million (see Note 17 within the consolidated financial statements included within Part II. Item 8 of the Form 10-K for more information), and unfavorable foreign currency exchange of \$3.3 million. Refer to the Segment Operating Results section included within this MD&A for more information on the drivers to the changes in gross profit period over period for both segments.

Selling, general and administrative expenses

Year Ended December 31, 2020 vs. 2019

Selling, general and administrative ("SG&A") expenses were \$149.4 million (12 percent of sales) and \$163.1 million (13 percent of sales) for the years ended December 31, 2020 and 2019, respectively. The decrease in SG&A expenses is primarily due to reduced travel and other miscellaneous costs of \$12.8 million, due to the COVID-19 pandemic, decreased intellectual property litigation costs of \$5.0 million, and lower employee-related incentive costs of \$3.0 million. The positive impact was partially offset by an increase in amortization costs associated with intangible assets acquired from in Caprolactone Acquisition (see Note 17 within the consolidated financial statements included within Part II. Item 8 of the Form 10-K for more information) and an increase in our credit allowance reserve which increased by a combined \$7.1 million.

Year Ended December 31, 2019 vs. 2018

SG&A expenses were \$163.1 million (13 percent of sales) and \$132.4 million (12 percent of sales) for the years ended December 31, 2019 and 2018, respectively. The increase in SG&A is primarily due to intangible asset amortization associated with the Caprolactone Acquisition and Pine Chemical Acquisition of \$16.5 million and increased intellectual property litigation costs associated with our Performance Materials' intellectual property litigation of \$10.2 million, and increased spending related to the new engineered polymers product line.

Research and technical expenses

Years Ended December 31, 2020, 2019, and 2018

Research and technical expenses as a percentage of Net sales remained relatively consistent period over period, increasing to 1.9 percent in the year ended December 31, 2020 from 1.5 percent and 1.9 percent in the years ended December 31, 2019 and 2018, respectively.

Restructuring and other (income) charges, net

Restructuring and other (income) charges, net, of \$18.5 million, \$1.8 million, and \$(0.5) million for the years ended December 31, 2020, 2019, and 2018, respectively, with the increase in 2020 primarily attributable to our business transformation initiative and certain cost reduction initiatives. See Note 16 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information.

Acquisition-related costs

Years Ended December 31, 2020, 2019, and 2018

Acquisition costs of \$1.8 million, \$26.9 million, and \$10.8 million for the years ended December 31, 2020, 2019, and 2018, respectively, were comprised of charges incurred in connection with the Caprolactone Acquisition and Pine Chemical Acquisition. See Note 17 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information.

Other (income) expense, net

Years Ended December 31, 2020, 2019, and 2018

	Years Ended December 31,						
In millions	2020			2019		2018	
Foreign currency exchange (income) loss	\$	(5.8)	\$	0.2	\$	2.0	
Royalty and sundry (income) loss		(0.4)		(1.9)		(0.8)	
Impairment of equity investment (1)		1.4		_		1.5	
Other (income) expense, net		0.7		(2.6)		(1.7)	
Total Other (income) expense, net	\$	(4.1)	\$	(4.3)	\$	1.0	

⁽¹⁾ Represents an impairment charge related to an equity investment within our Performance Materials segment.

Interest expense

Years Ended December 31, 2020, 2019, and 2018

	Years Ended December 31,						
In millions		2020		2019		2018	
Interest expense on finance lease obligations	\$	6.8	\$	6.1	\$	6.2	
Interest expense on revolving credit facility and term loans		22.4		36.2		14.9	
Interest expense on senior notes		18.1		13.5		13.0	
Capitalized interest		(0.8)		(1.6)		(1.1)	
Other		0.6		0.4		0.2	
Total interest expense	\$	47.1	\$	54.6	\$	33.2	

Interest income

Years Ended December 31 2020, 2019, and 2018

	Years Ended December 31,					,
In millions	2	2020		2019		2018
Interest income on restricted investment (1)	\$	2.0	\$	2.0	\$	2.0
Interest income on fixed-to-fixed cross-currency interest rate swap (2)		1.6		2.3		
Other		1.3		3.4		1.4
Total interest expense	\$	4.9	\$	7.7	\$	3.4

⁽¹⁾ See Note 6 to the consolidated financial statements included in Part II. Item 8 of this Form 10-K for more information.

Provision (benefit) for income taxes

Years Ended December 31, 2020, 2019, and 2018

For the years ended December 31, 2020, 2019, and 2018, our effective tax rate was 22.8 percent, 19.4 percent, and 18.0 percent respectively. An explanation of the change in the effective tax rate is presented in Note 18 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K.

Net income (loss) attributable to noncontrolling interests

Year Ended December 31, 2020, 2019, and 2018

Net income (loss) attributable to noncontrolling interests was zero, zero and \$12.7 million for the years ended December 31, 2020, 2019, and 2018, respectively. Our noncontrolling interest represented the 30 percent ownership interest held by a third-party U.S.-based company in our consolidated Purification Cellutions, LLC legal entity, prior to our purchase of this remaining interest on August 1, 2018.

⁽²⁾ See Note 10 to the consolidated financial statements included in Part II. Item 8 of this Form 10-K for more information.

Segment Operating Results

In addition to the information discussed above, the following sections discuss the results of operations for each of Ingevity's segments. Our segments are (i) Performance Materials and (ii) Performance Chemicals. Segment Earnings before Interest, Taxes, Depreciation and Amortization ("EBITDA") is the primary measure used by the Company's chief operating decision maker to evaluate the performance of and allocate resources among our operating segments. Segment EBITDA is defined as segment revenue less segment operating expenses (segment operating expenses consist of costs of sales, selling, general and administrative expenses, other (income) expense, net, excluding depreciation and amortization). We have excluded the following items from segment EBITDA: interest expense associated with corporate debt facilities, income taxes, depreciation, amortization, restructuring and other (income) charges, net, acquisition and other-related costs, pension and postretirement settlement and curtailment (income) charge. In general, the accounting policies of the segments are the same as those described in the Summary of Significant Accounting Policies in Note 3 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K.

Performance Materials

		Years Ended December 31,								
In millions		2020		2019		2018				
Net sales										
Automotive Technologies product line	\$	477.7	\$	454.9	\$	362.0				
Process Purification product line		32.3		35.7		38.4				
Total Performance Materials - Net sales	\$	510.0	\$	490.6	\$	400.4				
Segment EBITDA		249.2		213.4		169.4				

Net Sales Comparison of Years Ended December 31, 2020, 2019, and 2018

	_	Percentage change vs. prior year					
In millions, except percentages	Net sales	Total change	Currency effect	Price/Mix	Volume		
Year Ended December 31, 2020	\$ 510.0	4 %	— %	3 %	1 %		
Year Ended December 31, 2019	\$ 490.6	23 %	(1)%	6 %	18 %		

Year Ended December 31, 2020 vs. 2019

Segment net sales. The increase in 2020 was driven by favorable pricing and product mix of \$13.6 million (three percent of sales). Additionally, \$3.9 million (one percent of sales) in volume improvements in automotive evaporative emission canister products due to stricter environmental regulation in the Chinese, North American, and European automotive markets and favorable foreign currency exchange impacts of \$1.9 million (less than one percent of sales) contributed to the overall increase.

Segment EBITDA. Segment EBITDA increased \$35.8 million due to favorable pricing and product mix, which contributed \$18.7 million, favorable volume, primarily in the automotive evaporative emission canister products, which contributed \$2.8 million, lower manufacturing costs of \$5.0 million and decreased SG&A expenses and research and technical costs of \$8.0 million, primarily due to reduced travel and decreased intellectual property litigation costs. Favorable foreign currency exchange impacts, offset slightly by other miscellaneous charges, also contributed \$1.3 million to the increase.

Year Ended December 31, 2019 vs. 2018

Segment net sales. The increase in 2019 was driven by \$70.1 million (18 percent of sales) in volume improvements in automotive evaporative emission canister products due to stricter environmental regulation in the Chinese, North American, and European automotive markets. These gains were further bolstered by favorable pricing and product mix of \$22.9 million (six percent of sales), partially offset by unfavorable foreign currency exchange impacts of \$2.8 million (one percent of sales).

Segment EBITDA. Segment EBITDA increased \$44.0 million due to favorable volume primarily in the automotive carbon application, which contributed \$41.3 million and favorable pricing and product mix, which contributed \$18.9 million.

These gains were partially offset by increased manufacturing costs of \$5.4 million and increased SG&A expenses and research and technical costs of \$14.6 million, primarily due to increased intellectual property litigation costs of \$10.2 million. Favorable foreign currency exchange impacts and other miscellaneous income of \$3.8 million also contributed to the increase.

Performance Chemicals

		Years Ended December 3							
millions		2020	2019		2018				
Net sales									
Oilfield Technologies product line	\$	75.6	\$	111.4	\$	114.2			
Pavement Technologies product line		186.8		183.3		178.5			
Industrial Specialties product line		316.0		385.5		440.5			
Engineered Polymers product line		127.7		122.1		_			
Total Performance Chemicals - Net sales	\$	706.1	\$	802.3	\$	733.2			
Segment EBITDA		148.7		183.5		151.1			

Net Sales Comparison of Years Ended December 31, 2020, 2019, and 2018

		Percentage change vs. prior year						
In millions, except percentages	Net sales	Total Change	Currency effect	Price/ Mix	Volume			
Year Ended December 31, 2020	\$ 706.1	(12)%	<u> </u>	(1)%	(11)%			
Year Ended December 31, 2019	\$ 802.3	9 %	(1)%	3 %	7 %			

Pine Chemical Business and Caprolactone Business

The Pine Chemical Business has been integrated into our Performance Chemicals segment and has been included within our results of operations since March 8, 2018. The Caprolactone Business has been integrated into our Performance Chemicals segment and has been included within our results of operations since it was acquired on February 13, 2019. The information presented below includes the results of these acquisitions as compared to historical results. For a pro forma comparative analysis of 2020 versus 2019 and 2019 versus 2018 results, refer to the section below titled "Performance Chemicals Pro Forma Financial Results with the Pine Chemical Business and Caprolactone Business."

Year Ended December 31, 2020 vs. 2019

Segment net sales. The sales decrease was driven by unfavorable volume of \$89.1 million (11 percent of sales), which consisted of volume declines in industrial specialties (\$60.1 million) and oilfield technologies (\$35.8 million), partially offset by volume growth in engineered polymers (\$5.9 million) and pavement technologies product lines (\$0.9 million). Also driving the net sales decline was unfavorable pricing and product mix of \$6.0 million (one percent of sales) in industrial specialties (\$9.0 million), which was partially offset by favorable pricing and product mix in oilfield technologies (\$0.1 million) and pavement technologies product lines (\$2.9 million). Unfavorable foreign currency of \$1.1 million (less than one percent of sales) contributed to the overall decline impact.

Segment EBITDA. Segment EBITDA decreased \$34.8 million, mainly due to the decline in volume of \$38.6 million, unfavorable pricing and product mix of \$4.7 million, and unfavorable foreign currency exchange impacts and other miscellaneous charges of \$2.0 million. Favorable SG&A expenses due to reduced travel and lower employee-related costs of \$10.3 million and favorable manufacturing productivity of \$0.2 million offset part of the overall decline.

Year Ended December 31, 2019 vs. 2018

Segment net sales. The sales increase was driven by favorable volume of \$53.6 million (seven percent of sales), which consisted of a favorable increase in engineered polymers (\$122.1 million), partially offset by volume declines in industrial specialties (\$63.9 million), oilfield technologies (\$3.3 million) and pavement technologies product lines (\$1.3 million). Also

driving the net sales increase was pricing and product mix of \$20.3 million (three percent of sales) in industrial specialties (\$12.3 million), oilfield technologies (\$0.8 million), and pavement technologies product lines (\$7.2 million), which were partially offset by unfavorable \$4.8 million (one percent of sales) of foreign currency exchange.

Segment EBITDA. Segment EBITDA increased \$32.4 million due to favorable volume of \$20.7 million, favorable price and product mix of \$20.6 million, as well as favorable SG&A expenses of \$2.0 million. These favorable operating results were partially offset by \$10.4 million of unfavorable manufacturing productivity, primarily driven by higher freight costs, and unfavorable foreign currency exchange impacts and other miscellaneous charges of \$0.5 million.

Performance Chemical Pro Forma Financial Results with the

Pine Chemical Business and Caprolactone Business

We believe that reviewing our operating results by combining actual and pro forma results for our Performance Chemicals segment is useful in identifying trends in, or reaching conclusions regarding, the overall operating performance. Our pro forma segment information includes adjustments as if the acquisitions had occurred on January 1st, in the year preceding the year of acquisition. Our pro forma results are adjusted for the effects of acquisition accounting but do not include adjustments for costs related to integration activities, cost savings or synergies that might be achieved by the combined businesses. Pro forma amounts presented are not necessarily indicative of what our results would have been had we operated the Pine Chemical Business and Caprolactone Business since January 1st in the year preceding the acquisition, nor are the pro forma amounts necessarily indicative of future results.

Performance Chemical Pro Forma Financial Results Comparison

		Years Ended December 31,				
In millions		2019 Pro Forma		2018 Pro Forma		
Net sales						
Performance Chemicals, as reported (1)		\$ 706.1	\$	802.3	\$	733.2
Pine Chemical Business and Caprolactone Business, pro forma	(2)	_		17.7		187.2
	Net Sales (3)	\$ 706.1	\$	820.0	\$	920.4
Segment EBITDA						
Performance Chemicals, as reported (1)		\$ 148.7	\$	183.5	\$	151.1
Pine Chemical Business and Caprolactone Business, pro forma	(2)	_		5.5		65.9
	Segment EBITDA (3)	\$ 148.7	\$	189.0	\$	217.0

⁽¹⁾ As reported amounts are the results of operations of Performance Chemicals, including the results of the Pine Chemical Business and Caprolactone Business, post acquisition dates of March 8, 2018 and February 13, 2019, respectively.

Pro forma amounts include historical results of the Pine Chemical Business and Caprolactone Business, prior to the acquisition dates of March 8, 2018 and February 13, 2019, respectively. These amounts also include adjustments as if the acquisitions had occurred on January 1st in the year preceding the acquisition, including the effects of purchase accounting. The pro forma amounts do not include adjustments for expenses related to integration activities, cost savings, or synergies that have been or may have been realized.

⁽³⁾ The pro forma combined results are not necessarily indicative of what the results would have been had we acquired the Pine Chemical Business and Caprolactone Business on January 1st in the year preceding the acquisition, nor are they indicative of future results.

Performance Chemicals Pro Forma Net Sales Comparison

	Years Ended December 31,					
In millions		2020	2019 Pro Forma		2018 Pro Forma	
Oilfield Technologies product line	\$	75.6	\$	111.4	\$	118.8
Pavement Technologies product line		186.8		183.3		178.7
Industrial Specialties product line		316.0		385.5		455.9
Engineered Polymers product line		127.7		139.8		167.0
Net Sales - Performance Chemicals	\$	706.1	\$	820.0	\$	920.4

Pro Forma Comparison of Year Ended December 31, 2020, 2019, and 2018

		Po	ercentage chan	ge vs. prior year	<u>:</u>
Performance Chemicals (In millions, except percentages)	Net Sales	Total change	Currency effect	Price/Mix	Volume
Year Ended December 31, 2020	\$ 706.1	(14)%	<u> </u>	(1)%	(13)%
Year Ended December 31, 2019	\$ 820.0	(11)%	(1)%	3 %	(13)%

Pro Forma Results Comparison - Year Ended December 31, 2020 vs. 2019

Net Sales. The decrease was driven by unfavorable volume of \$106.8 million (13 percent of sales), which consisted of unfavorable volumes in industrial specialties (\$60.1 million), oilfield technologies (\$35.8 million) and engineered polymers product lines (\$11.8 million), partially offset by a slight increase in pavement technologies (\$0.9 million). Also contributing to the decline was unfavorable pricing and product mix of \$6.0 million (one percent of sales) driven by unfavorable price and product mix in industrial specialties product lines (\$9.0 million), partially offset by pavement technologies (\$2.9 million) and oilfield technologies (\$0.1 million). In addition, unfavorable foreign currency exchange impacted Net sales by \$1.1 million (less than one percent of sales).

Segment EBITDA. Pro Forma Segment EBITDA decreased by \$40.3 million primarily due to decreased volumes of \$44.0 million, increased manufacturing, freight and warehousing costs of \$2.0 million, unfavorable pricing and product mix of \$4.7 million, and unfavorable foreign currency exchange impact of \$1.6 million. These declines were partially offset by \$12.0 million of favorable SG&A expenses.

Pro Forma Results Comparison - Year Ended December 31, 2019 vs. 2018

Net Sales. The decrease was driven by unfavorable volume of \$115.4 million (13 percent of sales), which consisted of unfavorable volumes in industrial specialties (\$79.2 million), engineered polymers (\$26.7 million), pavement technologies (\$1.6 million), and oilfield technologies product lines (\$7.9 million). This decline was partially offset by pricing and product mix increase of \$20.3 million (three percent of sales) driven by favorable price and product mix in oilfield technologies (\$0.8 million), pavement technologies (\$7.2 million), and industrial specialties product lines (\$12.3 million). In addition, unfavorable foreign currency exchange impacted Net sales by \$5.3 million (less than one percent of sales).

Segment EBITDA. Pro Forma Segment EBITDA decreased by \$28.0 million primarily due to decreased volumes of \$50.3 million, increased manufacturing, freight and warehousing costs of \$5.9 million, and unfavorable foreign currency exchange impact of \$1.9 million. These declines were partially offset by \$19.8 million of favorable pricing and product mix and \$10.3 million of favorable SG&A expenses.

Use of Non-GAAP Financial Measures

Ingevity has presented the financial measure, Adjusted EBITDA, defined below, which has not been prepared in accordance with U.S. generally accepted accounting principles ("GAAP") and has provided a reconciliation to net income, the

most directly comparable financial measure calculated in accordance with GAAP. Adjusted EBITDA is not meant to be considered in isolation or as a substitute for the most directly comparable financial measure calculated in accordance with GAAP. Adjusted EBITDA is utilized by management as a measure of profitability.

We believe this non-GAAP financial measure provides management as well as investors, potential investors, securities analysts and others with useful information to evaluate the performance of the business, because such measure, when viewed together with our financial results computed in accordance with GAAP, provides a more complete understanding of the factors and trends affecting our historical financial performance and projected future results. We believe Adjusted EBITDA is a useful measure because it excludes the effects of financing and investment activities as well as non-operating activities.

Adjusted EBITDA is defined as net income (loss) plus provision (benefit) for income taxes, interest expense, net, depreciation, amortization, restructuring and other (income) charges, net, acquisition and other-related costs, and pension and postretirement settlement and curtailment (income) charges, net.

This non-GAAP measure is not intended to replace the presentation of financial results in accordance with GAAP and investors should consider the limitations associated with these non-GAAP measures, including the potential lack of comparability of these measures from one company to another. A reconciliation of Adjusted EBITDA to net income is set forth within this section.

Reconciliation of Net Income to Adjusted EBITDA

	Year	rs En	ded Decemb	er 31,	
In millions	2020		2019		2018
Net income (loss) (GAAP)	\$ 181.4	\$	183.7	\$	181.8
Interest expense	47.1		54.6		33.2
Interest income	(4.9)		(7.7)		(3.4)
Provision (benefit) for income taxes	53.7		44.2		40.0
Depreciation and amortization - Performance Materials	31.2		24.2		22.2
Depreciation and amortization - Performance Chemicals	69.0		60.8		34.8
Pension and postretirement settlement and curtailment income (charges), net	0.1				0.2
Restructuring and other (income) charges, net	18.5		1.8		(0.5)
Acquisition and other-related costs (1)	 1.8		35.3		12.2
Adjusted EBITDA (Non-GAAP)	\$ 397.9	\$	396.9	\$	320.5

⁽¹⁾ These charges are associated with the acquisition and integration of the Pine Chemical Business and the acquisition and integration of the Caprolactone Business. See below for more detail on the charges incurred.

	 Year	s En	ded Decembe	er 31,	
In millions	2020		2019		2018
Legal and professional service fees (i)	\$ 1.8	\$	14.2	\$	6.9
Inventory fair value step-up amortization (ii)			8.4		1.4
Purchase price hedge adjustment (i)			12.7		3.9
Acquisition and other-related costs	\$ 1.8	\$	35.3	\$	12.2

⁽i) Included within "Acquisition-related costs" on the consolidated statements of operations.

Adjusted EBITDA

Year Ended December 31, 2020, 2019 and 2018

The factors that impacted Adjusted EBITDA period to period are the same factors that affected earnings discussed in the sections entitled "Results of Operations" and "Segment Operating Results" within MD&A.

⁽ii) Included within "Cost of sales" on the consolidated statements of operations.

Total Company Outlook and 2021 Guidance

For revenue, we expect favorable volume growth in Performance Materials' automotive technologies product line largely due to continued industry efforts to refill the vehicle pipeline and despite the absence of any significant new gasoline vapor emission control regulations. In Performance Chemicals, we expect moderate growth in demand for pavement technologies and engineered polymers based on strong paving project backlog, continued Evotherm® warm mix technology adoption, and increased demand for thermoplastics. We also anticipate growth in merchant rosin sales and our agricultural dispersants products within industrial specialties, which will be partially offset by continued softness in publication inks and our oilfield chemicals business. Our outlook reflects our expectation that the first half of 2021 will continue to be impacted by the COVID-19 pandemic and by the microchip shortage, which is disrupting the global automotive supply chain.

Adjusted EBITDA is expected to grow by one percent to six percent versus 2020. In the Performance Materials segment, growth will be driven by continued volume, price, and mix improvements, due in part to a slight uptick in demand over 2020, and a continued refilling of the automotive pipeline. This growth will be partially offset by higher logistics costs, increased compensation costs, and continued legal costs to defend our Performance Materials' intellectual property. In our Performance Chemicals segment, continued profitable growth in pavement technologies and a return to growth in engineered polymers is expected to be partially offset by somewhat lower volumes in oilfield technologies, and modest inflationary costs for freight and primary raw materials. Some risks to the 2021 outlook include lower than anticipated U.S., China, Canadian, and European vehicle sales and production, higher non-primary raw materials costs, a shift towards smaller vehicles in the U.S. (versus the shift towards light trucks as seen in recent years), and further declines in oil drilling and production in oilfield technologies, negative impacts from Brexit, and prolonged disruptions in the global supply chain. We expect to deliver fiscal year 2021 Adjusted EBITDA of \$400 million to \$420 million. These estimates assume that the first half of the year will continue to impacted by the COVID-19 pandemic, with improvements in economic conditions over the second half of the year.

A reconciliation of net income to adjusted EBITDA as projected for 2021 is not provided. Ingevity does not forecast net income as it cannot, without unreasonable effort, estimate or predict with certainty various components of net income. These components, net of tax, include further restructuring and other income (charges), net; additional acquisition and other related costs in connection with the Perstorp Holding AB's Capa caprolactone business; additional pension and postretirement settlement and curtailment (income) charges; and revisions due to future guidance and assessment of U.S. tax reform. Additionally, discrete tax items could drive variability in our projected effective tax rate. All of these components could significantly impact such financial measures. Further, in the future, other items with similar characteristics to those currently included in adjusted EBITDA, that have a similar impact on comparability of periods, and which are not known at this time, may exist and impact adjusted EBITDA.

Liquidity and Capital Resources

The primary source of liquidity for our business is the cash flow provided by operating activities. We expect our cash flow provided by operations combined with cash on hand and available capacity under our revolving credit facility to be sufficient to meet our working capital needs. Over the next twelve months, we expect to make interest payments, capital expenditures, expenditures related to our business transformation initiative, principal repayments, purchases pursuant to our stock repurchase program, and income tax payments, and to incur additional spending associated with our Performance Materials' intellectual property litigation. In addition, from time to time we may repurchase any of our outstanding 4.50 percent senior unsecured notes due in 2026 in open market or privately negotiated transactions or otherwise. We believe our sources of liquidity will be sufficient to fund our planned operations and meet our interest and other contractual obligations for at least the next twelve months. As of December 31, 2020, our undrawn capacity under our revolving credit facility was \$497.7 million. In addition, we also evaluate and consider strategic acquisitions, and joint ventures, as well as other transactions to create stockholder value and enhance financial performance. Such transactions may require cash expenditures. In connection with such transactions, or to fund other anticipated uses of cash, we may modify our existing debt facilities, seek additional debt financing, issue equity securities, or some combination thereof.

Cash and cash equivalents totaled \$257.7 million at December 31, 2020. We continuously monitors deposit concentrations and the credit quality of the financial institutions that hold our cash and cash equivalents, as well as the credit quality of our insurance providers, customers, and key suppliers.

Due to the global nature of our operations, a portion of our cash is held outside the U.S. The cash and cash equivalents balance at December 31, 2020 included \$88.2 million held by our foreign subsidiaries. Cash and earnings of our foreign subsidiaries are generally used to finance our foreign operations and their capital expenditures. We believe that our foreign holdings of cash will not have a material adverse impact on our U.S. liquidity. If these earnings were distributed, such amounts would be subject to U.S. federal income tax at the statutory rate less the available foreign tax credits, if any, and potentially subject to withholding taxes in the various jurisdictions. The potential tax implications of the repatriation of unremitted earnings are driven by facts at the time of distribution, therefore, it is not practicable to estimate the income tax liabilities that might be incurred if such cash and earnings were repatriated to the U.S. Management does not currently expect to repatriate cash earnings from our foreign operations in order to fund U.S. operations.

Debt Obligations and Facilities

Refer to Note 11 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for a summary of our outstanding debt obligations and revolving credit facility.

Other Potential Liquidity Needs

Share Repurchases

On February 28, 2020, our Board of Directors authorized the repurchase of up to \$500.0 million of our common stock, and at December 31, 2020, \$412.0 million remained unused under this program. We currently do not have any specific timetable or price targets for repurchasing shares, and may suspend or terminate the program at any time. Shares may be purchased through open market or privately negotiated transactions at the discretion of management based on its evaluation of market prevailing conditions and other factors.

In the year ended December 31, 2020, we repurchased \$88.0 million in common shares, representing 1,533,442 shares of our common stock at a weighted average cost per share of \$57.38. At December 31, 2020, \$412.0 million remained unused under our Board-authorized repurchase program.

Capital Expenditures

Projected 2021 capital expenditures are expected to be \$100 million to \$120 million. We have no material commitments associated with these projected capital expenditures as of December 31, 2020.

Cash flow comparison of Years Ended December 31, 2020, 2019, and 2018

	Yea	rs Ended Decemb	er 31,
In millions	2020	2019	2018
Net cash provided by (used in) operating activities	\$ 352.4	\$ 275.7	\$ 252.0
Net cash provided by (used in) investing activities	(110.6)	(658.3)	(414.4)
Net cash provided by (used in) financing activities	(50.2)	369.2	153.7

Cash flows provided by (used in) operating activities

During the year ended December 31, 2020, cash flow provided by operations increased primarily due to working capital decreases compared to 2019, which are further explained below.

Current Assets and Liabilities

	 Decem	ber 31,	
In millions	 2020		2019
Cash and cash equivalents	\$ 257.7	\$	56.5
Accounts receivable, net	148.0		150.0
Inventories, net	189.0		212.5
Prepaid and other current assets	 34.0		44.2
Total current assets	\$ 628.7	\$	463.2

Current assets as of December 31, 2020, increased \$165.5 million compared to December 31, 2019, primarily due to an increase in cash of \$201.2 million. This increase was partially offset by a decrease Inventories, net, of \$23.5 million, due to a concerted effort to control inventory levels in 2020 due to the COVID-19 pandemic and higher that expected customer demand in the fourth quarter. Prepaid and other current assets decreased by \$10.2 million primarily related to a reduction in restricted cash from our New Market Tax Credit transaction (see Note 11 in the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information). Accounts receivable, net, was relatively flat, decreasing by \$2.0 million in 2020.

	 Decem	ber 31,	
In millions	 2020		2019
Accounts payable	\$ 104.2	\$	99.1
Accrued expenses	46.6		33.3
Accrued payroll and employee benefits	25.1		28.2
Current operating lease liabilities	16.2		17.1
Notes payable and current portion of long-term debt	26.0		22.5
Income taxes payable	 5.3		15.3
Total current liabilities	\$ 223.4	\$	215.5

Current liabilities as of December 31, 2020, increased by \$7.9 million compared to December 31, 2019, driven primarily by the increase in Accrued expenses of \$13.3 million, related to an increase in accrued taxes of \$4.7 million, accrued interest of \$2.8 million, and accrued rebates of \$2.1 million. Also increasing current liabilities was a \$3.5 million increase in the current portion of long-term debt (see Note 11 in the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information on our debt balances). These increases were partially offset by a decrease of \$10.0 million on our Income taxes payable (see Note 18 in the taxes and related balances) and a decrease of \$3.1 million in Accrued payroll and employee benefits, primarily related to lower accrued incentive costs in the current year as compared to the year ended December 31, 2019.

Cash flows provided by (used in) investing activities

The cash used in investing activities for the year ended December 31, 2020 was primarily driven by capital and finance lease expenditures. See the table below for the capital expenditure spending by category.

The cash used in investing activities for the year ended December 31, 2019 was primarily driven by the \$537.9 million purchase of the Caprolactone Business (see Note 17 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information). The remaining cash used by investing activities was primarily driven by capital expenditures. See the table below for the capital expenditure spending by category.

The cash used in investing activities for the year ended December 31, 2018 was primarily driven by the \$315.5 million purchase of the Pine Chemical Business. The remaining cash used by investing activities was primarily driven by capital expenditures.

For the year ended December 31, 2020, capital spending was driven primarily by maintenance and growth spending. Our Performance Materials' facilities, including Covington, Virginia, Wickliffe, Kentucky, and Waynesboro, Georgia, incurred expenditures for growth and expansion projects, as well as base maintenance and safety spending. Our Performance Chemicals' facility in Warrington, United Kingdom, completed a large, multi-year growth and cost improvement project, and there was additional spending at all of our Performance Chemicals' facilities for base maintenance and safety spending. Additionally, we had capital expenditures related to our business transformation initiative (see Note 16 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information) and our new corporate headquarters.

For the year ended December 31, 2019, capital spending was driven primarily by maintenance and growth spending. Our Covington, Virginia facility incurred expenditures for its expansion project, along with base maintenance and other various equipment purchases. Also, we incurred cost improvement spending at our DeRidder, Louisiana location related to installation of new CTO tanks as well as base maintenance spending, and our Waynesboro, Georgia location expended funds primarily for growth and cost improvement. We also invested capital spending in our newest location in Warrington, United Kingdom to enable further growth and cost improvement as well as base maintenance.

For the year ended December 31, 2018, capital spending included both growth and maintenance spending for expansion and specialized equipment at our Covington, Virginia, Waynesboro, Georgia, and Changshu, China facilities, as well as base maintenance spending to support ongoing operations across both segments. In addition, we expended funds for cost improvement related to CTO tanks at our DeRidder, Louisiana facility.

Capital expenditure categories	Year	s End	led Decemb	er 31	,
In millions	2020		2019		2018
Maintenance	\$ 49.1	\$	44.6	\$	41.1
Safety, health and environment	14.9		11.2		9.6
Growth and cost improvement	 18.1		59.0		43.2
Total capital expenditures	\$ 82.1	\$	114.8	\$	93.9

Cash flows provided by (used in) financing activities

Cash provided by financing activities for the year ended December 31, 2020 was \$50.2 million, and was driven by proceeds from long-term borrowings from the senior notes that were issued in the fourth quarter of \$550.0 million, net of debt issuance costs of \$8.8 million. We used these proceeds to repay the outstanding balance on the revolving credit facility of \$131.2 million and the 2019 term loan of \$375.0 million. We also paid \$2.2 million in debt issuance costs for the amendment to our revolving credit facility (refer to Note 11 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information). Additionally, we repaid \$14.1 million of other long-term borrowings, repurchased \$88.0 million of our common stock, and made payments of \$3.2 million related to withholding tax on vested equity awards.

Cash provided by financing activities for the year ended December 31, 2019 was \$369.2 million, and was driven by proceeds from long-term borrowings from a new term loan in the first quarter of 2019 of \$375.0 million and \$131.3 million in net borrowings related to our revolving credit facility (refer to Note 11 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information). This was offset by repayments of \$122.5 million on our long-term borrowings. Additionally, we made payments of \$14.3 million related to withholding tax on vested equity awards.

Cash provided by financing activities for the year ended December 31, 2018 was \$153.7 million, and was driven by proceeds from long-term borrowings from the issuance of \$300.0 million senior notes (refer to Note 11 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information), offset by our purchase of the remaining portion of our joint venture with Purification Cellutions, LLC of \$80.0 million (refer to Note 13 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information), \$47.4 million to repurchase shares under a share repurchase program (also refer to Note 13 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information), and noncontrolling interest distributions of \$15.3 million.

Off-Balance Sheet Arrangements

Ingevity is not a party to any off-balance sheet arrangements that have, or are reasonably likely to have, a current or future material effect on Ingevity's financial condition, results of operations or cash flows.

Contractual Obligations

We enter into various contractual obligations throughout the year. Presented below are the contractual obligations of Ingevity as of December 31, 2020, and the time period in which payments under the obligations are due. Included below are disclosures regarding the amounts due under purchase obligations. A purchase obligation is defined as an agreement to purchase goods or services that is enforceable and legally binding on Ingevity and that specifies all significant terms, including fixed or minimum quantities to be purchased; fixed, minimum or variable price provisions; and the approximate timing of the transaction. We have included in the below disclosure all normal and recurring purchase orders, take-or-pay contracts and supply arrangements as well as other purchase commitments that management believes meet the above definition of a purchase obligation. See Note 11 and Note 14 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information.

]	Payn	nents due in perio	d			
In millions	Dece	Total at mber 31, 2020	2021		2022-2023		2024-2025	202	26 and beyond
Contractual obligations									
Debt maturities	\$	1,203.4	\$ 25.3	\$	328.1	\$		\$	850.0
Contractual interest (1)		258.5	40.7		77.5		69.6		70.7
Finance lease obligations (2)		154.2	8.1		16.3		16.6		113.2
Operating lease obligations		57.0	18.3		24.5		9.9		4.3
Purchase obligations		152.2	151.1		1.1		_		_
Total	\$	1,825.3	\$ 243.5	\$	447.5	\$	96.1	\$	1,038.2

⁽¹⁾ Contractual interest is the interest we are contracted to pay on our long-term debt obligations. We had \$353.4 million of long-term debt subject to variable interest rates at December 31, 2020 and \$850.0 million of debt subject to fixed interest rates. The rate assumed for the variable interest component of the contractual interest obligation was the rate in effect at December 31, 2020. Variable rates are determined by the market and will fluctuate over time.

⁽²⁾ Amounts include the interest payments, as well as the principal payment due in 2027, for the finance lease related to assets at our Wickliffe, Kentucky facility, and payments related to the finance lease for our North Charleston, South Carolina corporate headquarters which will be paid through the lease term ending in 2035.

New Accounting Guidance

Refer to the Note 4 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for a full description of recent accounting pronouncements including the respective expected dates of adoption and expected effects on our consolidated financial statements.

Critical Accounting Policies

Our principal accounting policies are described in Note 3 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K. Our consolidated financial statements are prepared in conformity with GAAP. The preparation of our financial statements requires management to make estimates and judgments that affect the reported amounts of assets, liabilities, revenues and expenses. We have reviewed these accounting policies, identifying those that we believe to be critical to the preparation and understanding of our financial statements. Critical accounting policies are central to our presentation of results of operations and financial condition and require management to make estimates and judgments on certain matters. We base our estimates and judgments on historical experience, current conditions and other reasonable factors.

The following is a list of those accounting policies that we have deemed most critical to the presentation and understanding of our results of operations and financial condition:

Revenue recognition

Our revenue is derived from contracts with customers, and substantially all our revenue is recognized when products are either shipped from our manufacturing and warehousing facilities or delivered to the customer. Revenue, net of returns and customer incentives, are based on the sale of manufactured products. Revenues are recognized when performance obligations under the terms of a contract with our customer are satisfied; generally, this occurs with the transfer of control of our products. For certain limited contracts, where we are producing goods with no alternative use and for which we have an enforceable right to payment for performance completed to date, we are recognizing revenue as goods are manufactured, rather than when they are shipped. Revenues are presented as Net sales on the consolidated statements of operations to the consolidated financial statements.

Since Net sales are derived from product sales only, we have disaggregated our Net sales by our product lines within each reportable segment. Net sales are measured as the amount of consideration we expect to receive in exchange for transferring goods. Sales, value add, and other taxes we collect concurrent with revenue-producing activities are excluded from revenue. Sales returns and allowances are not a normal practice in the industry and are not significant. Certain customers may receive cash-based incentives, including discounts and volume rebates, which are accounted for as variable consideration and included in Net sales. Shipping and handling fees billed to customers are included with Net sales. If we pay for the freight and shipping, we recognize the cost when control of the product has transferred to the customer as an expense in Cost of sales on the consolidated statements of operations. Although very rare, from time to time we incur expenses to obtain a sales contract. In these cases, if these costs are for orders that are fulfilled in one year or less, we expense these costs as they are incurred. Payment terms with our customers are typically in the range of zero to sixty days. Because the period between when we transfer a promised good to a customer and when the customer pays for that good will be one year or less, we elect not to adjust the promised amount of consideration for the effects of any financing component, as it is not significant.

Valuation of tangible and intangible long-lived assets and goodwill

Our long-lived assets primarily include property, plant and equipment and other intangible assets. We periodically evaluate whether current events or circumstances indicate that the carrying value of long-lived assets to be held and used may not be recoverable. If such circumstances are determined to exist, an estimate of undiscounted future cash flows produced by the long-lived asset, or the appropriate grouping of assets, is compared to carrying value to determine whether an impairment exists.

If an asset is determined to be impaired, the loss is measured based on quoted market prices in active markets, if available. If quoted market prices are not available, the estimate of fair value is based on various valuation techniques, including a discounted value of estimated future cash flows. We report an asset to be disposed of at the lower of its carrying value or its estimated net realizable value.

Goodwill represents the excess of cost of an acquired business over the fair value of the identifiable tangible and intangible assets acquired and liabilities assumed in a business combination. We conduct a required annual review of goodwill for potential impairment at October 1, or sooner if events or changes in circumstances indicate that the fair value of a reporting

unit is below its carrying value. Our reporting units are our operating segments, i.e. Performance Chemicals and Performance Materials. If the carrying value of a reporting unit that includes goodwill exceeds its fair value, which is determined using both the income approach and market approach, goodwill is considered impaired. The income approach determines fair value based on discounted cash flow model derived from a reporting unit's long-term forecasted cash flows. The market approach determines fair value based on the application of earnings multiples of comparable companies to projected earnings of the reporting unit. The amount of impairment loss is measured as the difference between the carrying value and the fair value of a reporting unit but is limited to the total amount of goodwill allocated to the reporting unit. In performing the fair value analysis, management makes various judgments, estimates and assumptions, the most significant of which is the assumption related to revenue growth rates.

The factors we considered in developing our estimates and projections for cash flows include, but are not limited to, the following: (i) macroeconomic conditions; (ii) industry and market considerations; (iii) costs, such as increases in raw materials, labor, or other costs; (iv) our overall financial performance; and, (v) other relevant entity-specific events that impact our reporting units.

The determination of whether goodwill is impaired involves a significant level of judgment in the assumptions underlying the approach used to determine the estimated fair values of our reporting units. We believe that the estimates and assumptions used in our impairment assessment are reasonable; however, these assumptions are judgmental and variations in any assumptions could result in materially different calculations of fair value. We will continue to evaluate goodwill on an annual basis as of October 1, and whenever events or changes in circumstances, such as significant adverse changes in operating results, market conditions, or changes in management's business strategy indicate that there may be a probable indicator of impairment. It is possible that the assumptions used by management related to the evaluation may change or that actual results may vary significantly from management's estimates.

Business Combinations

We account for business combinations in accordance with ASC 805 "Business Combinations" which requires, among other things, the acquiring entity in a business combination to recognize the fair value of the assets acquired and liabilities assumed; the recognition of acquisition-related costs in the consolidated results of operations; the recognition of restructuring costs in the consolidated results of operations for which the acquirer becomes obligated after the acquisition date; and contingent purchase consideration to be recognized at fair value on the acquisition date with subsequent adjustments recognized in the consolidated results of operations. We generally use third-party qualified consultants to assist management in determining the fair value of assets acquired and liabilities assumed. This includes, when necessary, assistance with the determination of lives and valuation of property and identifiable intangibles, assisting management in determining the fair value of obligations associated with employee related liabilities and assisting management in assessing obligations associated with legal and environmental claims.

The fair value assigned to identifiable intangible assets acquired are determined primarily by using an income approach, which is based on assumptions and estimates made by management. Significant assumptions utilized in the income approach are the attrition rate, growth rate, and discount rate. These assumptions are based on company specific information and projections, which are not observable in the market and are therefore considered Level 2 and Level 3 measurements. The excess of the purchase price over the fair value of the identified assets and liabilities is recorded as goodwill. Based on the acquired business' end markets and products as well as how the chief operating decision maker will review the business results determines the most appropriate operating segment for which to integrate the acquired business. Goodwill acquired, if any, is allocated to the reporting unit within or at the operating segment for which the acquired business will be integrated. Operating results of the acquired entity are reflected in the consolidated financial statements from date of acquisition.

Income taxes

We are subject to income taxes in the U.S. and numerous foreign jurisdictions, including China and the United Kingdom. The provision for income taxes includes income taxes paid, currently payable or receivable, and deferred taxes. We follow the liability method of accounting for income taxes in accordance with current accounting standards regarding the accounting for income taxes. Under this method, deferred income taxes are recorded based upon the differences between the financial reporting and tax bases of assets and liabilities and are measured using the enacted tax rates and laws in effect at the time the underlying assets or liabilities are recovered or settled. The ability to realize deferred tax assets is evaluated through the forecasting of taxable income, historical and projected future operating results, the reversal of existing temporary differences, and the availability of tax planning strategies. Valuation allowances are recognized to reduce deferred tax assets when it is more

likely than not that a tax benefit will not be realized. We do not provide income taxes on undistributed earnings of consolidated foreign subsidiaries as it is our intention that such earnings will remain invested in those companies.

We recognize income tax positions that are more likely than not to be realized and accrue interest related to unrecognized income tax positions, which is included as a component of the income tax provision, on the consolidated statements of operations.

ITEM 7A. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

Foreign currency

We have foreign-based operations, primarily in Europe, South America and Asia, which accounted for approximately 25 percent of our net sales in 2020. We have designated the local currency as the functional currency of our significant operations outside of the U.S. The primary currencies for which we have exchange rate exposure are the U.S. dollar versus the euro, the Japanese yen, the pound sterling, and the Chinese renminbi. In addition, certain of our domestic operations have sales to foreign customers. In the conduct of our foreign operations, we also make inter-company sales. All of this exposes us to the effect of changes in foreign currency exchange rates. Our earnings are therefore subject to change due to fluctuations in foreign currency exchange rates when the earnings in foreign currencies are translated into U.S. dollars. In some cases, we use foreign exchange forward contracts to hedge firm and highly anticipated foreign currency cash flows. Our largest exposures are to the Chinese renminbi and the euro. A hypothetical 10 percent change in the average Chinese renminbi and euro to U.S. dollar exchange rates during the year ended December 31, 2020, would have impacted our net sales and income before income taxes by approximately \$19 million or two percent and \$6 million or two percent, respectively.

Concentration of credit risk

The financial instruments that potentially subject Ingevity to concentrations of credit risk are accounts receivable. We limit our credit risk by performing ongoing credit evaluations and, when necessary, requiring letters of credit, guarantees or collateral. We had accounts receivable from our largest customer of \$4.7 million and \$3.2 million as of December 31, 2020 and 2019, respectively. Sales to this customer, which are included in the Performance Materials segment, were approximately six percent, five percent, and three percent of total net sales for each of the years ended December 31, 2020, 2019, and 2018, respectively. No customers individually accounted for greater than 10 percent of the Ingevity's consolidated net sales.

Commodity price risk

A portion of our manufacturing costs include purchased raw materials, which are commodities whose prices fluctuate as market supply and demand fundamentals change. Accordingly, product margins and the level of our profitability tend to fluctuate with the changes in these commodity prices. The cost of energy is a manufacturing cost that is exposed to commodity pricing. Our energy costs are diversified among electricity, steam and natural gas, with natural gas comprising our largest energy input.

Crude tall oil price risk

Our results of operations are directly affected by the cost of our raw materials, particularly crude tall oil ("CTO"), which is approximately 11 percent of consolidated cost of sales and 37 percent of our raw materials purchases for the year ended December 31, 2020. Pricing for CTO is subject to particular pricing pressures by reasons of the limited supply elasticity of the product and competing demands for its use, both of which drive pressure on price. Our gross profit and margins could be adversely affected by changes in the cost of CTO if we are unable to pass the increases on to our customers. CTO is a thinly traded commodity with pricing commonly established for periods ranging from one quarter to one year periods of time. We try to protect against such pricing fluctuations through various business strategies. Based on average pricing during the year ended December 31, 2020, a hypothetical unhedged, unfavorable 10 percent change in the market price for CTO would have impacted costs of sales by approximately \$8 million or one percent, which we may or may not have been able to pass on to our customers.

Natural gas price risk

Natural gas is our largest form of energy purchases constituting approximately two percent of our cost of goods sold for the year ended December 31, 2020. Increases in natural gas costs, unless passed on to our customers, would adversely affect our results of operations. If natural gas prices increase significantly, our business or results of operations may be adversely affected. We enter into certain derivative financial instruments in order to mitigate expected fluctuations in market prices and the volatility to earnings and cash flow resulting from changes to pricing of natural gas purchases. Refer to the Note 10 to the consolidated financial statements included within Part II. Item 8 of this Form 10-K for more information on our natural gas price risk hedging program. For the year ended December 31, 2020, a hypothetical, unhedged 10 percent increase in natural gas pricing would have resulted in an increase to cost of sales of approximately \$1.2 million or two percent. As of December 31, 2020, we had 0.9 million and 1.2 million mmBTUS (millions of British Thermal Units) in aggregate notional volume of outstanding natural gas commodity swap contracts and zero cost collar option contracts, respectively, designated as cash flow hedges. As of December 31, 2020, open commodity contracts hedge forecasted transactions until February 2022. The fair value of the outstanding designated natural gas commodity hedge contracts as of December 31, 2020 and 2019 was a net liability of \$0.1 million and \$0.5 million, respectively.

Interest Rate Risk

As of December 31, 2020, approximately \$353 million of our borrowings include a variable interest rate component. As a result, we are subject to interest rate risk with respect to such floating-rate debt. A 100 basis point increase in the variable interest rate component of our borrowings would increase our annual interest expense by approximately \$4 million or eight percent.

As of December 31, 2020, we have entered into an interest rate swap with a notional amount of \$166.2 million to manage the variability of cash flows in the interest rate payments associated with our existing LIBOR-based interest payments, effectively converting \$166.2 million of our floating rate debt to a fixed rate. In accordance with the terms of this instrument, we receive floating rate interest payments based upon three-month U.S. dollar LIBOR and in return are obligated to pay interest at a fixed rate of 3.79 percent until July 2023. The fair value of the interest rate swap was an asset (liability) of \$(8.9) million and \$(3.9) million at December 31, 2020 and 2019, respectively.

ITEM 8. FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA

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Ingevity Corporation Management's Report on Internal Control over Financial Reporting

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 Securities Exchange Act of 1934. 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 GAAP. The Company's internal control over financial reporting includes those policies and procedures that:

- i. pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the Company;
- ii. provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles and that receipts and expenditures of the Company are being made only in accordance with authorization of management and directors of the Company; and
- iii. provide reasonable assurance regarding prevention or timely detection of unauthorized acquisitions, 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.

Management assessed the effectiveness of the Company's internal control over financial reporting as of December 31, 2020, based on criteria set forth by the Committee of Sponsoring Organizations of the Treadway Commission (COSO) in *Internal Control-Integrated Framework* (2013). Based on its assessment and those criteria, management concluded that the Company maintained effective internal control over financial reporting as of December 31, 2020.

PricewaterhouseCoopers LLP, an independent registered public accounting firm, has audited the effectiveness of the Company's internal control over financial reporting as of December 31, 2020, as stated in their report, which is presented on the following page.

Date: February 19, 2021

By: /S/ JOHN C. FORTSON

John C. Fortson

President and Chief Executive Officer and Interim Chief

Financial Officer and Treasurer

Report of Independent Registered Public Accounting Firm

To the Board of Directors and Stockholders of Ingevity Corporation

Opinions on the Financial Statements and Internal Control over Financial Reporting

We have audited the accompanying consolidated balance sheets of Ingevity Corporation and its subsidiaries (the "Company") as of December 31, 2020 and 2019, and the related consolidated statements of operations, of comprehensive income (loss), of stockholders' equity and of cash flows for each of the three years in the period ended December 31, 2020, including the related notes and financial statement schedule listed in the index appearing under Item 15(a)ii (collectively referred to as the "consolidated financial statements"). We also have audited the Company's internal control over financial reporting as of December 31, 2020, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO).

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the financial position of the Company as of December 31, 2020 and 2019, and the results of its operations and its cash flows for each of the three years in the period ended December 31, 2020 in conformity with accounting principles generally accepted in the United States of America. Also in our opinion, the Company maintained, in all material respects, effective internal control over financial reporting as of December 31, 2020, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the COSO.

Change in Accounting Principle

As discussed in Note 14 to the consolidated financial statements, the Company changed the manner in which it accounts for leases in 2019.

Basis for Opinions

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

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

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

Definition and Limitations of Internal Control over Financial Reporting

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

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

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

Critical Audit Matters

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

Goodwill Impairment Assessment – Performance Chemicals Reporting Unit

As described in Notes 3 and 9 to the consolidated financial statements, the Company's consolidated goodwill balance and goodwill balance for the Performance Chemicals reporting unit were \$445.3 million and \$441.0 million, respectively, as of December 31, 2020. Management conducts a required annual review of goodwill for potential impairment at October 1, or sooner if events or changes in circumstances indicate that the fair value of a reporting unit is below its carrying value. If the carrying value of a reporting unit that includes goodwill exceeds its fair value, which is determined using both the income approach and market approach, goodwill is considered impaired. The income approach determines fair value based on a discounted cash flow model derived from a reporting unit's long-term forecasted cash flows. In performing the fair value analysis, management makes various judgments, estimates and assumptions, the most significant of which is the assumption related to revenue growth rates. The amount of impairment loss is measured as the difference between the carrying value and the fair value of a reporting unit but is limited to the total amount of goodwill allocated to a reporting unit.

The principal considerations for our determination that performing procedures relating to the goodwill impairment assessment of the Performance Chemicals reporting unit is a critical audit matter are (i) the significant judgment by management when determining the fair value measurement of the reporting unit, which led to (ii) a high degree of auditor judgment, subjectivity, and effort in performing procedures and evaluating management's significant assumption related to revenue growth rates used in the income approach.

Addressing the matter involved performing procedures and evaluating audit evidence in connection with forming our overall opinion on the consolidated financial statements. These procedures included testing the effectiveness of controls relating to management's goodwill impairment assessment for the reporting unit, including controls over the development of the revenue growth rates utilized in the income approach. These procedures also included, among others (i) testing management's process for determining the fair value measurement; (ii) evaluating the appropriateness of the discounted cash flow model; (iii) testing the completeness and accuracy of underlying data used in the model; and (iv) evaluating the reasonableness of the revenue growth rates used by management. Evaluating the revenue growth rates involved evaluating whether the assumption used by management was reasonable considering (i) the current and past performance of the reporting unit, (ii) the consistency with external market and industry data, and (iii) whether the assumption was consistent with evidence obtained in other areas of the audit.

/s/ PricewaterhouseCoopers LLP
Charlotte, North Carolina
February 19, 2021
We have served as the Company's auditor since 2015.

Consolidated Statements of Operations

	Years	En	ded Decemb	er 31	Ι,
In millions, except per share data	2020		2019		2018
Net sales	\$ 1,216.1	\$	1,292.9	\$	1,133.6
Cost of sales	 750.6		810.9		716.8
Gross profit	465.5		482.0		416.8
Selling, general, and administrative expenses	149.4		163.1		132.4
Research and technical expenses	22.6		19.7		21.5
Restructuring and other (income) charges, net	18.5		1.8		(0.5)
Acquisition-related costs	1.8		26.9		10.8
Other (income) expense, net	(4.1)		(4.3)		1.0
Interest expense	47.1		54.6		33.2
Interest income	(4.9)		(7.7)		(3.4)
Income (loss) before income taxes	235.1		227.9		221.8
Provision (benefit) for income taxes	53.7		44.2		40.0
Net income (loss)	181.4		183.7		181.8
Less: Net income (loss) attributable to noncontrolling interests	 				12.7
Net income (loss) attributable to Ingevity stockholders	\$ 181.4	\$	183.7	\$	169.1
Per share data					
Basic earnings (loss) per share attributable to Ingevity stockholders	\$ 4.39	\$	4.39	\$	4.02
Diluted earnings (loss) per share attributable to Ingevity stockholders	4.37		4.35		3.97

Consolidated Statements of Comprehensive Income (Loss)

	 Years	s Ende	d Decemb	er 31	,
In millions	2020	2	2019		2018
Net income (loss)	\$ 181.4	\$	183.7	\$	181.8
Other comprehensive income (loss), net of tax:					
Foreign currency adjustments:					
Foreign currency translation adjustment	23.9		15.6		(6.3)
Unrealized gain (loss) on net investment hedges, net of tax provision (benefit) of \$(2.7), \$0.7, and zero	 (9.0)		2.3		_
Total foreign currency adjustments, net of tax provision (benefit) of \$(2.7), \$0.7, and zero	14.9		17.9		(6.3)
Derivative instruments:					
Unrealized gain (loss), net of tax provision (benefit) of \$(1.3), \$(1.1), and \$0.4	(4.3)		(3.7)		1.3
Reclassifications of deferred derivative instruments (gain) loss, included in net income (loss), net of tax (provision) benefit of \$0.3, \$(0.1), and \$(0.3)	0.9		(0.2)		(0.9)
Total derivative instruments, net of tax provision (benefit) of (1.0) , (1.2) , and 0.1	(3.4)		(3.9)		0.4
Pension & other postretirement benefits:					
Unrealized actuarial gains (losses) and prior service (costs) credits, net of tax provision (benefit) of (0.6) , (0.4) , and (0.1)	(2.1)		(1.4)		(0.3)
Reclassifications of net actuarial and other (gain) loss, amortization of prior service cost, and settlement and curtailment (income) charges, included in net income, net of tax (provision) benefit of zero, zero, and \$0.1	 0.3		0.1		0.2
Total pension and other postretirement benefits, net of tax provision (benefit) of (0.6) , (0.4) , and zero	(1.8)		(1.3)		(0.1)
Other comprehensive income (loss), net of tax provision (benefit) of $\$(4.3)$, $\$(0.9)$, and $\$0.1$	9.7		12.7		(6.0)
Comprehensive income (loss)	 191.1		196.4		175.8
Less: Comprehensive income (loss) attributable to noncontrolling interests	_				12.7
Comprehensive income (loss) attributable to the Ingevity stockholders	\$ 191.1	\$	196.4	\$	163.1

Consolidated Balance Sheets

	 Decem	ber 3	1,
In millions, except share and par value data	2020		2019
Assets			
Cash and cash equivalents	\$ 257.7	\$	56.5
Accounts receivable, net of allowance for credit losses of \$1.9 million - 2020 and \$0.5 million - 2019	148.0		150.0
Inventories, net	189.0		212.5
Prepaid and other current assets	 34.0		44.2
Current assets	628.7		463.2
Property, plant and equipment, net	703.6		664.7
Operating lease assets, net	49.1		53.4
Goodwill	445.3		436.4
Other intangibles, net	373.3		396.2
Deferred income taxes	8.1		5.0
Restricted investment, net of allowance for credit losses of \$0.9 million - 2020	73.6		72.6
Other assets	 52.8		50.2
Total Assets	\$ 2,334.5	\$	2,141.7
Liabilities			
Accounts payable	\$ 104.2	\$	99.1
Accrued expenses	46.6		33.3
Accrued payroll and employee benefits	25.1		28.2
Current operating lease liabilities	16.2		17.1
Notes payable and current maturities of long-term debt	26.0		22.5
Income taxes payable	5.3		15.3
Current liabilities	223.4		215.5
Long-term debt including finance lease obligations	1,267.4		1,228.4
Noncurrent operating lease liabilities	34.7		36.7
Deferred income taxes	117.0		100.3
Other liabilities	49.9		30.0
Total Liabilities	1,692.4		1,610.9
Commitments and contingencies (Note 19)			
Equity			
Preferred stock (par value \$0.01 per share; 50,000,000 shares authorized; zero issued and outstanding at 2020 and 2019)	_		_
Common stock (par value \$0.01 per share; 300,000,000 shares authorized; 42,912,846 and 42,675,171 issued and 40,509,997 and 41,826,136 outstanding at 2020 and 2019, respectively)	0.4		0.4
Additional paid-in capital	121.3		112.8
Retained earnings	678.0		497.2
Accumulated other comprehensive income (loss)	4.7		(5.0)
Treasury stock, common stock, at cost (2,402,849 and 849,035 shares at 2020 and 2019, respectively)	(162.3)		(74.6)
Total Equity	642.1		530.8
Total Liabilities and Equity	\$ 2,334.5	\$	2,141.7

INGEVITY CORPORATION Consolidated Statements of Stockholders' Equity

Ingevity Stockholders'

			9					
	Common Stock	ı Stock						
1	10		Additional paid-in		Accumulated other comprehensive	Treasury	Noncontrolling	Total
In mutons, snares in mousands	Shares	Amou	2	ear 	mcome (10	stoc	Interests	
Balance at December 31, 2017	42,208.9	\$ 0.4	\$ 140.1	1 \$ 142.8	\$ (11.7)	\$ (7.7)		\$ 277.9
Net income (loss)	1		I	- 169.1	1	1	12.7	181.8
Other comprehensive income (loss)			1		(0.0)	1		(0.9)
Common stock issued	116.7		I			I		
Exercise of stock options, net	6.3		0.2	7	1	I	1	0.2
Tax payments related to vested restricted stock units			I		1	(2.5)		(2.5)
Share repurchase program	I		ı	1	1	(47.4)		(47.4)
Noncontrolling interest distributions			I		1	I	(15.3)	(15.3)
Share-based compensation plans			12.3	3		1.8		14.1
Adoption of accounting standard			I	- 1.6	1		1	1.6
Acquisition of noncontrolling interest	1		(54.3)	3)	1	1	(11.4)	(65.7)
Balance at December 31, 2018	42,331.9	\$ 0.4	\$ 98.3	3 \$ 313.5	\$ (17.7)	\$ (55.8)	- - - - -	\$ 338.7
Net income (loss)			ı	- 183.7		I		183.7
Other comprehensive income (loss)			I		12.7			12.7
Common stock issued	283.3		1		1	1		
Exercise of stock options, net	0.09		1.7					1.7
Tax payments related to vested restricted stock units			ı		1	(14.3)		(14.3)
Share repurchase program			I			(6.4)		(6.4)
Share-based compensation plans			12.8			1.9		14.7
Balance at December 31, 2019	42,675.2	\$ 0.4	\$ 112.8	8 \$ 497.2	(5.0)	\$ (74.6)	\$	\$ 530.8
Net income (loss)			1	- 181.4				181.4
Other comprehensive income (loss)			I		7.6			6.7
Common stock issued	174.6							
Exercise of stock options, net	63.0		1.9					1.9
Tax payments related to vested restricted stock units			ı			(3.2)		(3.2)
Share repurchase program			I			(88.0)		(88.0)
Share-based compensation plans	1		9.9	- 9	I	3.5	I	10.1
Adoption of accounting standard				(0.6)				(0.0)
Balance at December 31, 2020	42,912.8	\$ 0.4	\$ 121.3	3 \$ 678.0	\$ 4.7	\$ (162.3)	<u>\$</u>	\$ 642.1

The accompanying notes are an integral part of these financial statements.

Consolidated Statements of Cash Flows

	Years Ended December 31,					
In millions		2020	2019		2018	
Cash provided by (used in) operating activities:						
Net income (loss)	\$	181.4	\$	183.7	\$	181.8
Adjustments to reconcile net income (loss) to cash provided by operating activities:						
Depreciation and amortization		100.2		85.0		57.0
Non cash operating lease costs		18.0		19.9		_
Deferred income taxes		16.2		14.8		0.9
Disposal/impairment of assets		0.6		1.4		0.9
Restructuring and other (income) charges, net		1.7		2.2		0.1
Share-based compensation		8.4		12.3		12.5
Pension and other postretirement benefit costs		1.9		1.5		2.0
Other non-cash items		15.3		10.1		15.9
Changes in operating assets and liabilities, net of effect of acquisitions:						
Accounts receivable, net		2.8		(15.3)		(3.0)
Inventories, net		26.2		0.5		(26.9)
Prepaid and other current assets		2.1		0.1		(6.8)
Planned major maintenance outage		(7.0)		(8.4)		(7.0)
Accounts payable		9.4		(6.2)		5.7
Accrued expenses		13.4		(5.9)		13.1
Accrued payroll and employee benefits		(3.3)		(14.4)		3.0
Income taxes		(9.6)		14.7		5.0
Operating leases		(18.5)		(19.8)		_
Pension contribution		_		_		(1.6)
Changes in all other operating assets and liabilities, net		(6.8)		(0.5)		(0.6)
Net cash provided by (used in) operating activities	\$	352.4	\$	275.7	\$	252.0
Cash provided by (used in) investing activities:						
Capital expenditures		(82.1)		(114.8)		(93.9)
Finance lease expenditures		(23.8)		_		_
Payments for acquired businesses, net of cash acquired		_		(537.9)		(315.5)
Sale of equity securities		_		_		1.1
Restricted investment		(2.0)		(2.0)		(2.0)
Other investing activities, net		(2.7)		(3.6)		(4.1)
Net cash provided by (used in) investing activities	\$	(110.6)	\$	(658.3)	\$	(414.4)

Consolidated Statements of Cash Flows (continued)

Years Ended December 31, In millions 2020 2019 2018 Cash provided by (used in) financing activities: Proceeds from revolving credit facility 346.1 797.7 Proceeds from long-term borrowings 550.0 375.0 300.0 Payments on revolving credit facility (477.3)(666.4)Payments on long-term borrowings (389.1)(122.5)Debt issuance costs (11.0)(2.4)(7.1)Financing lease obligations, net 23.1 Borrowings (repayments) of notes payable and other short-term borrowings, net 2.1 3.9 (4.4)Tax payments related to withholdings on vested equity awards (3.2)(14.3)(2.5)Proceeds and withholdings from share-based compensation plans, net 3.6 4.1 2.1 Repurchases of common stock under publicly announced plan (88.0)(47.4)(6.4)Acquisition of noncontrolling interest (80.0)Noncontrolling interest distributions (15.3)Other financing activities, net 2.3 Net cash provided by (used in) financing activities \$ (50.2) \$ 369.2 153.7 \$ 191.6 Increase (decrease) in cash, cash equivalents, and restricted cash (13.4)(8.7)2.2 0.2 Effect of exchange rate changes on cash (1.4)Change in cash, cash equivalents, and restricted cash 193.8 (13.2)(10.1)Cash, cash equivalents, and restricted cash at beginning of period 64.6 77.8 87.9 258.4 Cash, cash equivalents, and restricted cash at end of period (1) \$ 64.6 77.8

⁽¹⁾ Includes restricted cash of \$0.7 million, \$8.1 million, and \$0.3 million and cash and cash equivalents of \$257.7 million, \$56.5 million, and \$77.5 million for the years ended December 31, 2020, 2019, and 2018, respectively. Restricted cash is included within "Prepaid and other current assets" within the consolidated balance sheets.

Supplemental cash flow information:			
Cash paid for interest, net of capitalized interest	\$ 39.6 \$	48.0 \$	26.0
Cash paid for income taxes, net of refunds	46.6	14.9	34.8
Purchases of property, plant and equipment in accounts payable	2.7	7.6	8.9
Leased assets obtained in exchange for new finance lease liabilities	23.8	_	_
Leased assets obtained in exchange for new operating lease liabilities	27.2	5.3	_

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Note 1: Background

Description of Business

Ingevity Corporation ("Ingevity," "the company," "we," "us" or "our") provides products and technologies that purify, protect, and enhance the world around us. Through a team of talented and experienced people, we develop, manufacture, and bring to market solutions that help customers solve complex problems and make the world more sustainable. We report in two business segments: Performance Materials and Performance Chemicals.

Our Performance Materials segment consists of our automotive technologies and process purification product lines. Performance Materials manufactures products in the form of powder, granular, extruded pellets, extruded honeycombs, and activated carbon sheets. Automotive technologies products are sold into the gasoline vapor emission control applications within the automotive industry, while process purification products are sold into the food, water, beverage, and chemical purification industries.

Our Performance Chemicals segment consists of our pavement technologies, oilfield technologies, industrial specialties, and engineered polymers product lines. Performance Chemicals manufactures products derived from crude tall oil ("CTO") and lignin extracted from the kraft pulping process as well as caprolactone monomers and derivatives derived from cyclohexanone and hydrogen peroxide. Performance Chemicals products serve as critical inputs used in a variety of high performance applications, including warm mix paving, pavement preservation, and pavement reconstruction and recycling (pavement technologies product line), oil well service additives and oil production and downstream application (oilfield technologies product line), adhesives, agrochemicals, lubricants, printing inks, and industrial intermediates (industrial specialties product line), coatings, resins, elastomers, adhesives, bio-plastics, and medical devices (engineered polymers product line).

Basis of Consolidation and Presentation

The accompanying consolidated financial statements of Ingevity were prepared in accordance with accounting principles generally accepted in the United States of America ("U.S. GAAP"). The significant accounting policies described in Note 3, together with the other notes that follow, are an integral part of the consolidated financial statements.

The consolidated financial statements include the accounts of Ingevity and subsidiaries in which a controlling interest is maintained. If Ingevity's ownership is less than 100 percent, the outside stockholders' interests are shown as noncontrolling interests. In 2018, our noncontrolling interest represented the 30 percent ownership interest held by a third-party U.S. based company in our consolidated Purification Cellutions, LLC legal entity, now known as Ingevity Georgia, LLC. See Note 13 for information regarding our acquisition of the 30 percent interest in Purification Cellutions, LLC on August 1, 2018.

The preparation of the consolidated financial statements requires management to make estimates and assumptions with respect to the reported amounts of assets, liabilities, revenue and expenses and the disclosure of contingent assets and liabilities. Actual results could differ from these estimates. During the year ended December 31, 2020, and subsequent to this date, there have been significant changes to the global economic situation and to public securities markets as a consequence of the novel strain of coronavirus ("COVID-19") pandemic. It is reasonably possible that this could cause changes to estimates as a result of the financial circumstances of the markets in which we operate, the price of our publicly traded equity in comparison to the carrying value, and the health of the global economy. Such changes to estimates could potentially result in impacts that would be material to the consolidated financial statements. While there was not a material impact to our consolidated financial statements as of and for the year ended December 31, 2020, our future assessment of the magnitude and duration of COVID-19, as well as other factors, could result in material impacts to our consolidated financial statements in future reporting periods.

Note 2: Coronavirus Pandemic

On March 11, 2020, the World Health Organization declared COVID-19 a global pandemic and recommended containment and mitigation measures worldwide. COVID-19 has led to adverse impacts on the U.S. and global economies, and created uncertainty regarding potential impacts to our supply chain, operations, and customer demand. We have been classified as an essential business in the jurisdictions that have made this determination to date, allowing us to continue operations. However, our facilities - as well as the operations of our suppliers, customers, and third-party sales agents and distributors -

have been, and will continue to be, disrupted by governmental and private sector responses to COVID-19. This includes business shutdowns, work-from-home orders and social distancing protocols, travel or health-related restrictions, as well as quarantines, self-isolations, and disruptions to transportation channels.

On March 27, 2020, the U.S. government enacted the Coronavirus Aid, Relief, and Economic Security Act ("CARES Act"), which includes modifications to the limitation on business interest expense and net operating loss provisions, and provided a payment delay of the employer's portion of U.S. Social Security taxes during 2020, after the date of enactment. We deferred \$4.7 million of employer U.S. Social Security taxes due in 2020, with 50 percent due by December 31, 2021 and the remaining 50 percent by December 31, 2022. The CARES Act is not expected to have a material impact on our consolidated financial statements.

In order to strengthen our short-term liquidity and to ensure financial flexibility, in March 2020, we drew down \$250 million from our revolving credit facility as a precautionary measure, all of which was repaid by year end. We also implemented work-from-home policies and protocols for the majority of our global salaried workforce, as well as social distancing practices to ensure the safety of our employees at our manufacturing facilities. During the second quarter, we decreased production at some of our U.S. and China based manufacturing plants due to COVID-19 customer demand impacts and implemented a cost reduction initiative further described in Note 16. During the third quarter of 2020, we resumed normal production at all manufacturing plants as customer demand improved.

While the disruptions caused by the pandemic are currently expected to be temporary, there is uncertainty regarding the virus's duration and severity and the effectiveness of vaccines. COVID-19 has impacted, and will continue to impact, our results of operations, financial position, and liquidity.

Note 3: Summary of Significant Accounting Policies

Estimates and assumptions: We are required to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosures of contingent assets and liabilities at the date of the financial statements and the reported amounts of revenue and expenses during the reporting period. Actual results are likely to differ from those estimates, but we do not believe such differences will materially affect our financial position, results of operations or cash flows.

Cash equivalents: Highly liquid securities with an original maturity of three months or less are considered to be cash equivalents.

Accounts receivable and allowance for credit losses: Accounts receivable, net on the consolidated balance sheets are comprised of trade receivables less allowances for credit losses. Trade receivables consist of amounts owed to Ingevity from customer sales and are recorded at the invoiced amounts when revenue is recognized and generally do not bear interest. The allowance for credit losses is our best estimate of the amount of probable loss in the existing accounts receivable. We determine the allowance based on our expected of future credit losses which in part is based on historical write-off experience, current collection trends, and external business factors such as economic factors, including regional bankruptcy rates, and political factors. Past due balances over a specified amount are reviewed individually for collectability. Account balances are charged off against the allowance when it is probable that the receivable will not be recovered. Allowance for credit losses at December 31, 2020 and 2019, was \$1.9 million and \$0.5 million, respectively.

Concentration of credit risk: The financial instruments that potentially subject Ingevity to concentrations of credit risk are accounts receivable. We limit our credit risk by performing ongoing credit evaluations and, when necessary, requiring letters of credit, guarantees, or collateral. We had accounts receivable from our largest customer of \$4.7 million and \$3.2 million as of December 31, 2020 and 2019, respectively. Sales to this customer, which are included in the Performance Materials segment, were approximately six percent, five percent, and three percent of total net sales for each of the years ended December 31, 2020, 2019, and 2018, respectively. No customers individually accounted for greater than 10 percent of Ingevity's consolidated Net sales.

Inventories, net: Inventories held are valued at lower of cost or net realizable value, except for inventories determined using the the last-in, first-out method ("LIFO"), which are valued at the lower of LIFO or market cost. The value of our U.S. inventories is determined using LIFO for substantially all raw materials, finished goods, and production materials. The value of all other inventories, including stores and supplies inventories and inventories of non-U.S. operations, is determined by the first-in, first-out ("FIFO") or average costs methods. Elements of cost in inventories include raw materials, direct labor, and manufacturing overhead. We routinely assess inventory for both potential obsolescence and potential declines in anticipated selling prices, to derive a market value for the inventory on hand. This review also includes an analysis of potentially obsolete,

unmarketable, slow moving, or overvalued inventory. If necessary, we will impair any inventories by an amount equal to the difference between the value of the held inventory (i.e. cost) and its estimated net realizable value for FIFO and average cost inventories, and market value for LIFO inventories.

Property, plant, and equipment: Owned assets are recorded at cost. Also included in the cost of these assets is interest on funds borrowed during the construction period. When assets are sold, retired or disposed of, their cost and related accumulated depreciation are removed from the consolidated balance sheet and any resulting gain or loss is reflected in cost of sales. Repair and maintenance costs that materially add to the value of the asset or prolong its useful life are capitalized and depreciated based on the extension of the useful life; general costs of maintenance and repairs are charged to expense.

Repair and maintenance costs: We expense routine repair and maintenance costs as we incur them. We defer expenses incurred during planned major maintenance activities and record these amounts to Other assets on our consolidated balance sheet. Deferred amounts are recognized as expense ratably, over the shorter of the estimated interval until the next major maintenance activity or the life of the deferred item. The cash outflows related to these costs are included in operating activities in the consolidated statement of cash flows. The timing of this maintenance can vary by manufacturing plant and has a significant impact on our results of operations in the period performed primarily due to lost production during the maintenance period.

Depreciation: The cost of property, plant and equipment is depreciated, utilizing the straight-line method, over the estimated useful lives of the assets, the majority of which range from 20 to 40 years for buildings and leasehold improvements and 5 to 30 years for machinery and equipment. The following table provides the detail behind the useful lives and proportion of our machinery and equipment ("M&E") in each useful life category.

Percent of M&E Cost	Depreciable Life in Years	Types of Assets
50	20	Production vessels and kilns, storage tanks, piping
11	15	Control systems, instrumentation, metering equipment
7	25 to 30	Blending equipment, storage tanks, piping, shipping equipment and platforms, safety equipment
20	5 to 10	Production control system equipment and hardware, laboratory testing equipment
3	40	Machinery & equipment support structures and foundations
9	Various	Various

Leases: We lease a variety of assets for use in our operations that are classified as operating leases. At contract inception, we determine that a lease exists if the contract conveys the right to control an identified asset for a period of time in exchange for consideration. Control is considered to exist when the lessee has the right to obtain substantially all of the economic benefits from the use of an identified asset as well as the right to direct the use of that asset. If a contract is considered to be a lease, we recognize a lease liability based on the present value of the future lease payments, with an offsetting entry to recognize a right-of-use asset. As a majority of our leases do not provide an implicit rate within the lease, an incremental borrowing rate is used which is based on information available at the commencement date. The determination of the incremental borrowing rate for each individual lease was impacted by the following assumptions: lease term, currency, and the economic environment for the physical location of the leased asset.

Our operating leases principally relate to the following leased asset classes:

Leased Asset Class	Remaining Lease Term
Administrative offices	1 to 15 years
Manufacturing buildings	9 to 28 years
Manufacturing and office equipment	1 to 10 years
Warehousing and storage facilities	5 to 10 years
Vehicles	3 to 6 years
Rail cars	1 to 8 years

Leases with an initial term of 12 months or less are not recorded on the balance sheet. Lease expense is recognized on a straight-line basis over the expected lease term. Some of our leases include options to extend the lease term at our sole

discretion. We account for lease and non-lease components together as a single component for all lease asset classes. The depreciable life of assets and leasehold improvements is limited by the expected lease term, unless there is a transfer of title or purchase option reasonably certain of exercise. Certain leases provide for escalation of the lease payments, as well as maintenance costs and taxes increase.

Impairment of long-lived assets: We periodically evaluate whether current events or circumstances indicate that the carrying value of our long-lived assets, including intangible assets, to be held and used may not be recoverable. If such circumstances are determined to exist, an estimate of undiscounted future cash flows produced by the long-lived asset, or the appropriate grouping of assets, is compared to carrying value to determine whether impairment exists.

If an asset is determined to be impaired, the loss is measured based on quoted market prices in active markets, if available. If quoted market prices are not available, the estimate of fair value is based on various valuation techniques, including a discounted value of estimated future cash flows. We report an asset to be disposed of at the lower of its carrying value or its estimated net realizable value.

Goodwill and other intangible assets: Goodwill represents the excess of cost of an acquired business over the fair value of the identifiable tangible and intangible assets acquired and liabilities assumed in a business combination. We conduct a required annual review of goodwill for potential impairment at October 1, or sooner if events or changes in circumstances indicate that the fair value of a reporting unit is below its carrying value. Our reporting units are our operating segments, i.e. Performance Chemicals and Performance Materials. If the carrying value of a reporting unit that includes goodwill exceeds its fair value, which is determined using both the income approach and market approach, goodwill is considered impaired. The income approach determines fair value based on discounted cash flow model derived from a reporting unit's long-term forecasted cash flows. The market approach determines fair value based on the application of earnings multiples of comparable companies to projected earnings of the reporting unit. The amount of impairment loss is measured as the difference between the carrying value and the fair value of a reporting unit but is limited to the total amount of goodwill allocated to the reporting unit. In performing the fair value analysis, management makes various judgments, estimates and assumptions, the most significant of which is the assumption related to revenue growth rates.

The factors we considered in developing our estimates and projections for cash flows include, but are not limited to, the following: (i) macroeconomic conditions; (ii) industry and market considerations; (iii) costs, such as increases in raw materials, labor, or other costs; (iv) our overall financial performance; and, (v) other relevant entity-specific events that impact our reporting units.

The determination of whether goodwill is impaired involves a significant level of judgment in the assumptions underlying the approach used to determine the estimated fair values of our reporting units. We believe that the estimates and assumptions used in our impairment assessment are reasonable; however, these assumptions are judgmental and variations in any assumptions could result in materially different calculations of fair value. We will continue to evaluate goodwill on an annual basis as of October 1, and whenever events or changes in circumstances, such as significant adverse changes in operating results, market conditions, or changes in management's business strategy indicate that there may be a probable indicator of impairment. It is possible that the assumptions used by management related to the evaluation may change or that actual results may vary significantly from management's estimates.

Our fiscal year 2020 annual goodwill impairment test was performed as of October 1, 2020. We determined that the fair value of both our reporting units were substantially in excess of their carrying value and therefore concluded that no goodwill impairment existed. There were no events or circumstances indicating that goodwill might be impaired as of December 31, 2020. No impairment charges have been recognized historically.

Other intangible assets are comprised of finite-lived intangible assets consisting primarily of brands (representing trademarks, trade names and know-how), customer contracts and relationships, and developed technology. Other intangible assets are amortized over their estimated useful lives which range from 5 to 20 years. See Note 9 for additional information.

Capitalized software: Capitalized software for internal use is included in Other assets on the consolidated balance sheets. Amounts capitalized are presented in Capital expenditures on our consolidated statements of cash flow. Capitalized software is amortized using the straight-line over the estimated useful lives ranging from 1 to 10 years. Amortization is recorded to Costs of sales on our consolidated statements of operations for software directly used in the production of inventory and Selling, general, and administrative expenses on our consolidated statements of operations for software used for non-production related activities.

Legal liabilities: We recognize a liability for legal contingencies when a loss is probable and reasonably estimable. Third-party fees for legal services are expensed as incurred.

Revenue recognition: Our revenue is derived from contracts with customers, and substantially all our revenue is recognized when products are either shipped from our manufacturing and warehousing facilities or delivered to the customer. Revenue, net of returns and customer incentives, are based on the sale of manufactured products. Revenues are recognized when performance obligations under the terms of a contract with our customer are satisfied; generally, this occurs with the transfer of control of our products. For certain limited contracts, where we are producing goods with no alternative use and for which we have an enforceable right to payment for performance completed to date, we are recognizing revenue as goods are manufactured, rather than when they are shipped. Revenues are presented as Net sales on the consolidated statements of operations to the consolidated financial statements.

Since Net sales are derived from product sales only, we have disaggregated our Net sales by our product lines within each reportable segment. Net sales are measured as the amount of consideration we expect to receive in exchange for transferring goods. Sales, value add, and other taxes we collect concurrent with revenue-producing activities are excluded from revenue. Sales returns and allowances are not a normal practice in the industry and are not significant. Certain customers may receive cash-based incentives, including discounts and volume rebates, which are accounted for as variable consideration and included in Net sales. Shipping and handling fees billed to customers are included with Net sales. If we pay for the freight and shipping, we recognize the cost when control of the product has transferred to the customer as an expense in Cost of sales on the consolidated statements of operations. Although very rare, from time to time we incur expenses to obtain a sales contract. In these cases, if these costs are for orders that are fulfilled in one year or less, we expense these costs as they are incurred. Payment terms with our customers are typically in the range of zero to sixty days. Because the period between when we transfer a promised good to a customer and when the customer pays for that good will be one year or less, we elect not to adjust the promised amount of consideration for the effects of any financing component, as it is not significant.

Cost of sales: Costs primarily consists of the cost of inventory sold and other production related costs. These costs include raw materials, direct labor, manufacturing overhead, packaging costs and maintenance costs. Shipping and handling costs are also recorded to Cost of sales.

Selling, general, and administrative expenses: Costs are expensed as incurred and primarily include employee compensation costs related to sales and office personnel, office expenses, and other expenses not directly related to our manufacturing operations. Costs also include advertising and promotional costs.

Research and technical expenses: Cost are expensed as incurred and primarily include employee compensation, technical equipment costs and material testing and innovation related expenses.

Royalty expense: Our Performance Materials and Performance Chemicals segments have licensing agreements with third parties requiring us to pay royalties for certain technologies we use in the manufacturing of our products. Royalty expense is recognized as incurred and recorded to Cost of sales on our consolidated statements of operations.

Restructuring and other (income) charges, net: We continually perform strategic reviews and assess the return on our operations which sometimes results in a plan to restructure the business. The cost and benefit of these strategic restructuring initiatives are recorded as restructuring and other (income) charges, net recorded within Restructuring and other (income) charges, net on our consolidated statement of operations. These costs are excluded from our operating segment results.

We record an accrual for severance and other non-recurring costs under the provisions of the relevant accounting guidance. Additionally, in some restructuring plans write-downs of long-lived assets may occur. Two types of assets are impacted: assets to be disposed of by sale and assets to be abandoned. Assets to be disposed of by sale are measured at the lower of carrying amount or estimated net proceeds from the sale. Assets to be abandoned with no remaining future service potential are written down to amounts expected to be recovered. The useful lives of assets to be abandoned that have a remaining future service potential are adjusted and depreciation is recorded over the adjusted useful life.

Income taxes: We are subject to income taxes in the U.S. and numerous foreign jurisdictions, including China and the United Kingdom. The provision for income taxes includes income taxes paid, currently payable or receivable, and deferred taxes. We follow the asset and liability method of accounting for income taxes in accordance with current accounting standards regarding the accounting for income taxes. Under this method, deferred income taxes are recognized based upon the temporary differences between the financial reporting and tax bases of assets and liabilities and are measured using the enacted tax rates and laws in effect at the time the underlying assets or liabilities are recovered or settled. The ability to realize deferred tax assets

is evaluated through the forecasting of taxable income, historical and projected future operating results, the reversal of existing temporary differences, and the availability of tax planning strategies. Valuation allowances are recognized to reduce deferred tax assets when it is more-likely-than-not that a tax benefit will not be realized. We do not provide income taxes on undistributed earnings of consolidated foreign subsidiaries as it is our intention that such earnings will remain invested in those companies.

We recognize income tax positions that are more-likely-than-not to be realized and accrue interest related to unrecognized income tax positions, which is included as a component of the income tax provision, on the consolidated statements of operations.

Pension and postretirement benefits: We provide both qualified and non-qualified pension and postretirement benefit plans to our employees. The expense related to the current employees of Ingevity as well as the expense related to retirees of Ingevity are included in the consolidated financial statements. The costs (or benefits) and obligations related to these benefits reflect key assumptions related to general economic conditions, including interest (discount) rates, healthcare cost trend rates and expected return on plan assets. The costs (or benefits) and obligations for these benefit programs are also affected by other assumptions, such as average retirement age, mortality, employee turnover, and plan participation. To the extent our plans' actual experience, as influenced by changing economic and financial market conditions or by changes to our own plans' demographics, differs from these assumptions, the costs and obligations for providing these benefits, as well as the plans' funding requirements, could increase or decrease. When actual results differ from our assumptions, the difference is typically recognized over future periods. In addition, the unrealized gains and losses related to our pension and postretirement benefit obligations may also affect periodic benefit costs (or benefits) in future periods. See Note 15 for additional information.

Share-based compensation: We recognize compensation expense in our consolidated financial statements for all share-based compensation arrangements. Share-based compensation cost is measured at the date of grant, based on the fair value of the award and expense is recognized over the grantee's requisite service period; forfeitures are recognized as they occur. We calculate the fair value of our stock options using the Black-Scholes option pricing model. The fair value of restricted stock units ("RSU"s), non-employee director deferred stock units ("DSU"s) and performance-based restricted stock units ("PSU"s) is determined using our closing stock price on the day of the grant. Substantially all compensation expense related to share-based awards is recorded as a component of Selling, general and administrative expenses in the consolidated statements of operations. See Note 12 for additional information.

Operating segments: Ingevity's operating segments are Performance Materials and Performance Chemicals. Our operating segments were determined based upon the nature of the products produced, the nature of the production process, the type of customer for the products, the similarity of economic characteristics, and the manner in which management reviews results. Ingevity's chief operating decision maker evaluates the business at the segment level when making decisions about allocating resources and assessing performance of Ingevity as a whole. We evaluate sales in a format consistent with our reportable segments: (1) Performance Materials, which includes wood-based, chemically activated carbon products and (2) Performance Chemicals, which includes specialty pine-based chemical co-products derived from the kraft pulping process and caprolactone monomers and derivatives derived from cyclohexanone and hydrogen peroxide. Each segment operates as a portfolio of various end uses for the relevant raw material used in that segment. Business decisions are made and performance is generally measured based upon the total mix of end uses each raw material is being directed at in the segment. See Note 20 for additional information.

Fair Value Measurements: We have categorized our assets and liabilities that are recorded at fair value, based on the priority of the inputs to the valuation technique, into a three-level fair value hierarchy. The fair value hierarchy gives the highest priority to quoted prices in active markets for identical assets or liabilities (Level 1) and the lowest priority to unobservable inputs (Level 3). If the inputs used to measure the assets and liabilities fall within different levels of the hierarchy, the categorization is based on the lowest level input that is significant to the fair value measurement of the instrument. The carrying value of our financial instruments: cash and cash equivalents, other receivables, other payables and accrued liabilities, approximate their fair values due to the short-term nature of these financial instruments. See Note 6 for more information regarding the fair value measurements of our assets and liabilities, and Note 10 for more information regarding the fair value measurements and risk management activities.

Derivative financial instruments: Ingevity's operations are exposed to market risks, such as the impact of changes of interest rates on our floating rate debt, changes in foreign currency exchange rates, and commodity prices due to transactions denominated in a variety of foreign currencies and purchases of certain commoditized raw materials and inputs. Changes in these rates and prices may have an impact on Ingevity's future cash flow and earnings. We formally document all relationships

between the derivative financial instrument and hedged item, as well as the risk management objective and strategy for undertaking various hedge transactions. We do not hold or issue derivative financial instruments for speculative or trading purposes. We enter into derivative financial instruments which are governed by policies, procedures, and internal processes set forth by our Board of Directors.

Our risk management program also addresses counterparty credit risk by selecting only major financial institutions with investment grade ratings. Once the derivative financial instrument is entered into, we continuously monitor the financial institutions' credit ratings and our credit risk exposure held by the financial institution. When appropriate, we reallocate exposures across multiple financial institutions to limit credit risk. If a counterparty fails to fulfill its performance obligations under the derivative financial instrument, then Ingevity is exposed to credit risk equal to the fair value of the financial instrument. Derivative assets and liabilities are recorded on our consolidated balance sheets at fair value and are presented on a gross basis. Due to our proactive mitigation of these potential credit risks, we anticipate performance by our counterparties to these contracts and therefore no material loss is expected. In order to mitigate the impact of market risks we have entered into both net investment hedges as well as cash flow hedges.

Cash Flow Hedges: Cash flow hedges are derivative financial instruments designated as and used to hedge the exposure to variability in expected future cash flows that are attributable to a particular risk. The derivative financial instruments that are designated and qualify as a cash flow hedge are recorded on the balance sheet at fair value and the changes in fair value of these hedging instruments are offset in part or in whole by corresponding changes in the anticipated cash flows of the underlying exposures being hedged. The gains and losses arising from qualifying hedging instruments are reported as a component of Accumulated other comprehensive income (loss) ("AOCI") located in the consolidated balance sheets and reclassification gain or losses of the hedge from AOCI are recorded in the same financial statement caption on the consolidated statements of operations as the hedged item. For example, designated cash flow hedges entered to minimize foreign currency exchange risk of forecasted revenue transactions are recorded to Net sales on the consolidated statements of operations when the forecasted transaction occurs. Designated commodity cash flow hedges gains or losses recorded in AOCI are recognized in Cost of sales on the consolidated statements of operations when the inventory is sold. See Note 10 for more information regarding our cash flow hedges.

Net Investment Hedges: Net investment hedges are defined as derivative or non-derivative instruments designated as and used to hedge the foreign currency exposure of the net investment in certain foreign operations. The net of the change in the hedge instrument and the item being hedged against for qualifying net investment hedges is reported as a component of the foreign currency adjustments ("CTA") within Accumulated other comprehensive income ("AOCI") on the consolidated balance sheet. The gains (losses) on net investment hedges are reclassified to earnings only when the related CTA are required to be reclassified, usually upon sale or liquidation of the investment. See Note 10 for more information regarding our net investment hedges.

Noncontrolling interests: When our ownership in a consolidated legal entity is less than 100 percent, the outside stockholders' interests are shown as noncontrolling interests. Our noncontrolling interests for the year ended December 31, 2018, represented the 30 percent ownership interest held by a third-party U.S. based company in our consolidated Purification Cellutions, LLC legal entity, as further discussed in Note 1.

Treasury stock: We record shares of common stock repurchased at cost as treasury stock, resulting in a reduction of stockholders' equity in the consolidated balance sheets. When the treasury shares are contributed under our employee benefit plans or issued for option exercises, we use a first-in, first-out ("FIFO") method for determining cost. The difference between the cost of the shares and the market price at the time of contribution to an employee benefit plan is added to or deducted from Additional paid-in capital on the consolidated balance sheets.

Translation of foreign currencies: The local currency is the functional currency for all of Ingevity's significant operations outside the U.S. consisting primarily of the euro, the Japanese yen, the pound sterling and the Chinese renminbi. The assets and liabilities of Ingevity's foreign subsidiaries are translated into U.S. dollars using period-end exchange rates, and adjustments resulting from these financial statement translations are included in Accumulated other comprehensive income (loss) in the consolidated balance sheets. Revenues and expenses are translated at average rates prevailing during each period.

Business combinations: We account for business combinations in accordance with ASC 805 "Business Combinations" which requires, among other things, the acquiring entity in a business combination to recognize the fair value of the assets

acquired and liabilities assumed; the recognition of Acquisition-related costs in the consolidated statements of operations; the recognition of Restructuring and other (income) charges, net in the consolidated statements of operations for which the acquirer becomes obligated after the acquisition date; and contingent purchase consideration to be recognized at fair value on the acquisition date with subsequent adjustments recognized in the consolidated statement of operations. We generally use third-party qualified consultants to assist management in determining the fair value of assets acquired and liabilities assumed. This includes, when necessary, assistance with the determination of lives and valuation of tangible property, plant, and equipment and identifiable intangibles, assisting management in determining the fair value of obligations associated with employee related liabilities and assisting management in assessing obligations associated with legal and environmental claims.

The fair value assigned to identifiable intangible assets acquired are determined primarily by using an income approach, which is based on assumptions and estimates made by management. Significant assumptions utilized in the income approach are the attrition rate, growth rate, and the discount rate. These assumptions are based on company specific information and projections, which are not observable in the market and are therefore considered Level 2 and Level 3 measurements. The excess of the purchase price over the fair value of the identified assets and liabilities is recorded as goodwill. Based on the acquired business' end markets and products as well as how the chief operating decision maker will review the business results determines the most appropriate operating segment for which to integrate the acquired business. Goodwill acquired, if any, is allocated to the reporting unit within or at the operating segment for which the acquired business will be integrated. Selection of the appropriate reporting unit is based on the level at which discrete financial information is available and reviewed by business management post integration. Operating results of the acquired entity are reflected in the consolidated financial statements from date of acquisition.

Reclassifications: Certain prior year amounts have been reclassified to conform with current year's presentation.

Note 4: New Accounting Guidance

The Financial Accounting Standards Board ("FASB") Accounting Standards Codification ("ASC" or "Codification") is the sole source of authoritative GAAP other than SEC issued rules and regulations that apply only to SEC registrants. The FASB issues an Accounting Standards Update ("ASU") to communicate changes to the Codification. We consider the applicability and impact of all ASUs. ASUs not listed below were assessed and determined to be either not applicable or are not expected to have a material impact on the consolidated financial statements.

Recently Adopted Accounting Pronouncements

In August 2018, the FASB issued ASU 2018-15 "Intangibles-Goodwill and Other-Internal-Use Software (Subtopic 350-40) Customer's Accounting for Implementation Costs Incurred in a Cloud Computing Arrangement that is a Service Contract." This ASU requires companies to defer specific implementation costs incurred in a Cloud Computing Arrangement ("CCA") that are often expensed as incurred under current GAAP, and recognize the expense over the noncancelable term of the CCA. We adopted this standard on a prospective basis on January 1, 2020. As a result of the adoption, we anticipate capitalizing certain implementation costs that were previously expensed as incurred, which will be recorded to either prepaid and other current assets or other assets on the consolidated balance sheets, depending on the duration of the agreement. The impact of the adoption did not have a material impact on our consolidated financial statements and related disclosures.

In June 2016, the FASB issued ASU 2016-13 "Financial Instruments – Credit losses: Measurement of Credit Losses on Financial Instruments." In 2019 and 2020, the FASB issued several ASUs to amend and clarify the credit loss guidance in the original ASU 2016-13 (ASU 2016-13 and its amendments are herein referred to as "ASC 326" or "CECL"). ASC 326 amends FASB's guidance on the impairment of financial instruments, specifically adding an impairment model to GAAP that is based on expected losses, rather than incurred losses, which is intended to result in more timely recognition of such losses. We adopted this standard on January 1, 2020. We have updated our internal controls and operational processes and procedures, to include certain forward-looking considerations in our current process of developing and recognizing credit losses for our accounts receivable and restricted investment accounted for at amortized cost. Generally, the adoption of ASC 326 did not have a material impact on our consolidated balance sheet, results of operations or cash flows. ASC 326 had an immaterial impact to our allowance for credit losses reported in accounts receivable on our consolidated balance sheet upon adoption. Additionally, upon adoption of ASC 326, we estimated an allowance for credit losses for our restricted investment on our consolidated balance sheet. Our restricted investment, which is accounted for as a held-to-maturity investment, consists of highly rated corporate long-term bonds that mature in 2025 and 2026. To calculate our expected credit loss allowance, we utilized a probability-of-default method ("PDM") for each bond based on each securities term. This process uses historical credit loss

experience on similar product types, adjusted for reasonable and supportable forecasts of future default rates. Using a PDM, we calculated an expected credit loss allowance at January 1, 2020 of \$0.6 million, which was recorded as an adjustment to the opening balance of retained earnings.

The following table displays changes in our allowance for credit losses as of December 31, 2020, including the transition impact of adopting the CECL standard.

(in millions)	Balance at December 31, 2019 (1)	Impact from Adoption of ASC 326	Balance at January 1, 2020	Current Period Provision	Balance at December 31, 2020 (2)
Allowance for credit losses	\$ 0.5	0.6	1.1	1.7	\$ 2.8

⁽¹⁾ The allowance for credit losses at December 31, 2019 of \$0.5 million was included in "Accounts receivable, net" on the consolidated balance sheets.

Our expected credit losses can vary from period to period based on several factors, such as changes in bond ratings, actual observed bond defaults, and overall economic environment. The primary factor that contributed to our provision for expected credit losses in the year ended December 31, 2020 was a pessimistic outlook of the macroeconomic environment due to the COVID-19 pandemic, and related effects on the financial performance of U.S.-based corporations. The increase in the allowance for credit losses of \$1.7 million in the year ended December 31, 2020 is attributed to \$0.3 million for Level 1 securities and \$1.4 million for accounts receivable expected credit losses.

In August 2018, the FASB issued ASU 2018-14 "Compensation — Retirement Benefits — Defined Benefit Plans — General (Topic 715-20): Disclosure Framework — Changes to the Disclosure Requirements for Defined Benefit Plans." This ASU amends ASC 715 to add, remove, and clarify disclosure requirements related to defined benefit pension and other postretirement plans. We adopted this standard on a prospective basis on January 1, 2020, and it had no material impact to our consolidated financial statements and related disclosures.

Recently Issued Accounting Pronouncements

In December 2019, the FASB issued ASU 2019-12 "Income Taxes (Topic 740): Simplifying the Accounting for Income Taxes." This ASU amends ASC 740 to add, remove, and clarify disclosure requirements related to income taxes. The new standard is effective for fiscal years beginning after December 15, 2020. We adopted the new guidance effective January 1, 2021. The adoption of the new guidance did not have a material impact.

In March 2020, the FASB issued ASU 2020-04 "Reference Rate Reform (Topic 848): Facilitation of the Effects of Reference Rate Reform on Financial Reporting." The ASU is intended to provide temporary optional expedients and exceptions to the GAAP guidance on contract modifications and hedge accounting to ease the financial reporting burdens related to the expected market transition from the London Interbank Offered Rate (LIBOR) and other interbank offered rates to alternative reference rates. This guidance became effective beginning on March 12, 2020, and we may elect to apply the amendments prospectively until December 31, 2022. As of December 31, 2020, we have not yet elected any optional expedients provided in the standard. We will apply the accounting relief, if necessary, as relevant contract and hedge accounting relationship modifications are made during the reference rate reform transition period. We do not expect this new standard to have a material impact on our consolidated financial statements.

⁽²⁾ The allowance for credit losses at December 31, 2020 of \$1.9 million and \$0.9 million was included "Accounts receivable, net" and "Restricted investment" on the consolidated balance sheets, respectively.

Note 5: Revenues

Disaggregation of Revenue

The following tables present our Net sales disaggregated by product line and geography.

Years Ended December 31,								
2020			2019	2018				
\$ 477.7		\$	454.9	\$	362.0			
	32.3		35.7		38.4			
\$	510.0	\$	490.6	\$	400.4			
	75.6		111.4		114.2			
	186.8		183.3		178.5			
	316.0		385.5		440.5			
	127.7		122.1		_			
\$	706.1	\$	802.3	\$	733.2			
\$	1,216.1	\$	1,292.9	\$	1,133.6			
		\$ 477.7 32.3 \$ 510.0 75.6 186.8 316.0 127.7 \$ 706.1	\$ 477.7 \$ 32.3 \$ 510.0 \$ 75.6 186.8 316.0 127.7 \$ 706.1 \$	2020 2019 \$ 477.7 \$ 454.9 32.3 35.7 \$ 510.0 \$ 490.6 75.6 111.4 186.8 183.3 316.0 385.5 127.7 122.1 \$ 706.1 \$ 802.3	2020 2019 \$ 477.7 \$ 454.9 \$ 32.3 35.7 \$ 510.0 \$ 490.6 \$ 75.6 111.4 186.8 183.3 316.0 385.5 127.7 122.1 \$ 706.1 \$ 802.3			

The following table presents our Net sales disaggregated by geography, based on the delivery address of our customer.

	Years Ended December 31,								
In millions		2020	2019			2018			
North America	\$	676.9	\$	795.7	\$	770.4			
Asia Pacific		345.4		281.4		171.4			
Europe, Middle East, and Africa		174.9		193.6		169.9			
South America		18.9		22.2		21.9			
Net sales	\$	1,216.1	\$	1,292.9	\$	1,133.6			

Contract Balances

The following table provides information about contract assets and contract liabilities from contracts with customers. The contract assets primarily relate to our rights to consideration for products produced but not billed at the reporting date from contracts with certain customers. The contract assets are recognized as accounts receivables when we have an enforceable right to payment for performance completed to date and the customer has been billed. Contract liabilities represent obligations to transfer goods to a customer for which we have received consideration from our customer. For all periods presented, we had no contract liabilities.

		Contract Asset							
	Years Ended December 31,								
In millions		2020		2019					
Balance at beginning of period	\$	6.2	\$	5.1					
Contract asset additions		23.6		29.5					
Reclassification to accounts receivable, billed to customers		(24.1)		(28.4)					
Balance at end of period (1)	\$	5.7	\$	6.2					

⁽¹⁾ Included within "Prepaid and other current assets" on the consolidated balance sheet.

Note 6: Fair Value Measurements

Recurring Fair Value Measurements

The following information is presented for assets and liabilities that are recorded in the consolidated balance sheets at fair value measured on a recurring basis. There were no transfers of assets and liabilities that are recorded at fair value between the three-level fair value hierarchy during the periods reported.

In millions	Level 1 ⁽¹⁾		Level 2 ⁽²⁾		Level 3 ⁽³⁾		Total
December 31, 2020							
Assets:							
Equity securities (4)	\$ 0.2	\$	_	\$	_	\$	0.2
Deferred compensation plan investments (5)	1.7		_				1.7
Total assets	\$ 1.9	\$	_	\$	_	\$	1.9
Liabilities:							
Deferred compensation arrangement (5)	\$ 11.6	\$	_	\$	_	\$	11.6
Contingent consideration (6)					0.8		0.8
Total liabilities	\$ 11.6	\$	_	\$	0.8	\$	12.4

In millions	Level 1 ⁽¹⁾		Level 2 ⁽²⁾		Level 3 ⁽³⁾		Total
December 31, 2019							
Assets:							
Equity securities (4)	\$	0.4	\$		\$	_	\$ 0.4
Deferred compensation plan investments (5)		1.4					1.4
Total assets	\$	1.8	\$	_	\$	_	\$ 1.8
Liabilities:							
Deferred compensation arrangement (5)	\$	10.0	\$	_	\$	_	\$ 10.0
Separation-related reimbursement awards (7)		0.1					0.1
Total liabilities	\$	10.1	\$		\$	_	\$ 10.1

⁽¹⁾ Quoted prices in active markets for identical assets.

Nonrecurring Fair Value Measurements

The following table presents our fair value hierarchy for those assets measured at fair value on a non-recurring basis in the consolidated balance sheets during the year ended December 31, 2020. There were no nonrecurring fair value measurements in the consolidated balance sheets during the year ended December 31, 2019.

⁽²⁾ Quoted prices for similar assets and liabilities in active markets.

⁽³⁾ Significant unobservable inputs.

⁽⁴⁾ Included within "Prepaid and other current assets" on the consolidated balance sheet.

Consists of a deferred compensation arrangement, through which we hold various investment securities recognized on our balance sheets. Both the asset and liability related to investment securities are recorded at fair value, and are included within "Other assets" and "Other liabilities" on the consolidated balance sheets, respectively. In addition to the investment securities, we also had company-owned life insurance related to the deferred compensation arrangement recorded at cash surrender value in "Other assets" of \$10.8 million and \$8.4 million at December 31, 2020 and 2019, respectively.

⁽⁶⁾ Included within "Other liabilities" on the consolidated balance sheet.

⁽⁷⁾ Included within "Accrued expenses" on the consolidated balance sheet.

In millions	nber 31, 020	in . Mar Identi	ed Prices Active kets for cal Assets evel 1)	Ob	nificant Other servable s (Level 2)	Unol	nificant bservable s (Level 3)	(I (Yea Dece	al Gains Losses) ar Ended ember 31, 2020)
Assets:									
Impairment of operating lease assets, net (1)	\$ 	\$		\$		\$	_	\$	(1.7)
Total assets	\$ 	\$		\$		\$		\$	(1.7)

⁽¹⁾ During the year ended December 31, 2020, we exited certain leased assets previously used in our daily operations. These leased assets have remaining lease obligations through 2023. This impairment charge was recorded to adjust their fair value on our consolidated balance sheet to zero.

Equity Securities

The aggregate carrying value of investments in equity securities where fair value is not readily determinable totaled zero and \$1.5 million as of December 31, 2020 and 2019, respectively. During the period ended December 31, 2020, we recorded an impairment charge of \$1.4 million, related to an equity security where fair value is not readily determinable held within our Performance Materials segment. The impairment charge represented the difference between liquidation value of the investment and our carrying value at the time our investment was liquidated.

Restricted Investment

Our restricted investment is a trust managed in order to secure repayment of the finance lease obligation, associated with Performance Materials' Wickliffe, Kentucky manufacturing site, at maturity. The trust, presented as restricted investment on our consolidated balance sheets, purchased long-term bonds that mature in 2025 and 2026. The principal received at maturity of the bonds along with interest income that is reinvested in the trust are expected to be equal to or more than the \$80.0 million finance lease obligation that is due in 2027. Because the provisions of the trust provide us the ability, and it is our intent, to hold the investments to maturity, the investments held by the trust are accounted for as held to maturity ("HTM"); therefore, they are held at their amortized cost. The investments held by the trust earn interest at the stated coupon rate of the invested bonds. Interest earned on the investments held by the trust is recognized as interest income and presented within interest income on our consolidated statement of operations.

At December 31, 2020 and 2019, the carrying value of our restricted investment, which is accounted for as HTM and therefore held at amortized costs, was \$73.6 million and \$72.6 million, net of an allowance for credit losses of \$0.9 million and zero and included cash of \$2.4 million and \$0.2 million, respectively. The fair value at December 31, 2020 and 2019 was \$81.5 million and \$74.5 million, respectively, based on Level 1 inputs.

The following table shows the total amortized cost of our HTM debt securities by credit rating, excluding the allowance for credit losses and cash. The primary factor in our expected credit loss calculation is the composite bond rating. As the rating decreases, the risk present in holding the bond is inherently increased, leading to an increase in expected credit losses.

	 December 31, 2020									
In millions	AA+	AA	A	A-	BBB+		otal			
HTM debt securities	\$ 13.5	10.6	24.2	13.4	10.4	\$	72.1			

Debt Obligations

At December 31, 2020 and 2019, the carrying value of finance lease obligations was \$103.1 million and \$80.0 million, respectively, and the fair value was \$127.0 million and \$100.9 million, respectively. The fair value of our Performance Materials' Wickliffe, Kentucky finance lease obligations is based on the period-end quoted market prices for the obligations, using Level 2 inputs. The fair value of all other finance lease obligations approximates their carrying values.

The carrying value, excluding debt issuance fees, of our variable rate debt was \$353.4 million and \$877.8 million as of December 31, 2020 and 2019, respectively. The carrying value is a reasonable estimate of the fair value of our outstanding debt as our outstanding debt is variable interest rate debt.

At December 31, 2020 and 2019, the carrying value of our fixed rate debt was \$850.0 million and \$300.0 million, respectively, and the fair value was \$864.1 million and \$305.4 million, respectively, based on Level 2 inputs.

Contingent Consideration

In connection with the acquisition of certain assets in 2020, we are contingently obligated to make an additional payment for such assets of up to an aggregate amount of \$7.0 million. The contingent consideration is payable if certain sales volume targets are achieved prior to the expiration on December 31, 2024, therein referred to as "Revenue Earn-out."

The fair value of the five-year Revenue Earn-out consideration was \$0.8 million at December 31, 2020. Any subsequent changes in the fair value of the contingent consideration liability will be recorded in current period earnings as a selling, general, and administrative expense.

The following table summarizes the activity for financial liabilities utilizing Level 3 fair value measurements:

	Contingent	Contingent Consideration		
In millions	Decemb	ecember 31, 2020		
Beginning balance	\$	_		
Newly issued		1.1		
Change in revaluation of contingent consideration included in earnings		(0.3)		
Exercises/settlements				
Ending balance (1)	\$	0.8		
Ending balance (1)	\$	0.8		

⁽¹⁾ Included within "Other liabilities" on the consolidated balance sheets.

Note 7: Inventories, net

		December 31,					
In millions			2020		2019		
Raw materials		\$	39.1	\$	42.6		
Production materials, stores and supplies			24.6		22.3		
Finished and in-process goods			139.6		158.0		
	Subtotal	\$	203.3	\$	222.9		
Less: excess of cost over LIFO cost			(14.3)		(10.4)		
	Inventories, net	\$	189.0	\$	212.5		

As of December 31, 2020, approximately 31 percent, 13 percent, and 56 percent of our inventories were accounted for under the FIFO, average cost, and LIFO methods, respectively. As of December 31, 2019, approximately 31 percent, 11 percent, and 58 percent of our inventories were accounted for under the FIFO, average cost, and LIFO methods, respectively.

Note 8: Property, Plant, and Equipment, net

Property, plant, and equipment, net consist of the following:

		December 31,					
In millions		2020		2019			
Machinery and equipment		\$ 1,065.5	\$	964.3			
Buildings and leasehold improvements		174.0		116.9			
Land and land improvements		20.0		19.0			
Construction in progress		43.7		119.1			
	Total cost	\$ 1,303.2	\$	1,219.3			
Less: accumulated depreciation		(599.6)		(554.6)			
	Property, plant, and equipment, net (1)	\$ 703.6	\$	664.7			

This includes finance leases related to machinery and equipment at our Wickliffe, Kentucky facility of \$67.2 million and \$68.8 million, and net carrying value of \$5.3 million and \$6.0 million at December 31, 2020 and 2019, respectively. This also includes finance leases related to our Waynesboro, Georgia manufacturing facility for (a) machinery and equipment of \$18.8 million and \$18.4 million and net carrying value of \$16.0 million and \$16.8 million, (b) construction in progress of \$9.2 million and \$6.4 million and (c) buildings and leasehold improvements of \$5.2 million and \$4.2 million, and net carrying value of \$5.0 million and \$4.2 million at December 31, 2020 and 2019, respectively. Also included in buildings and leasehold improvements is a finance lease related to our new corporate headquarters of \$23.8 million and net carrying value of \$23.0 million at December 31, 2020. Amortization expense associated with these finance leases is included within depreciation expense. The payments remaining under these finance leases obligations are included within Note 14.

Depreciation expense was \$61.2 million, \$52.3 million, and \$41.9 million for the years ended December 31, 2020, 2019 and 2018, respectively.

Note 9: Goodwill and Other Intangible Assets, net

Goodwill

	Operating Segments					
In millions		Performance Chemicals				Total
December 31, 2018	\$	126.4	\$	4.3	\$	130.7
Foreign currency translation		10.6				10.6
Goodwill acquired (1)		295.1		_		295.1
December 31, 2019	\$	432.1	\$	4.3	\$	436.4
Foreign currency translation		8.9		_		8.9
December 31, 2020	\$	441.0	\$	4.3	\$	445.3

⁽¹⁾ See Note 17 for more information about our acquisitions.

Other Intangible Assets

	December 31, 2020						December 31, 2019							
In millions		ss carrying amount		umulated ortization			Gross carrying amount		Accumulated amortization			Net		
Customer contracts and relationships	\$	319.5	\$	73.6	\$	245.9	\$	314.5	\$	51.6	\$	262.9		
Brands (1)		82.4		15.8		66.6		80.3		11.1		69.2		
Developed technology		73.0		12.5		60.5		68.6		5.7		62.9		
Other		2.7		2.4		0.3		2.7		1.5		1.2		
Other intangibles, net (2)	\$	477.6	\$	104.3	\$	373.3	\$	466.1	\$	69.9	\$	396.2		

⁽¹⁾ Represents trademarks, trade names, and know-how.

Intangible assets subject to amortization were allocated among our business segments as follows:

	_	December 31,						
In millions	_	2020	2	019				
Performance Chemicals	\$	371.2	\$	396.2				
Performance Materials	_	2.1						
	Other intangibles, net	373.3	\$	396.2				

The amortization expense related to our intangible assets in the table above is shown in the table below.

	Years Ended December 31,									
In millions		2020		2019		2018				
Cost of sales	\$	0.1	\$	0.6	\$	0.7				
Selling, general, and administrative expenses		32.5		28.1		11.6				
Total amortization expense (1)	\$	32.6	\$	28.7	\$	12.3				

⁽¹⁾ See Note 17 for more information about the Caprolactone Acquisition and Pine Chemical Acquisition and the related increase in amortization expense.

Based on the current carrying values of intangible assets, estimated pre-tax amortization expense for the next five years is as follows: 2021 - \$31.7 million, 2022 - \$31.5 million, 2023 - \$31.4 million, 2024 - \$31.1 million and 2025 - \$31.1 million. The estimated pre-tax amortization expense may fluctuate due to changes in foreign currency.

Note 10: Financial Instruments and Risk Management

Net Investment Hedges

We have fixed-to-fixed cross-currency interest rate swaps with an aggregate notional amount of \$166.2 million and a maturity date of July 2023. We designated the swaps to hedge a portion of our net investment in a euro functional currency denominated subsidiary against foreign currency fluctuations. These contracts involve the exchange of fixed U.S. dollars with fixed euro interest payments periodically over the life of the contract and an exchange of the notional amount at maturity. This effectively converts a portion of our U.S. dollar denominated fixed-rate debt from a weighted average rate of 3.79 percent to euro denominated fixed-rate debt at a rate of 1.71 percent. Any difference between the fixed interest rate between the U.S. dollar denominated debt to euro denominated debt is recorded as interest income on the consolidated statements of operations.

⁽²⁾ See Note 17 for more information about our acquisitions and the related increase in intangible assets. The weighted average amortization period remaining for all intangibles is 13 years, while the weighted average amortization period remaining for customer contracts and relationships, brands, developed technology and other intangibles is 12.4 years, 15.1 years, 13.3 years, and 0.8 years, respectively.

The fair value of the fixed-to-fixed cross currency interest rate swap was a net asset (liability) of \$(8.6) million and \$3.0 million at December 31, 2020 and 2019, respectively. During the years ended December 31, 2020 and 2019, we recognized net interest income associated with this financial instrument of \$1.6 million and \$2.3 million, respectively.

Cash Flow Hedges

Foreign Currency Exchange Risk Management

We manufacture and sell our products in several countries throughout the world and, thus, we are exposed to changes in foreign currency exchange rates. To manage the volatility relating to these exposures, we net the exposures on a consolidated basis to take advantage of natural offsets. To manage the remaining exposure, from time to time, we utilize forward currency exchange contracts and zero cost collar option contracts to minimize the volatility to earnings and cash flows resulting from the effect of fluctuating foreign currency exchange rates on export sales denominated in foreign currencies (principally the euro). These contracts are generally designated as cash flow hedges. Designated cash flow hedges entered to minimize foreign currency exchange risk of forecasted revenue transactions are recorded to Net sales on the consolidated statement of operations when the forecasted transaction occurs. As of December 31, 2020, there were \$9.1 million open foreign currency derivative contracts. The fair value of the foreign currency hedge was an asset (liability) of \$(0.1) million as of December 31, 2020, and was zero as of December 31, 2019.

Commodity Price Risk Management

Certain energy sources used in our manufacturing operations are subject to price volatility caused by weather, supply and demand conditions, economic variables, and other unpredictable factors. This volatility is primarily related to the market pricing of natural gas. To mitigate expected fluctuations in market prices and the volatility to earnings and cash flow resulting from changes to pricing of natural gas purchases, from time to time, we enter into swap contracts and zero cost collar option contracts and designate these contracts as cash flow hedges. As of December 31, 2020, we had 0.9 million and 1.2 million mmBTUs (millions of British Thermal Units) in aggregate notional volume of outstanding natural gas commodity swap contracts and zero cost collar option contracts, respectively, designated as cash flow hedges. As of December 31, 2020, open commodity contracts hedge forecasted transactions until February 2022. The fair value of the outstanding designated natural gas commodity hedge contracts was a net asset (liability) of \$(0.1) million and \$(0.5) million as of December 31, 2020 and 2019, respectively.

Interest Rate Risk Management

Our policy is to manage interest expense using a mix of fixed and variable rate debt. To manage interest rate risk effectively, from time to time, we may enter into cash flow interest rate derivative instruments, which can consist of forward starting swaps and treasury locks. In all cases, the notional amount of the interest rate swap agreements is equal to or less than the designated debt being hedged. Designated interest rate cash flow hedge gains or losses recorded in AOCI are recognized in "Interest expense, net" on the consolidated statements of operations on a straight-line basis over the remaining maturity of the underlying debt. These instruments are designated as cash flow hedges.

As of December 31, 2020, we a floating-to-fixed interest rate swap with a notional amount of \$166.2 million to manage the variability of cash flows in the interest rate payments associated with our existing LIBOR-based interest payments, effectively converting \$166.2 million of our floating rate debt to a fixed rate. In accordance with the terms of this instrument, we receive floating rate interest payments based upon three-month U.S. dollar LIBOR and in return are obligated to pay interest at a fixed rate of 3.79 percent until July 2023. The fair value of the interest rate swap was an asset (liability) of \$(8.9) million and \$(3.9) million at December 31, 2020 and 2019, respectively.

Effect of Cash Flow and Net Investment Hedge Accounting on AOCI

In millions		mount of Recognize			Amount of Gain (Loss) Reclassified from AOCI into Net income		n AOĆI	Location of Gain (Loss) Reclassified from AOCI into Net income	
			Yea	ar Ended l	Dece	mber 31,			
		2020		2019		2020		2019	
Cash flow hedging derivatives									
Currency exchange contracts	\$	(0.1)	\$	_	\$	0.1	\$		Net sales
Natural gas contracts		(0.5)		(0.9)		1.1		0.3	Cost of sales
Interest rate swap contracts		(5.0)		(3.9)					Interest expense
Total	\$	(5.6)	\$	(4.8)	\$	1.2	\$	0.3	
	Amount of Gain (Loss) Recognized in AOCI			Amount of Gain (Loss) Recognized in Income on Derivative (Amount Excluded from Effectiveness Testing)			còme ón e ed from	Location of Gain or (Loss) Recognized in Income on Derivative (Amount Excluded from Effectiveness Testing)	
			Ye	ar Ended l	Dece	mber 31,			
		2020		2019		2020	_	2019	
Net investment hedging derivative									
Currency exchange contracts ⁽¹⁾	\$	(11.7)	\$	3.0	\$	1.6	\$	2.3	Interest income
					_		_		

⁽¹⁾ Reclassifications from AOCI to Net Income were zero for all periods presented. Gains and losses would be reclassified from AOCI to Other (income) expense, net.

Within the next twelve months, we expect to reclassify \$0.1 million of losses from AOCI to earnings, before taxes.

Fair-Value Measurements

The following information is presented for derivative assets and liabilities that are recorded in the consolidated balance sheets at fair value measured on a recurring basis. There were no transfers of assets and liabilities that are recorded at fair value between Level 1 and Level 2 during the periods reported. There were no non-recurring fair value measurements related to derivative assets and liabilities on our consolidated balance sheet during fiscal years ending December 31, 2020, 2019, or 2018, respectively.

In millions	 Level 1 ⁽¹⁾	Level 2 ⁽²⁾	Level 3 ⁽³⁾		Total
December 31, 2020					
Assets:					
Natural gas contracts (4)	\$ <u> </u>	\$ 0.1	\$ 	\$	0.1
Total assets	\$ 	\$ 0.1	\$ 		0.1
Liabilities:					
Natural gas contracts (6)	\$ 	\$ 0.2	\$ _	\$	0.2
Currency exchange contracts (6)	_	0.1	_		0.1
Net investment hedge ⁽⁷⁾	_	8.6	_		8.6
Interest rate swap contracts (7)	 <u> </u>	 8.9	 		8.9
Total liabilities	\$ 	\$ 17.8	\$ 	\$	17.8
In millions	 Level 1 ⁽¹⁾	 Level 2 ⁽²⁾	Level 3 ⁽³⁾		Total
December 31, 2019					
Assets:					
Net investment hedge (5)	\$ _	\$ 3.0	\$ 	\$	3.0
Total assets	\$ 	\$ 3.0	\$ 	\$	3.0
Liabilities:					
Natural gas contracts (6)	\$ _	\$ 0.5	\$ 	\$	0.5
Interest rate swap contracts (7)	 _	3.9	_		3.9
Total liabilities	\$ 	\$ 4.4	\$ 	\$	4.4

⁽¹⁾ Quoted prices in active markets for identical assets.

Quoted prices for similar assets and liabilities in active markets.

⁽³⁾ Significant unobservable inputs.

⁽⁴⁾ Included within "Other current assets" on the consolidated balance sheet.

⁽⁵⁾ Included within "Other assets" on the consolidated balance sheet.

⁽⁶⁾ Included within "Accrued expenses" on the consolidated balance sheet.

⁽⁷⁾ Included within "Other liabilities" on the consolidated balance sheet.

Note 11: Debt, including Finance Lease Obligations

Current and long-term debt including finance lease obligations consisted of the following:

	December 3	31, 2020	December 31,				
In millions	Interest rate	Maturity date		2020		2019	
Variable Rate Debt:							
Revolving Credit Facility (1)	1.64%	2025	\$		\$	131.3	
Term Loans							
2019 Term Loan				_		375.0	
2017 Term Loan	1.71%	2023		351.6		365.6	
Other notes payable	4.44%	2021		1.8		5.9	
Fixed Rate Debt:							
Senior Notes							
2020 Senior Note	3.88%	2028		550.0		_	
2018 Senior Note	4.50%	2026		300.0		300.0	
Finance lease obligations (2)	7.17%	2027-2035		103.1		80.0	
Total debt including finance lease obligations			\$	1,306.5	\$	1,257.8	
Less: debt issuance costs				13.1		6.9	
Total debt including finance lease obligations, net of debt issuance costs			\$	1,293.4	\$	1,250.9	
Less: debt maturing within one year (3)				26.0		22.5	
Long-term debt including finance lease obligations			\$	1,267.4	\$	1,228.4	

⁽¹⁾ Letters of credit outstanding under the revolving credit facility were \$2.3 million and \$2.1 million and available funds under the facility were \$497.7 million and \$616.6 million at December 31, 2020 and 2019, respectively.

Revolving Credit Facility

On October 28, 2020, we entered into Amendment No. 5 to our existing credit agreement, dated as of March 7, 2016. Among other things, Amendment No. 5 extended the maturity date with respect to our revolving credit facility from August 7, 2023 to October 28, 2025 and reduced the aggregate principal amount of revolving commitments thereunder from \$750.0 million to \$500.0 million.

The revolving credit facility bears interest at either (a) an adjusted base rate or (b) an adjusted LIBOR rate (or a comparable or successor rate), in each case, plus an applicable margin, in the case of base rate loans, ranging between zero percent and 0.75 percent, and in the case of adjusted LIBOR rate loans, ranging between 1.00 percent and 1.75 percent. The margin is based on a total leverage based pricing grid.

Fees of \$2.2 million, zero and \$1.1 million were incurred in 2020, 2019, and 2018, respectively, to secure the various amendments associated with our revolving credit facility. These fees have been deferred and will be amortized over the term of the facility.

⁽²⁾ Includes finance lease obligations of \$80.0 million related assets at our Performance Materials' Wickliffe, Kentucky manufacturing site and \$23.1 million related to our corporate headquarters.

⁽³⁾ Debt maturing within one year is included in "Notes payable and current maturities of long-term debt" on the consolidated balance sheet.

Term Loans

Our term loans are comprised of two separate term loans: the "2017 Term Loan" and the "2019 Term Loan." During the fourth quarter of 2020, we utilized a portion of the net proceeds from an issuance of senior notes to repay the outstanding principal amount of \$375 million related to the 2019 Term Loan.

2019 Term Loan:

On March 7, 2019, we amended our credit agreement to, among other things, establish a new class of incremental term loan commitments, collectively referred to as the 2019 Term Loan, in the aggregate principal amount of \$375.0 million.

The 2019 Term Loan was not subject to amortization; the full principal balance was originally due and payable at maturity on August 7, 2022. The 2019 Term Loan bore interest at either (a) an adjusted base rate or (b) an adjusted LIBOR rate (or a comparable or successor rate), in each case, plus an applicable margin, in the case of base rate loans, ranging between zero and 0.25 percent, and in the case of adjusted LIBOR rate loans, ranging between 0.75 percent and 1.25 percent. The margin was based on a total leverage based pricing grid.

As consideration for the amendments relating to the 2019 Term Loan, we paid to each lender a consent fee equal to 0.05 percent of the aggregate principal amount of the commitments and outstanding loans under held by such lender, resulting in aggregate fees of \$1.8 million. These fees were deferred and amortized over the original term of the loan. During the fourth quarter 2020, with the repayment of the outstanding principal balance, we recorded the remaining deferred finance fees of \$1.0 million to Interest expense on our consolidated statements of operations.

2017 Term Loan:

On August 21, 2017, we amended our credit agreement to among other things, establish incremental term loan commitments in the aggregate principal amount of \$75.0 million in addition to the existing term loan of \$300.0 million. The combined borrowings of \$375.0 million, collectively referred to as the 2017 Term Loan are treated as a single class.

On August 7, 2018, we further amended the credit agreement to, among other things, extended the maturity of the 2017 Term Loan to August 7, 2023. The 2017 Term Loan amortized at zero percent per annum through May 9, 2019 and amortizes at 1.25 percent per annum during each year thereafter, with the balance due at maturity. The 2017 Term Loan bears interest at either (a) an adjusted base rate or (b) an adjusted LIBOR rate (or a comparable or successor rate), in each case, plus an applicable margin, in the case of base rate loans, ranging between zero percent and 0.75 percent, and in the case of adjusted LIBOR rate loans, ranging between 1.00 percent and 1.75 percent. The margin is based on a total leverage based pricing grid.

As consideration for the amendments related to the 2017 Term Loan, we paid to each lender a consent fee equal to 0.05 percent of the aggregate principal amount of the commitments and outstanding loans held by such lender, resulting in aggregate fees of \$0.3 million and \$0.5 million in 2018 and 2017, respectively. These fees have been deferred and will be amortized over the term of the loan.

Senior Notes

Our senior notes are comprised of two separate series of notes: the "2020 Notes" and the "2018 Notes."

2020 Senior Notes:

On October 28, 2020, we issued \$550.0 million aggregate principal amount of 3.875 percent senior unsecured notes due 2028 (the "2020 Notes") in a private placement. The 2020 Notes were issued pursuant to an indenture dated as of October 28, 2020, by and among Ingevity, the subsidiary guarantors party thereto and U.S. Bank National Association, as trustee.

The net proceeds from the sale of the 2020 Notes, after deducting deferred financing fees of \$8.8 million, were used to repay the existing 2019 Term Loan and the outstanding balances under our revolving credit facility.

Interest payments on the 2020 Notes are due semiannually in arrears on November 1st and May 1st of each year, beginning on May 1, 2021, at a rate of 3.875 percent per year. The 2020 Notes will mature on November 1, 2028.

2018 Senior Notes:

On January 24, 2018, we issued \$300.0 million aggregate principal amount of 4.50 percent senior unsecured notes due 2026 (the "2018 Notes") in a private placement. The 2018 Notes were issued pursuant to an indenture dated as of January 24, 2018, by and among Ingevity, the subsidiary guarantors party thereto and U.S. Bank National Association, as trustee.

The net proceeds from the sale of the 2018 Notes, after deducting deferred financing fees of \$5.7 million, were used to finance, in part, the Pine Chemical Acquisition (see Note 17 for more information).

Interest payments on the 2018 Notes are due semiannually in arrears on February 1st and August 1st of each year, beginning on August 1, 2018, at a rate of 4.50 percent per year. The 2018 Notes will mature on February 1, 2026.

Debt Covenants

Our indentures contain certain customary covenants (including covenants limiting Ingevity's and its restricted subsidiaries' ability to grant or permit liens on certain property securing debt, declare or pay dividends, make distributions on or repurchase or redeem capital stock, make investments in unrestricted subsidiaries, engage in sale and lease-back transactions, and engage in a consolidation or merger, or sell, transfer or otherwise dispose of all or substantially all of the assets of our and our restricted subsidiaries, taken as a whole) and events of default (subject in certain cases to customary exceptions, as well as grace and cure periods). The occurrence of an event of default under the 2018 Notes or 2020 Notes could result in the acceleration of the notes of such series and could cause a cross-default resulting in the acceleration of other indebtedness of Ingevity and its subsidiaries, including the other series. We were in compliance with all covenants under the indentures as of December 31, 2020.

The credit agreement governing our revolving credit facility and the 2017 Term Loan contain customary default provisions, including defaults for non-payment, breach of representations and warranties, insolvency, non-compliance with covenants and cross-defaults to other material indebtedness. The occurrence of an uncured event of default under the credit agreement could result in all loans and other obligations becoming immediately due and payable and our revolving credit facility and term loan facilities being terminated. The credit agreement also contains certain customer covenants, including financial covenants. The revolving credit facility financial covenants require Ingevity to maintain on a consolidated basis a maximum total net leverage ratio of 4.0 to 1.0 (which may be increased to 4.5 to 1.0 under certain circumstances) and a minimum interest coverage ratio of 3.0 to 1.0. Additionally, the 2017 Term Loan financial covenants require Ingevity to maintain on a consolidated basis a maximum total gross leverage ratio of 4.0 to 1.0 (which may be increased to 4.5 to 1.0 under certain circumstances) and a minimum interest coverage ratio of 3.0 to 1.0. Our actual gross and net leverage for the four consecutive quarters ended December 31, 2020 were 3.1 and 2.5, respectively, and our actual interest coverage for the four consecutive quarters ended December 31, 2020 was 10.0. We were in compliance with all covenants at December 31, 2020.

New Markets Tax Credit

On November 14, 2019, we entered into a financing transaction with Wells Fargo Community Investment Holdings, LLC ("Wells Fargo") related to a \$7.0 million capital investment associated with a project to build out our new headquarters located in North Charleston, South Carolina (the "Project"). Wells Fargo made a \$2.3 million capital contribution to Ingevity Virginia Corporation, a wholly-owned subsidiary of Ingevity ("Ingevity VA"), which in-turn made a \$5.0 million loan to IH Investment Fund, LLC (the "Investment Fund") under a qualified New Markets Tax Credit ("NMTC") program. The NMTC program was provided for in the Community Renewal Tax Relief Act of 2000 (the "Act") and is intended to induce capital investment in qualified lower income communities. The Act permits taxpayers to claim credits against their federal income taxes for up to 39 percent of qualified investments in the equity of a community development entity ("CDE"). CDEs are conduit lenders through which privately managed investment institutions to make qualified low-income community investments.

Ingevity VA's \$5.0 million loan to the Investment Fund at an interest rate of one percent per annum and matures in 2041. The Investment Fund contributed the \$5.0 million loan from Ingevity VA and the initial investment of \$2.3 million (less syndication fees) by Wells Fargo to The Innovate Fund XVI, LLC ("Innovate CDE"), the CDE in this transaction. The Innovate CDE, in turn, loaned the funds (net of fees) at an interest rate of 1.21 percent and a maturity of November 14, 2044 to Ingevity. The proceeds of the loans from the Innovate CDE are to be restricted for use for the Project only.

The \$2.3 million contribution to the Investment Fund by Wells Fargo entitles Wells Fargo to substantially all of the tax benefits derived from the NMTC over a seven-year compliance period, while Ingevity effectively receives net loan proceeds equal to Wells Fargo's contributions to the Investment Fund. This transaction includes a put/call provision whereby Ingevity may be obligated or entitled to repurchase Wells Fargo's interest in the Investment Fund. The value attributed to the put/call is not significant. We believe that Wells Fargo will exercise the put option in November 2026, subsequent to the seven-year recapture period. Ingevity is required to be in compliance with various regulations and contractual provisions that apply to the NMTC arrangement, which is subject to 100 percent recapture for a period of seven years as provided by the Internal Revenue Code. Non-compliance with applicable requirements could result in the projected tax benefits not being realized and, therefore, could require Ingevity to indemnify Wells Fargo for any loss or recapture of NMTC related to the financing until such time as the obligation to deliver tax benefits is relieved. We do not anticipate any credit recaptures will be required in connection with this arrangement.

We have determined that this financing arrangement, with the Investment Fund and Innovate CDE, provides us with a controlling interest in both entities despite not having majority voting rights in either entity. Therefore, we have concluded, both entities represent a variable interest entity ("VIE"). The ongoing activities of the Investment Fund – collecting and remitting interest and fees and NMTC compliance – were all considered in the initial design and are not expected to significantly affect economic performance throughout the life of the Investment Fund. We have considered: the contractual arrangements that obligate Ingevity to deliver tax benefits and provide various other guarantees to the structure; the Innovate CDE's and Wells Fargo's overall lack of a material interest in the underlying economics of the Project; and Ingevity's obligation to absorb losses of both the Innovate CDE and Investment Fund. We have concluded that Ingevity is the primary beneficiary of each VIE and we have therefore consolidated both Innovate CDE and Investment Fund, as VIEs, in accordance with ASC 810. Post consolidation, the only material remaining balances presented on Ingevity's consolidated financial statements are the original contribution of \$2.3 million from Wells Fargo in the Investment Fund, less the third-party debt financing (syndication) fees paid and any remaining restricted proceeds to be used solely for the purpose of the capital investments in the Project. Although ASC 810 would indicate that noncontrolling interest in these VIEs should be presented separately from Ingevity's equity based on our evaluation, we have concluded that the \$2.3 million (net of syndication fees) should be presented as a liability of Ingevity on our consolidated financial statements as this more accurately reflects the substance of the financing arrangement.

As a result of this financing arrangement, we incurred \$0.6 million in syndication (debt issuance) fees, which are being amortized over the life of the note payable. The proceeds of the loans from the Innovate CDE (including loans representing the capital contribution made by Wells Fargo, net of syndication fees) of \$2.3 million, were restricted for use on the Project. As of December 31, 2020 and 2019, the balance of the loan liability, net of debt issuance fees of \$0.5 million and \$0.6 million, was \$1.8 million and \$1.7 million. The loan liability, net of fees is recorded in Other liabilities on our consolidated balance sheets. Additionally, at December 31, 2019, we had \$7.7 million of cash restricted for use on the Project, this amount is recorded in Prepaid expenses and other current assets in our consolidated balance sheets. As of December 31, 2020 all proceeds from this financing arrangement were used toward the Project and all capital expenditures have been placed in service.

Note 12: Share-based Compensation

Equity Incentive Plan

The Ingevity Corporation 2016 Omnibus Incentive Plan, adopted on May 15, 2016, grants certain corporate officers, key employees and non-employee directors of Ingevity and subsidiaries different forms of benefits, including stock options, restricted stock units ("RSU"), director stock units ("DSU"), and performance stock units ("PSU"). The Ingevity Corporation 2016 Omnibus Incentive Plan has a maximum shares reserve of 4,000,000 for the grant of equity awards. As of December 31, 2020, 3,230,193 shares under the Ingevity Corporation 2016 Omnibus Incentive Plan are still available for grants, assuming that Ingevity performs at the target performance level in each year of the three-year performance period for PSU awards. Ingevity's Compensation Committee determines the long-term incentive mix, including stock options, RSUs and PSUs, and may authorize new grants annually. We typically issue new common shares for vesting of awards under our equity incentive plan.

Employee Stock Purchase Plan

On December 9, 2016, our Compensation Committee and Board of Directors approved the 2017 Ingevity Corporation Employee Stock Purchase Plan ("ESPP"), which was approved by Ingevity' stockholders on April 27, 2017. The ESPP allows eligible employee participants to purchase no more than 5,000 shares of our common stock at a discount through payroll deductions up to 15 percent of their compensation deducted during the purchase period. However, no participant shall be permitted to purchase common stock with a value greater than \$25,000 in any calendar year. The ESPP is a tax-qualified plan under Section 423 of the Internal Revenue Code. The ESPP consists of a one month enrollment period preceding the three-month purchase period. Employees purchase shares in each purchase period at 85 percent of the market value of our common stock at either the beginning of the offering period or the end of the purchase period, whichever price is lower.

Under the ESPP, a total of 250,000 shares of Ingevity's common stock are reserved and authorized for issuance to participating U.S. employees, as defined by the ESPP, which excludes certain officers of Ingevity. We typically issue treasury shares for issuances under the ESPP. As of December 31, 2020, 130,023 shares under the ESPP are still available for issuance. The initial offering period under the ESPP began on July 1, 2017. During fiscal year 2020, there were 48,487 shares issued under the ESPP at an average price of \$71.53.

Our share-based compensation and ESPP expense is included in the table below.

	Years Ended December 31,									
In millions	20	020		2019		2018				
Stock option expense	\$	0.6	\$	3.0	\$	2.3				
ESPP expense		0.5		0.7		0.5				
RSU, DSU and PSU expense		7.3		8.6		9.7				
Total share-based compensation expense (1)	\$	8.4	\$	12.3	\$	12.5				
Income tax benefit		(1.5)		(2.2)		(2.9)				
Total share-based compensation expense, net of tax	\$	6.9	\$	10.1	\$	9.6				

⁽¹⁾ Amounts reflected in "Selling, general, and administrative expenses" on the consolidated statements of operations.

Stock Options

All stock options vest in accordance with vesting conditions set by the compensation committee of Ingevity's Board of Directors. Stock options granted to date have vesting periods of one to three years from the date of grant. Incentive and non-qualified options granted under the Plan expire no later than 10 years from the grant date. Expense related to stock options granted is based on the assumptions shown in the table below:

	Years Ended December 31,											
Weighted-average assumptions used to calculate expense for stock options		2020		2019		2018						
Risk-free interest rate		1.0 %)	2.6 %	ó	2.7 %						
Average life of options (years)		6.5		6.5		6.5						
Volatility		33.5 %)	28.0 %	ó	27.5 %						
Dividend yield		_		_		_						
Fair value per stock option	\$	15.87	\$	39.29	\$	25.51						

The following table summarizes Ingevity's stock option activity.

	Number of Options (in thousands)	ighted-average rcise price (per share)	Weighted- average remaining contractual term (years)	int	Aggregate trinsic value (in thousands)	
Outstanding, December 31, 2019	405	\$	58.39	7.4	\$	13,334
Granted	83		45.04			
Exercised	(71)		29.47			
Forfeited	(68)		77.21			
Canceled	(3)		87.74			
Outstanding, December 31, 2020	346	\$	57.28	7.2	\$	7,919
Exercisable, December 31, 2020	200	\$	50.39	6.3	\$	5,709

The aggregate intrinsic values in the table above represent the total pre-tax intrinsic value (the difference between Ingevity's closing stock price on the last trading day of the period and the exercise price, multiplied by the number of in-the-money options) that would have been received by the option holders had all option holders exercised their in-the-money options at each year end. The amount changes based on the fair market value of Ingevity's stock.

As of December 31, 2020, \$0.6 million of total unrecognized compensation expense related to stock options is expected to be recognized over a weighted-average period of one year.

Restricted Stock Units, Deferred Stock Units and Performance-based Restricted Stock Units

All RSUs, DSUs, and PSUs vest in accordance with vesting conditions set by the Compensation Committee of Ingevity's Board of Directors. RSUs and DSUs granted to date have vesting periods ranging from less than one year to three years from the date of grant. PSUs granted to date have vesting periods of three years from the date of grant, including grants that have a cumulative three-year performance period, subject to satisfaction of the applicable performance goals established for the respective grant. We periodically assess the probability of achievement of the performance criteria and adjust the amount of compensation expense accordingly. Compensation expense is recognized over the vesting period and adjusted for the probability of achievement of the performance criteria.

The following table summarizes Ingevity's RSUs, DSUs and PSUs activity.

	RSUs ar	nd DSUs	PSUs					
	Number of Units (in thousands) ⁽¹⁾	Weighted average grant date fair value (per share)	Number of Units (in thousands) ⁽¹⁾	Weighted average grant date fair value (per share)				
Nonvested, December 31, 2019	115	\$ 90.65	158	\$ 76.1	1			
Granted	131	44.48	92	46.63	5			
Vested	(54)	79.90	(64)	53.1	1			
Forfeited	(21)	78.78	(44)	80.43	3_			
Nonvested, December 31, 2020 (2)	171	\$ 59.75	142	\$ 66.22	2			

⁽¹⁾ The number granted represents the number of shares issuable upon vesting of RSUs and DSUs. For PSUs the number granted represents the number of shares issuable upon vesting assuming that Ingevity performs at the target performance level in each year of the three-year performance period.

⁽²⁾ Excludes 9,191 non-employee director shares that were vested but unissued at December 31, 2020.

As of December 31, 2020, \$7.8 million of unrecognized share-based compensation expense related to RSUs, DSUs and PSUs is expected to be recognized over a weighted-average period of 1.7 years.

Note 13: Equity

Accumulated other comprehensive income (loss)

Summarized below is the roll forward of AOCI, net of tax.

	Years Ended Decem					
In millions		2020		2019		2018
Foreign currency translation						
Beginning Balance	\$	1.5	\$	(16.4)	\$	(10.1)
Net gains (losses) on foreign currency translation		23.9		15.6		(6.3)
Gains (losses) on net investment hedges		(11.7)		3.0		_
Less: tax provision (benefit)		(2.7)		0.7		
Net gains (losses) on net investment hedges		(9.0)		2.3		_
Other comprehensive income (loss), net of tax		14.9		17.9		(6.3)
Ending Balance	\$	16.4	\$	1.5	\$	(16.4)
Derivative instruments						
Beginning Balance	\$	(3.5)	\$	0.4	\$	_
Gains (losses) on derivative instruments		(5.6)		(4.8)		1.7
Less: tax provision (benefit)		(1.3)		(1.1)		0.4
Net gains (losses) on derivative instruments		(4.3)		(3.7)		1.3
(Gains) losses reclassified to net income		1.2		(0.3)		(1.2)
Less: tax (provision) benefit		0.3		(0.1)		(0.3)
Net (gains) losses reclassified to net income		0.9		(0.2)		(0.9)
Other comprehensive income (loss), net of tax		(3.4)		(3.9)		0.4
Ending Balance	\$	(6.9)	\$	(3.5)	\$	0.4
Pension and other postretirement benefits						
Beginning Balance	\$	(3.0)	\$	(1.7)	\$	(1.6)
Unrealized actuarial gains (losses) and prior service (costs) credits		(2.7)		(1.8)		(0.4)
Less: tax provision (benefit)		(0.6)		(0.4)		(0.1)
Net actuarial gains (losses) and prior service (costs) credits		(2.1)		(1.4)		(0.3)
Amortization of actuarial and other (gains) losses, prior service cost (credits), and settlement and curtailment (income) charge reclassified to net income		0.3		0.1		0.3
Less: tax (provision) benefit						0.1
Net actuarial and other (gains) losses, amortization of prior service cost (credits), and settlement and curtailment (income) charge reclassified to net income		0.3		0.1		0.2
Other comprehensive income (loss), net of tax		(1.8)		(1.3)		(0.1)
Ending Balance	\$	(4.8)	\$	(3.0)	\$	(1.7)
Total AOCI ending balance at December 31	\$	4.7	\$	(5.0)	\$	(17.7)

Reclassifications of accumulated other comprehensive income (loss)

The table below provides details about the reclassifications from AOCI and the affected line items in the consolidated statements of income (loss) for each of the periods presented.

	Years Ended December 31,					
In millions		2020		2019		2018
Derivative Instruments						
Currency exchange contracts (1)	\$	(0.1)	\$	_	\$	1.0
Natural gas contracts (2)		(1.1)		0.3		0.2
Total before tax		(1.2)		0.3		1.2
(Provision) benefit for income taxes		0.3		(0.1)		(0.3)
Amount included in net income (loss)	\$	(0.9)	\$	0.2	\$	0.9
Pension and other postretirement benefits		_				
Amortization of prior service credit (costs) (2)	\$	(0.1)	\$	_	\$	_
Amortization of unrecognized net actuarial and other gains (losses) (3)		(0.1)		(0.1)		(0.1)
Recognized gain (loss) due to curtailment and settlement (2)		(0.1)		<u> </u>		(0.2)
Total before tax		(0.3)		(0.1)		(0.3)
(Provision) benefit for income taxes				<u> </u>		0.1
Amount included in net income (loss)	\$	(0.3)	\$	(0.1)	\$	(0.2)

⁽¹⁾ Included within "Net sales" on the consolidated statements of operations.

Noncontrolling interest acquisition

On August 1, 2018, we acquired the remaining 30 percent noncontrolling interest in Purification Cellutions, LLC, now known as Ingevity Georgia, LLC, which was treated as a partnership for tax purposes, for a purchase price of \$80.0 million. The acquisition resulted in the elimination of Noncontrolling interest of \$11.4 million and the recognition of a Deferred tax asset of \$14.3 million, with the remainder being recorded against Additional paid in capital of \$54.3 million in our consolidated financial statements.

Share repurchases

On February 28, 2020, our Board of Directors authorized the repurchase of up to \$500.0 million of our common stock, and rescinded the prior two outstanding authorizations. Our repurchase program does not include a specific timetable or price targets and may be suspended or terminated at any time. Shares may be purchased through open market or privately negotiated transactions at the discretion of management based on its evaluation of market prevailing conditions and other factors.

During the year ended December 31, 2020, we repurchased \$88.0 million in common stock, representing 1,533,442 shares of our common stock at a weighted average cost per share of \$57.38. At December 31, 2020, \$412.0 million remained unused under our Board-authorized repurchase program.

⁽²⁾ Included within "Cost of sales" on the consolidated statements of operations.

⁽³⁾ Included within "Other (income) expense, net" on the consolidated statements of operations.

Note 14: Leases

On January 1, 2019, we adopted ASC 842 utilizing the modified retrospective approach. The modified retrospective approach we selected provides a method of transition allowing for the recognition of existing leases as of the beginning of the period of adoption (i.e. January 1, 2019), and which does not require the adjustment of comparative periods. Results for reporting periods beginning after January 1, 2019 are presented under ASC 842, while prior period amounts are not adjusted and continue to be reported in accordance with our historic accounting under ASC 840.

Supplemental consolidated balance sheet information related to our leases is as follows:

		Decem	ber 3	ι,
In millions	Financial Statement Caption	2020		2019
Assets				
Operating lease assets, net ⁽¹⁾	Operating lease assets, net	\$ 49.1	\$	53.4
Finance lease assets, net ⁽²⁾	Property, plant, and equipment, net	58.5		33.4
Finance lease assets, net ⁽²⁾	Other assets, net	 0.8		1.2
Total lease assets		\$ 108.4	\$	88.0
Liabilities				
Current				
Operating lease liabilities ⁽³⁾	Current operating lease liabilities	\$ 16.2	\$	17.1
Finance lease liabilities	Notes payable and current maturities of long-term debt	0.7		_
Noncurrent				
Operating lease liabilities	Noncurrent operating lease liabilities	34.7		36.7
Finance lease liabilities	Long-term debt including finance lease obligations	102.4		80.0
Total lease liabilities		\$ 154.0	\$	133.8

Operating lease assets, net are recorded net of accumulated amortization of \$29.4 million and \$17.6 million, as of December 31, 2020 and 2019, respectively.

Finance Leases

Our finance lease obligations of \$103.1 million and \$80.0 million at December 31, 2020 and 2019, respectively, consisting of two leases. The first obligation of \$80.0 million is owed to the city of Wickliffe, Kentucky, associated with Performance Materials' Wickliffe, Kentucky manufacturing site, which is due at maturity in 2027. The second obligation of \$23.1 million is owed to the lessor of our new corporate headquarters in North Charleston, South Carolina. The lease commenced in July 2020, with a term of 15 years.

We also have a finance lease obligation due in 2031 for certain assets located at our Performance Materials' Waynesboro, Georgia manufacturing facility. The lease is with the Development Authority of Burke County ("Authority"). The Authority established the sale-leaseback of these assets by issuing an industrial development revenue bond. The bond was purchased by Ingevity and the obligations under the finance lease remain with Ingevity. Accordingly, we offset the finance lease obligation and bond on our consolidated balance sheets.

⁽²⁾ Finance lease assets, net are recorded net of accumulated amortization in Property, plant, and equipment, net and Other assets, net of \$65.8 million and \$0.8 million, respectively, as of December 31, 2020, and \$64.3 million and \$0.3 million, respectively, as of December 31, 2019.

Operating lease liabilities include \$0.2 million and \$0.2 million of accrued interest, as of December 31, 2020 and 2019, respectively.

Components of lease cost are as follows:

		 Years Ended	Dece	mber 31,
In millions	Financial Statement Caption	2020		2019
Operating lease cost ⁽¹⁾	Cost of sales	\$ 19.4	\$	21.5
	Selling, general, and administrative expenses	1.9		2.4
Finance lease cost				
Amortization of leased assets	Cost of sales	\$ 2.6	\$	1.9
	Selling, general, and administrative expenses	0.8		_
Interest on lease liabilities	Interest expense, net	6.8		6.1
Net lease cost ⁽²⁾		\$ 31.5	\$	31.9

⁽¹⁾ Includes short-term leases and variable lease costs, which are immaterial.

Maturity of Lease Liabilities

			December :	31, 2020)	
In millions		erating eases	Finance	leases		Total
2021		\$ 18.3	\$	8.1	\$	26.4
2022		14.3		8.1		22.4
2023		10.2		8.2		18.4
2024		6.6		8.3		14.9
2025		3.3		8.3		11.6
2026 and thereafter		4.3		113.2		117.5
	Total lease payments	\$ 57.0	\$	154.2	\$	211.2
Less: Interest		6.1		51.1		57.2
	Present value of lease liabilities $^{(1)}$	\$ 50.9	\$	103.1	\$	154.0

⁽¹⁾ As of December 31, 2020, we have operating lease commitments that have not yet commenced of approximately \$0.8 million primarily related to rail car leases.

Lease Term and Discount Rate

	Decembe	er 31,
In millions, except percentages	2020	2019
Weighted-average remaining lease term (years)		
Operating leases	4.2	4.2
Finance leases	7.9	8.5
Weighted-average discount rate		
Operating leases	5.43 %	5.67 %
Finance leases	7.17 %	7.67 %

Only on the rare occasion do we sublease our leased assets; as a result this amount excludes sublease income which is immaterial.

Other Information

	Y	Years Ended l						
In millions		2020		2019				
Cash paid for amounts included in the measurement of lease liabilities:								
Operating cash flows from operating leases	\$	18.5	\$	19.8				
Operating cash flows from finance leases		6.8		6.1				
Financing cash flows from finance leases		0.7		_				

Note 15: Retirement Plans

Defined Contribution Plans

On January 1, 2016, the Ingevity Corporation Retirement Savings Plan ("Plan") was established. The Plan is a qualified salary-reduction plan under Section 401(k) of the U.S. Internal Revenue Code. Eligible U.S. employees may participate by contributing a portion of their compensation. For non-union eligible employees participating in the Plan Ingevity makes matching contributions up to six percent of the employee deferral. In addition to the matching contributions, Ingevity also makes a non-elective contribution of three percent of eligible compensation per payroll for non-union employees. For union eligible employees participating in the Plan Ingevity makes matching contributions up to 100 percent of the first three percent of the employee deferrals and 50 percent on the next two percent of deferrals.

U.S. salaried employees who were no longer eligible to participate in our prior parent's defined benefit pension plan were provided an enhanced contribution into the Plan. The enhanced benefits consist of a transition contribution of four or ten percent of the employee's eligible compensation for employees who were grandfathered into our prior parent's cash balance and final average pay pension plan, respectively. The transition contributions continued until December 31, 2020, unless the grandfathered employee terminated employment sooner.

Charges associated with employer contributions to the Plan were \$10.6 million, \$10.6 million, and \$10.2 million for the years ended December 31, 2020, 2019, and 2018, respectively.

Defined Benefit Pension and Postretirement Plans

On May 16, 2016, Ingevity established qualified and non-qualified benefit plans to provide pension and post-retirement benefits to certain employees and retirees. Our retirement obligations consist of accrued defined benefit obligations earned by Ingevity domestic hourly union employees; accrued obligations from a frozen non-qualified defined benefit pension plan for certain salaried and former salaried employees of Ingevity; and other post-retirement medical and life insurance benefits.

We are required to recognize in our consolidated balance sheets the overfunded and underfunded status of our defined benefit postretirement plans. The overfunded and underfunded status is defined as the difference between the fair value of plan assets and the projected benefit obligation. We are also required to recognize, as a component of other comprehensive income, the actuarial gains and losses and the prior service costs and credits that arise during the period.

The following tables summarize the weighted average assumptions used and components of our defined benefit postretirement plans.

	Pensions					Other	efits	
In millions, except percentages		2020		2019		2020		2019
Following are the weighted average assumptions used to determine the benefit obligations at December 31:								
Discount rate - qualified benefit plans		2.45 %		3.15 %		— %		— %
Discount rate - non-qualified benefit plans		2.30 %		3.10 %		2.20 %		3.05 %
Rate of compensation increase		N/A		N/A		N/A		N/A
Change in projected benefit obligation								
Project benefit obligation at January 1	\$	36.5	\$	29.4	\$	0.9	\$	0.7
Service cost		1.6		1.2		_		_
Interest cost		1.2		1.2		_		_
Actuarial loss (gain)		6.1		5.3		0.1		0.2
Plan amendments		0.3		_		_		_
Benefit payments		(0.7)		(0.6)		_		_
Projected benefit obligation at December 31 (1)		45.0		36.5		1.0		0.9
Change in plan assets								
Fair value of plan asset at January 1		26.8		22.6				
Actual return on plan assets		5.0		4.7		_		
Company contributions		0.1		0.1		_		_
Benefit payments		(0.7)		(0.6)		_		_
Fair value of plan assets at December 31		31.2		26.8		_		
Funded Status								
Net Funded Status of the Plan (Liability)	\$	(13.8)	\$	(9.7)	\$	(1.0)	\$	(0.9)

		Pensio	ns		Othe	r Benef	fits
			cembei	· 31,			
In millions	202	20	2019		2020		2019
Amount recognized in the consolidated balance sheets:							
Pension and other postretirement benefit asset (2)	\$	_ 5	\$ —	\$	_	\$	_
Pension and other postretirement benefit (liability) (2)	(1.	3.8)	(9.7)	(1.0)		(0.9)
Total Net Funded Status of the Plan (Liability)	\$ (13	3.8)	\$ (9.7) \$	(1.0)	\$	(0.9)

⁽¹⁾ The accumulated benefit obligation for all years presented equals the projected benefit obligation for each plan, respectively.

⁽²⁾ Asset balance is included in "Other assets" and liability balances are included in "Other liabilities" on the consolidated balance sheet.

Amounts Recognized in Other Comprehensive Income (Loss)

Changes in plan assets and benefit obligations recognized in other comprehensive income (loss) are as follows:

						Y	ears E	ndec	1 Decei	nber 3	ι,						
		Per	nsions				0	ther	Benef	its				T	otal`		
In millions	2020	2	019	2	2018	2	2020	2	2019	201	8	2	020	2	019	2	018
Current year net actuarial loss (gain)	\$ 2.3	\$	1.7	\$	_	\$	0.1	\$	0.1	\$ (0	.1)	\$	2.4	\$	1.8	\$	(0.1)
Current year prior service cost (credit)	0.3				0.5					-			0.3				0.5
Amortization of net actuarial (loss) gain and prior service (cost) credit	(0.2)		(0.1)		(0.1)		_		_	-	_		(0.2)		(0.1)		(0.1)
Settlement and curtailment (charges) income, net	(0.1)				(0.2)								(0.1)				(0.2)
Total recognized in other comprehensive (income) loss, before taxes	2.3		1.6		0.2		0.1		0.1	(0	.1)		2.4		1.7		0.1
Total recognized in other comprehensive (income) loss, after taxes	\$ 1.7	\$	1.2	\$	0.2	\$	0.1	\$	0.1	\$ (0	.1)	\$	1.8	\$	1.3	\$	0.1

Amounts Recognized in Accumulated Other Comprehensive Income (Loss)

The amounts in accumulated other comprehensive income (loss) that have not yet been recognized as components of net periodic benefit cost are as follows:

						Decen	nber :	31,					
		Pen	sions		Other Benefits					Total			
In millions	2	2020		2019		2020		2019		2020		2019	
Net actuarial (gain) loss	\$	5.3	\$	3.0	\$	0.1	\$	_	\$	5.4	\$	3.0	
Prior service cost (credit)		0.9		0.9						0.9		0.9	
Accumulated other comprehensive (income) loss, before taxes		6.2		3.9		0.1				6.3		3.9	
Accumulated other comprehensive (income) loss, after taxes	\$	4.7	\$	3.0	\$	0.1	\$		\$	4.8	\$	3.0	

Net Annual Benefit Costs Assumptions

The following table summarizes the weighted-average assumptions used for the components of net annual benefit cost:

		7	Years Ended	December 31	•	
		Pensions		(Other Benefits	
In millions, except percentages	2020	2019	2018	2020	2019	2018
Discount rate - qualified benefit plans (1)	3.15 %	4.20 %	3.55 %	— %	— %	— %
Discount rate - non-qualified benefit plans (1)	3.10 %	4.15 %	3.55 %	3.05 %	4.10 %	3.45 %
Expected return on plan assets	4.50 %	4.50 %	4.00 %	N/A	N/A	N/A
Components of net annual benefit cost:						
Service cost (2)	\$ 1.6	\$ 1.2	\$ 1.6	\$ —	\$ —	\$ —
Interest cost (3)	1.2	1.2	1.0		_	
Expected return on plan assets (3)	(1.2)	(1.0)	(0.9)		_	
Amortization of prior service cost (2)	0.1	0.1	0.1	_	_	_
Amortization of net actuarial and other (gain) loss (3)	0.1				_	
Recognized (gain) loss due to curtailments	0.1		0.2			_
Net annual benefit cost	\$ 1.9	\$ 1.5	\$ 2.0	\$ —	\$ —	\$ —

⁽¹⁾ The discount rate used to calculate pension and other post-retirement obligations was based on a review of available yields on high-quality corporate bonds. In selecting a discount rate, we placed particular emphasis on a discount rate yield-curve provided by our third-party actuary which takes into consideration the projected cash flows that represent the expected timing and amount of our plans' benefit payments.

Contributions

We made no voluntary cash contributions to our domestic hourly union defined benefit pension plan in the years ended December 31, 2020 and 2019. There are no required cash contributions to our domestic hourly union defined benefit pension plan in fiscal 2021, and we currently have no plans to make any voluntary cash contributions in fiscal 2021.

Fair Value Hierarchy

Following is a description of the valuation methodologies used for the investment measure at fair value. See Note 6 for the definition of fair value and the descriptions of Level 1, 2 and 3 in the fair value hierarchy.

Cash and short-term funds — Cash and quoted short-term instruments are valued at the closing price or the amount held on deposit by the custodian bank.

Mutual Funds — Mutual funds are valued at the closing price reported on the major market on which the individual securities are traded. Substantially all mutual funds are classified within Level 1 of the valuation hierarchy.

Pooled Funds — These investment vehicles are valued using the Net Asset Value (NAV) provided by the fund administrator. The NAV is based on the value of the underlying assets owned by the fund, minus its liabilities, and then divided by the number of shares outstanding.

Other — Other assets are represented by investments in a series limited partnership. These assets are not actively traded and classified as Level 2.

⁽²⁾ Amounts are recorded to "Cost of sales" on our consolidated statements of operations consistent with the employee compensation costs that participate in the plan.

⁽³⁾ Amounts are recorded to "Other (income) expense, net" on our consolidated statements of operations.

The following table presents our fair value hierarchy for our major categories of pension plan assets by asset class.

In millions	December 31, 2020	Quoted Prices in Active Markets for Identical Assets (Level 1)	Significant Other Observable Inputs (Level 2)	Significant Unobservable Inputs (Level 3)	Investments Measured at Net Asset Value
Cash and short-term investments	\$ 0.1	\$ 0.1	\$ —	\$ —	\$
Mutual funds	8.1	8.1			
Pooled funds	21.4	_	_	_	21.4
Other	1.6		1.6		_
Total assets	\$ 31.2	\$ 8.2	\$ 1.6	\$ —	\$ 21.4

In millions	Decembe	r 31, 2019	Active for Id	Prices in Markets lentical (Level 1)	Obs	cant Other servable s (Level 2)	Un	gnificant observable Inputs Level 3)	Meas	estments ured at Net et Value
Cash and short-term investments	\$	0.1	\$	0.1	\$	_	\$	_	\$	_
Mutual funds		3.0		3.0						
Pooled funds		22.4		_		_		_		22.4
Other		1.3				1.3				_
Total assets	\$	26.8	\$	3.1	\$	1.3	\$		\$	22.4

Estimated Future Benefit Payments

The following table reflects the estimated future benefit payments for our pension and other postretirement benefit plans. These estimates take into consideration expected future service, as appropriate.

In millions	Per	nsions	Other Benefits		
2021	\$	0.7	\$	_	
2022		1.0		_	
2023		1.1		_	
2024		1.2		_	
2025		1.4		_	
2026-2030		9.0		0.2	

Sensitivity Analysis

A one-half percent increase in the assumed discount rate would have decreased our qualified pension benefit obligations by \$3.4 million at December 31, 2020 and decreased our qualified pension benefit costs by \$0.2 million for 2020. A one-half percent decrease in the assumed discount rate would have increased our qualified pension obligations by \$3.9 million at December 31, 2020 and increased our qualified pension benefit cost by \$0.3 million for 2020.

A one-half percent increase in the assumed expected long-term rate of return on plan assets would have decreased our qualified pension costs by \$0.1 million for 2020. A one-half percent decrease in the assumed expected long-term rate of return on plan assets would have increased our qualified pension costs by \$0.1 million for 2020.

Note 16: Restructuring and Other (Income) Charges, net

Detail on the restructuring charges and other (income) charges, net is provided below.

	Year	er 31,	
In millions	2020	2019	2018
Gain on sale of assets and businesses	\$ —	\$ (0.4)	\$ (0.6)
Severance and other employee-related costs (1)	6.4	1.5	0.1
Other (2)	2.1	0.7	
Restructuring charges	8.5	1.8	(0.5)
Business transformation costs	10.0		
Other (income) charges, net	10.0	_	_
Total Restructuring and other (income) charges, net	\$ 18.5	\$ 1.8	\$ (0.5)

⁽¹⁾ Represents severance and employee benefit charges.

2020 activities

During the second quarter of 2020, we implemented a cost reduction initiative to realign our cost structure in response to reduced demand for some of our products in response to the COVID-19 pandemic. We recorded \$6.4 million in severance and other employee-related costs in the year ended December 31, 2020. Additionally, during the year ended December 31, 2020, related to this cost reduction initiative. Additionally, we recorded \$1.7 million related to an impairment of an operating lease asset that is no longer in use and \$0.4 million of other miscellaneous exit costs related to our Performance Chemicals derivatives operations in Palmeira, Brazil, which was closed in 2016.

2019 activities

During the third quarter of 2019, we initiated a reorganization as part of an effort to improve our Performance Chemical's workflow and efficiency to best serve our customers' needs and reduce costs. As a result of this reorganization, we recorded \$1.5 million in severance and other employee-related costs in the year ended December 31, 2019.

In April 2019, we sold assets from the Performance Chemicals derivatives operations in Palmeira, Brazil. These assets were part of a facility that was closed as a result of a restructuring event in 2016. As a result of this sale, we recorded \$0.4 million as a gain on sale of assets, as well as \$0.7 million charge related to other miscellaneous exit costs, in the year ended December 31, 2019.

2018 activities

In February 2018, we sold assets from the Performance Chemicals derivatives operations in Duque De Caxias, Rio de Janeiro, Brazil. These assets were part of a facility that was closed as a result of a restructuring event in 2016. As a result of this sale, we recorded \$0.6 million as a gain on sale of assets offset by other employee related costs of \$0.1 million for the year ended December 31, 2018.

⁽²⁾ Primarily represents costs associated with an impairment of an operating lease asset that is no longer in use and other miscellaneous exit costs.

Roll forward of Restructuring Reserves

The following table shows a roll forward of restructuring reserves that will result in cash spending (in millions):

	Balance at	t Change in Cash Balance at Change in		Balance at Change in Cash				Balance at
1	2/31/2018 (1)	Reserve (2)	Payments	1	12/31/2019 (1) Reserve (2) Payments		Payments	12/31/2020 (1)
\$	_	2.2	(1.8)	\$	0.4	6.8	(6.4)	\$ 0.8

⁽¹⁾ Included in "Accrued Expenses" on the consolidated balance sheet.

Other (income) charges, net

Business transformation initiative costs

In the first quarter of 2020, we embarked upon a business transformation initiative that includes the implementation of an upgraded enterprise resource planning ("ERP") system. This new ERP system will equip our employees with standardized processes and secure integrated technology that enable us to better understand and meet our customers' needs and compete in the marketplace. We expect this business transformation initiative and related ERP implementation to be a complex, multi-year project. It requires the integration of the new ERP system with multiple new and existing information systems and business processes, in order to maintain the accuracy of our books and records and to provide our management team with real-time information important to the operation of our business. Such an implementation initiative is a major financial undertaking and will require substantial time and attention of management and key employees. Costs incurred, during the year ended December 31, 2020, of \$10.0 million, represent costs directly associated with the business transformation initiative that, in accordance with GAAP, cannot be capitalized. Over the course of this initiative, we anticipate incurring approximately \$60-70 million of total costs, which includes \$17-20 million of non-capitalizable costs.

Note 17: Acquisitions

Perstorp Holding AB's Caprolactone Business

On February 13, 2019, we completed the acquisition of 100 percent of the equity of Perstorp UK Ltd. with Perstorp Holding AB ("Seller"), including the Seller's entire caprolactone business ("Caprolactone Business"), herein referred to as the "Caprolactone Acquisition." The Caprolactone Acquisition was completed for an aggregate purchase price of €578.9 million (\$652.5 million), less assumed debt of €100.4 million (\$113.1 million). At closing, the assumed debt was settled with an affiliate of the Seller. The Caprolactone Acquisition is being integrated into our Performance Chemicals segment and is included within our engineered polymers product line. Our revolving credit facility was utilized as the primary source of funds, along with available cash on hand, to fund the Caprolactone Acquisition.

The Caprolactone Acquisition has been integrated into our Performance Chemicals segment and represented as our engineered polymers product line. As a result, we are not able to separate operating performance of the Caprolactone Acquisition from our existing Performance Chemicals' operating results.

Purchase Price Allocation

The following table summarizes the consideration paid for the Caprolactone Business, the assets acquired, and liabilities assumed, which was finalized in the fourth quarter of 2019:

⁽²⁾ Includes severance and other employee-related costs, exited leases, contract terminations and other miscellaneous exit costs. Any asset write-downs including accelerated depreciation and impairment charges are not included in the above table.

Purchase Price Allocation

In millions	Weighted Average Amortization Period	Fair Value
Cash and cash equivalents		\$ 0.7
Accounts receivable, net		15.7
Inventories (1)		21.7
Prepaid and other current assets		1.9
Property, plant and equipment		86.3
Operating lease assets, net		1.8
Intangible assets (2)		
Customer relationships (5)	17 years	159.0
Developed technology (5)	12 years	64.8
Brands (5)	17 years	67.0
Non-compete agreement	3 years	0.5
Goodwill (3)		295.1
Other assets	_	1.3
Total fair value of assets acquired	:	\$ 715.8
Accounts payable		13.6
Accrued expenses		2.3
Long-term debt		113.1
Operating lease liabilities		1.7
Deferred income taxes	_	45.7
Total fair value of liabilities assumed		\$ 176.4
Cash and restricted cash acquired ⁽⁴⁾		1.5
	Total cash paid, less cash and restricted cash acquired	\$ 537.9

⁽¹⁾ Fair value of finished goods inventories acquired included a step-up in the value of \$8.4 million, all of which was expensed in the three months ended March 31, 2019. The expense is included in "Cost of sales" on the consolidated statement of operations. Inventories are accounted for on a FIFO basis of accounting.

Georgia-Pacific's Pine Chemical Business

On March 8, 2018, pursuant to the terms and conditions set forth in the asset purchase agreement with Georgia-Pacific Chemicals LLC, Georgia-Pacific LLC (together with Georgia-Pacific Chemicals LLC, "GP") and Ingevity Arkansas, LLC, a wholly-owned subsidiary of Ingevity, we completed the acquisition (the "Pine Chemical Acquisition") of substantially all the assets primarily used in GP's pine chemical business (the "Pine Chemical Business") for an aggregate purchase price of \$315.5

⁽²⁾ The aggregate amortization expense was \$19.1 million and \$14.4 million for the years ended December 31, 2020 and 2019, respectively. Estimated amortization expense is as follows: 2021 - \$19.2 million, 2022 - \$19.1 million, 2023 - \$19.0 million, 2024 - \$19.0 million, and 2025 - \$19.0 million. The estimated pre-tax amortization expense may fluctuate due to changes in foreign currency.

⁽³⁾ Goodwill consists of estimated future economic benefits arising from other assets acquired that could not be individually identified and separately recognized. This acquired goodwill has been included within our Performance Chemicals reporting unit, see Note 9 for further information regarding our allocation of goodwill among our reportable segments. None of the acquired goodwill will be deductible for income tax purposes.

⁽⁴⁾ Cash and cash equivalents and restricted cash were \$0.7 million and \$0.8 million, respectively, at closing. Restricted cash is included in "Prepaid and other current assets" on the consolidated balance sheet.

⁽⁵⁾ The fair values assigned to the Customer Relationships intangible asset was determined by using a multi-period excess earnings model ("MP-Model"). Significant assumptions utilized in MP-Model are the attrition rate, revenue growth rates, and the discount rate. The fair values assigned to the Developed Technology and Brands were determined using a relief from royalty model ("RfR-Model"). The RfR-Model's significant assumptions include the revenue growth rates, royalty rate, and discount rate considered in the aggregate.

million. The aggregate purchase price was finalized during the third quarter of 2018 with a final payment to GP in the amount of \$0.5 million to finalize the net working capital acquired on March 8, 2018. The Pine Chemical Business included the assets and facilities related to tall oil fractionation operations and the production or modification of tall oil fatty acids, tall oil rosins, rosin derivatives and formulated products. In addition, on the Pine Chemical Acquisition, the Company and GP entered into a 20-year, market-based crude tall oil ("CTO") supply contract with certain of Georgia-Pacific's paper mill operations.

The Pine Chemical Business was integrated into our Performance Chemicals segment and has been included within our results of operations since March 8, 2018. Although the integration was not complete, a substantial portion of the Pine Chemical Business was integrated into our existing Performance Chemicals operations as of September 30, 2018, subsequent to which, we were no longer able to separate net sales and operating performance of the Pine Chemical Acquisition from our existing Performance Chemicals' operating results.

Unaudited Pro Forma Financial Information

The following unaudited pro forma financial information assumes that the Caprolactone Acquisition as well as the Pine Chemical Acquisition occurred at the beginning of the periods presented. These unaudited pro forma results are presented for informational purposes only and are not necessarily indicative of what the actual results of operations would have been if the acquisitions occurred at the beginning of the periods presented, nor are they indicative of future results of operations. The pro forma results include additional interest expense on the debt issued to finance the acquisition, amortization and depreciation expense based on the estimated fair value and useful lives of intangible assets and tangible assets, and related tax effects. The pro forma results presented below are adjusted for the removal of Acquisition and other-related costs of \$35.3 million and \$12.2 million for the years ended December 31, 2019 and 2018.

	 Years Ended	Dece	mber 31,
In millions	 2019		2018
Net sales	\$ 1,310.6	\$	1,320.8
Income (loss) before income taxes	262.8		247.0
Diluted earnings (loss) per share attributable to Ingevity stockholders	\$ 5.01	\$	4.48

Acquisition and other-related costs

Costs incurred to complete and integrate the acquisitions noted above into our Performance Chemicals reporting segment are expensed as incurred on our consolidated statement of operations. The following table summarizes the costs incurred associated with these combined activities.

		Years Ended December 31,					
In millions		20)20		2019		2018
Legal and professional service fees		\$	1.8	\$	14.2	\$	6.9
Loss on hedging purchase price					12.7		3.9
	Acquisition-related costs		1.8		26.9		10.8
Inventory fair value step-up amortization (1)					8.4		1.4
Ac	cquisition and other-related costs	\$	1.8	\$	35.3	\$	12.2

⁽¹⁾ Included within "Cost of sales" on the consolidated statement of operations.

Note 18: Income Taxes

Domestic and foreign components of Income (loss) before income taxes are shown below:

	 Years Ended December 31,							
In millions	 2020		2019		2018			
Domestic	\$ 191.2	\$	203.2	\$	213.3			
Foreign	 43.9		24.7		8.5			
Total	\$ 235.1	\$	227.9	\$	221.8			

The provision (benefit) for income taxes consisted of:

	 Years Ended December 31,						
In millions	2020		2019	2018			
Current							
Federal	\$ 22.5	\$	19.9	\$	32.5		
State and local	5.1		5.0		6.0		
Foreign	 9.9		4.5		0.6		
Total current	\$ 37.5	\$	29.4	\$	39.1		
Deferred							
Federal	\$ 15.3	\$	13.8	\$	1.6		
State and local	(2.7)		2.5		(1.1)		
Foreign	 3.6		(1.5)		0.4		
Total deferred	\$ 16.2	\$	14.8	\$	0.9		
Provision (benefit) for income taxes	\$ 53.7	\$	44.2	\$	40.0		
	 	_		_			

We recorded \$(4.3) million, \$(0.9) million, and \$0.1 million of deferred tax provision (benefit) in components of other comprehensive income during the years ended December 31, 2020, 2019, and 2018, respectively.

The following table summarizes the major differences between taxes computed at the U.S. federal statutory rate and the actual income tax provision attributable to operations:

	Years Ended December 31,									
In millions, except percentage data		2020 2019								
Federal statutory tax rate	\$	49.4	\$	47.9	\$	46.6				
State and local income taxes, net of federal benefit		5.0		6.3		4.4				
Foreign income tax rate differential		1.5		1.3		1.0				
Changes in valuation allowance		(1.9)		(1.9)		(2.2)				
Deferred adjustments (including rate change)		3.9		(1.4)		(0.1)				
Noncontrolling interest in consolidated partnership		_		_		(2.7)				
Excess stock compensation		0.4		(5.9)		(0.9)				
Federal and state tax credits		(3.7)		(1.9)		(2.1)				
U.S. Tax Reform		_		_		(1.9)				
Foreign derived intangible income		(3.1)		(3.8)		(3.2)				
Officers compensation		0.5		3.3		0.6				
Other		1.7		0.3		0.5				
Provision (benefit) for income taxes	\$	53.7	\$	44.2	\$	40.0				
Effective tax rate		22.8 %		19.4 %		18.0 %				

The increase in our effective tax rate from 2019 to 2020 was primarily driven by the reduction in the excess stock compensation benefit derived by declining stock prices in 2020, as well as a rate increase in the United Kingdom ("UK"). This effective tax rate increase was partially offset by a reduction of the officer's compensation limitation due to forfeited equity awards already disallowed for tax purposes, as well as increased benefit due to the generation of additional state tax credits as a result of the new corporate headquarters.

The increase in our effective tax rate from 2018 to 2019 was driven by multiple factors. The August 1, 2018 acquisition of the remaining 30 percent noncontrolling interest in Purification Cellutions, LLC (see Note 13 for more information) resulted in an increase to our effective tax rate in 2019 as compared to 2018. We recognized \$5.0 million of excess tax benefits from the vesting of share-based awards. We incurred nondeductible acquisition-related charges during the year, resulting in a tax impact of \$1.4 million. Also, as a result of finalized regulations stemming from U.S. Tax Reform, we incurred tax expense relating to an adjustment of our net deferred tax liabilities to account for the future non-deductible portion of our officer's compensation of \$1.1 million. Additionally, in 2018, we adjusted our net deferred tax liabilities by \$1.9 million due to further interpretations of U.S. Tax Reform the impact of which did not repeat in 2019. The remaining driver to the change in our effective tax rate from 2018 to 2019 is due to an increase in our earnings recognized in foreign jurisdictions some of which are taxed at higher rates than our U.S. domestic earnings.

The significant components of deferred tax assets and liabilities are as follows

	December 31,				
In millions	2020		2019		
Deferred tax assets:					
Employee benefits	\$ 13.0	\$	12.0		
Net operating losses	10.6		15.4		
Leases	15.6		10.3		
Other	 14.2		7.4		
Total deferred tax assets	\$ 53.4	\$	45.1		
Valuation allowance	 (8.4)		(13.0)		
Total deferred tax assets, net of valuation allowance	\$ 45.0	\$	32.1		
Deferred tax liabilities:					
Fixed assets	\$ 99.0	\$	83.4		
Intangibles	35.8		28.6		
Inventory	2.3		3.4		
Leases	15.1		10.4		
Other	 1.7		1.6		
Total deferred tax liabilities	\$ 153.9	\$	127.4		
Net deferred tax asset (liability) (1)	\$ (108.9)	\$	(95.3)		

Presentation in the table above is on a gross basis, however due to jurisdictional netting, our net deferred tax asset and liability recorded on our consolidated balance sheets is \$8.1 million and \$117.0 million, respectively, as of December 31, 2020 and \$5.0 million and \$100.3 million, respectively, as of December 31, 2019.

Our net deferred tax liabilities increased \$13.6 million at December 31, 2020 as compared to December 31, 2019. Deferred tax liabilities associated with fixed assets increased significantly in 2020 due to an increase in assets placed in service in 2020 versus 2019 resulting in additional bonus depreciation deductions. Additionally, a rise in the UK tax rate caused an increase in our overall deferred tax liability. This increase in the liability was partially offset by increase in miscellaneous new deferred tax assets, including a capital loss carryover and deferred earn out associated with the ANGP asset acquisition. Additionally, as a part of the CARES Act, payments associated with payroll taxes were allowed to be extended into 2021 creating a deferred tax asset.

We have deferred tax assets, including net operating loss carryforwards, which are available to offset future taxable income. A valuation allowance has been provided where management has determined that it is more likely than not that the deferred tax assets will not be realized. In 2020, we recognized a tax benefit of \$2.7 million by releasing a valuation allowance that was associated with our Brazil operations. The decision to release the valuation allowance due to positive evidence supporting future taxable income available to offset these losses.

At December 31, 2020, foreign net operating loss carryforwards totaled \$33.2 million. Of this total, \$3.3 million will expire in 3 to 10 years and \$29.9 million has no expiration date.

Due to the global nature of our operations, a portion of our cash is held outside the U.S. The cash and cash equivalent balance at December 31, 2020 included \$88.2 million held by our foreign subsidiaries. At December 31, 2020, 2019, and 2018, no deferred income taxes have been provided for our share of undistributed net earnings of foreign operations due to management's intent to reinvest such amounts indefinitely. The determination of the amount of taxes that may be due if earnings are remitted is not practicable because such liability, if any, is dependent on circumstances that exist if and when remittance occurs. The circumstances that would affect the calculations include the source location and amount of the distribution, the underlying tax rate already paid on the earnings, foreign withholding taxes, the opportunity to use foreign tax

credits, and the potential impact of U.S. Tax Reform. Positive undistributed earnings considered to be indefinitely reinvested totaled \$35.6 million at December 31, 2020.

A reconciliation of the beginning and ending amounts of unrecognized tax benefits is as follows:

	December 31,						
In millions		2020		2019		2018	
Balance at beginning of year	\$	0.1	\$	0.3	\$	0.3	
Additions for tax positions related to current year		_		_		0.2	
Reduction from lapse of statute of limitation				(0.2)		(0.2)	
Balance at end of year	\$	0.1	\$	0.1	\$	0.3	

As of December 31, 2020, 2019, and 2018, \$0.1 million, \$0.1 million, and \$0.3 million, respectively, of unrecognized tax benefit, including penalties and interest, would, if recognized, impact our effective tax rate. We recognize interest accrued related to unrecognized tax benefits and penalties as income tax expense.

Note 19: Commitments and Contingencies

Legal Proceedings

We are, from time to time, involved in routine litigation incidental to our operations. None of the litigation in which we are currently involved, individually or in the aggregate, is material to our consolidated financial condition, liquidity or results of operations nor are we aware of any material pending or contemplated proceedings.

Note 20: Segment Information

Ingevity's operating segments are (i) Performance Materials and (ii) Performance Chemicals, a description of both operating segments is included in Note 1.

	Years Ended December 31,					
In millions		2020		2019		2018
Net sales						
Performance Materials	\$	510.0	\$	490.6	\$	400.4
Performance Chemicals		706.1		802.3		733.2
Total net sales (1)	\$	1,216.1	\$	1,292.9	\$	1,133.6
Segment EBITDA (2)						
Performance Materials	\$	249.2	\$	213.4	\$	169.4
Performance Chemicals		148.7		183.5		151.1
Total Segment EBITDA (2)	\$	397.9	\$	396.9	\$	320.5
Interest expense		(47.1)		(54.6)		(33.2)
Interest income		4.9		7.7		3.4
(Provision) benefit for income taxes		(53.7)		(44.2)		(40.0)
Depreciation and amortization - Performance Materials		(31.2)		(24.2)		(22.2)
Depreciation and amortization - Performance Chemicals		(69.0)		(60.8)		(34.8)
Pension and postretirement settlement and curtailment charges (income), net (3)		(0.1)		_		(0.2)
Restructuring and other income (charges), net (4)		(18.5)		(1.8)		0.5
Acquisition and other-related costs (5)		(1.8)		(35.3)		(12.2)
Net (income) loss attributable to noncontrolling interests						(12.7)
Net income (loss) attributable to Ingevity stockholders	\$	181.4	\$	183.7	\$	169.1

⁽¹⁾ Relates to external customers only, all intersegment sales and related profit have been eliminated in consolidation.

⁽²⁾ Segment EBITDA is the primary measure used by our chief operating decision maker to evaluate the performance of and allocate resources among our operating segments. Segment EBITDA is defined as segment revenue less segment operating expenses (segment operating expenses consist of costs of sales, selling, general and administrative expenses, other (income) expense, net, excluding depreciation and amortization). We have excluded the following items from segment EBITDA: interest expense, net associated with corporate debt facilities, income taxes, depreciation, amortization, restructuring and other (income) charges, acquisition and other-related costs, pension and postretirement settlement and curtailment (income) charge.

Our pension and postretirement settlement and curtailment (income) charges are related to the acceleration of prior service costs, as a result of a reduction in the number of participants within the Union Hourly defined benefit pension plan during 2018 and 2020. These are excluded from our segment results because we consider these costs to be outside our operational performance. We continue to include the service cost, amortization of prior service cost, interest costs, expected return on plan assets, and amortized actual gains and losses in our segment EBITDA.

⁽⁴⁾ For the year ended December, 31, 2020, charges of \$7.4 million and \$11.1 million relate to the Performance Materials segment and Performance Chemicals segment, respectively. For the years end December 31, 2019 and 2018, all income (charges) relate to the Performance Chemicals segment. Information about how restructuring and other (income) charges relate to our reporting segments is discussed in Note 16.

⁽⁵⁾ These charges are associated with the acquisition and integration of the Pine Chemical Business and the acquisition and integration of the Caprolactone Business. For more detail on these charges see Note 17 within these consolidated financial statements.

	Depreciation and amortization					Capital expenditures							
	Years Ended December 31,				Years Ended December 31,				1,				
In millions	2020		2019		2018		2020			2019		2018	
Performance Materials	\$	31.2	\$	24.2	\$	22.2	\$	30.6	\$	77.6	\$	65.4	
Performance Chemicals		69.0		60.8		34.8		51.5		37.2		28.5	
Total	\$	100.2	\$	85.0	\$	57.0	\$	82.1	\$	114.8	\$	93.9	

Property, plant, and equipment, net		December 31,			
In millions	2020	2020		2019	
North America	\$	536.6	\$	499.5	
Asia Pacific		77.0		75.6	
Europe, Middle East, and Africa		89.9		89.5	
South America		0.1		0.1	
Property, plant, and equipment, net	\$	703.6	\$	664.7	

Total assets	Decer	December 31,			
In millions	2020		2019		
Performance Materials	\$ 751.4	\$	642.9		
Performance Chemicals	1,534.0		1,485.4		
Total segment assets ⁽¹⁾	\$ 2,285.4	\$	2,128.3		
Corporate and other	49.1		13.4		
Total assets	\$ 2,334.5	\$	2,141.7		

⁽¹⁾ Segment assets exclude assets not specifically managed as part of one specific segment herein referred to as "Corporate and other."

Note 21: Earnings (Loss) per Share

Basic earnings (loss) per share is computed by dividing net income (loss) for the period by the weighted average number of common shares outstanding during the period. Diluted earnings (loss) per share is computed by dividing net income (loss) for the period by the weighted average number of shares of common stock and potentially dilutive common stock outstanding for the period. The calculation of diluted net income per share excludes all anti-dilutive common shares.

	Years E							
In millions (except share and per share data)	2020			2019		2018		
Net income (loss) attributable to Ingevity stockholders		181.4	\$	183.7	\$	169.1		
Basic and Diluted earnings (loss) per share (1)								
Basic earnings (loss) per share	\$	4.39	\$	4.39	\$	4.02		
Diluted earnings (loss) per share	\$	4.37	\$	4.35	\$	3.97		
Shares (2)								
Weighted average number of shares of common stock outstanding - Basic		41,330		41,801		42,037		
Weighted average additional shares assuming conversion of potential common				•				
shares		217		399		564		
Shares - diluted basis		41,547		42,200		42,601		

⁽¹⁾ Diluted earnings (loss) per share is calculated using net income (loss) available to common stockholders divided by diluted weighted-average shares of common shares outstanding during each period, which includes the dilutive effect of outstanding equity awards.

The following average number of potential common shares were antidilutive and, therefore, were not included in the diluted earnings per share calculation:

	Years 1	Years Ended December 31,							
In thousands	2020	2019	2018						
Average number of potential common shares - antidilutive	177	66	84						

⁽²⁾ Shares are presented in thousands.

Note 22: Supplemental Information

The following tables include details of prepaid and other current assets, other assets, accrued expenses and other liabilities as presented on the consolidated balance sheets, as well as other (income) expense, net on the consolidated statement of operations:

Prepaid and other current assets:		December 31,						
In millions	202	20	2019					
Income and value added tax receivables	\$	9.4	\$ 14.6					
Prepaid freight and supply agreements		1.7	1.3					
Prepaid insurance		3.0	2.1					
Non-trade receivables		3.6	4.5					
Advances to suppliers		0.6	0.5					
Prepaid software as a service		3.2	1.5					
Contract asset (Note 5)		5.7	6.2					
Restricted cash		0.7	8.1					
Other		6.1	5.4					
	\$	34.0	\$ 44.2					

Other assets:	December 31,						
In millions		2020		2019			
Deferred financing charges	\$	3.8	\$	2.5			
Capitalized software, net		18.9		16.9			
Land-use rights		5.1		5.6			
Planned major maintenance activities		2.8		3.5			
Deferred software as a service		2.2		0.2			
Deferred compensation plan assets (Note 6)		12.5		9.8			
Net investment hedge (Note 10)		_		3.0			
Finance lease assets, net (Note 14)		0.8		1.2			
Other		6.7		7.5			
	\$	52.8	\$	50.2			

Accrued expenses:	December 31,				
In millions	2020			2019	
Accrued interest	\$	13.6	\$	10.8	
Accrued taxes		6.2		1.5	
Accrued freight		3.9		4.2	
Accrued rebates		6.0		3.9	
Restructuring reserves (Note 16)		0.8		0.4	
Accrued royalties and commissions		2.5		2.0	
Currency exchange and natural gas contracts (Note 10)		0.3		0.5	
Accrued energy		2.2		2.0	
Other		11.1		8.0	
	\$	46.6	\$	33.3	

Other liabilities:		December 31,							
In millions	20	020	2019						
Deferred compensation arrangements (Note 6)	\$	11.6	\$ 10.0						
Pension & OPEB liabilities (Note 15)		14.8	10.6						
Unrecognized tax benefits (Note 18)		0.1	0.1						
Net investment hedge (Note 10)		8.6							
Interest rate swaps (Note 10)		8.9	3.9						
New market tax credit payable (Note 11)		1.8	1.7						
Contingent consideration (Note 6)		0.8							
Other		3.3	3.7						
	\$	49.9	\$ 30.0						

Other (income) expense, net:	Years Ended December 31,						
In millions	2	2020	201	9	2018		
Foreign currency translation (income)/loss	\$	(5.8)	\$	0.2 \$	2.0		
Royalty and sundry (income)/loss		(0.4)		(1.9)	(0.8)		
Impairment of equity investment (Note 6)		1.4		_	1.5		
Other (income)/expense, net		0.7		(2.6)	(1.7)		
	\$	(4.1)	\$	(4.3) \$	1.0		

Note 23: Quarterly Financial Information (Unaudited)

The following is a summary of the quarterly results of operations for the years ended December 31, 2020 and 2019.

	2020						2019									
In millions, except earnings per share amounts		1Q		2Q		3Q		4Q		1Q		2Q		3Q		4Q
Net sales	\$	288.2	\$	270.6	\$	331.7	\$	325.6	\$	276.8	\$	352.8	\$	359.9	\$	303.4
Gross profit		114.6		83.9		139.6		127.4		97.1		134.4		139.5		111.0
Income (loss) before taxes		55.2		25.4		88.1		66.4		22.7		72.7		77.4		55.1
Net income (loss)	_	45.3	_	20.2	_	69.9	_	46.0	_	22.7	_	56.8	_	59.9	_	44.3
Basic earnings (loss) per common share attributable to Ingevity stockholders (1)	\$	1.09	\$	0.49	\$	1.69	\$	1.12	\$	0.54	\$	1.36	\$	1.42	\$	1.06
Diluted earnings (loss) per common share attributable to Ingevity stockholders (1)	\$	1.08	\$	0.49	\$	1.69	\$	1.11	\$	0.54	\$	1.34	\$	1.41	\$	1.05
Weighted average shares outstanding																
Basic		41.7		41.2		41.3		41.1		41.7		41.8		42.3		41.8
Diluted		42.0		41.4		41.5		41.4		42.2		42.2		42.6		42.2

⁽¹⁾ Basic and diluted earnings (loss) per share are calculated using the weighted average number of common shares outstanding for the period. The sum of quarterly earnings per common share may differ from the full-year amount.

INGEVITY CORPORATION

SCHEDULE II - VALUATION AND QUALIFYING ACCOUNTS AND RESERVES

FOR YEARS ENDED DECEMBER 31, 2020, 2019, and 2018

				Provision/ (Benefit				
(in millions)	Beg	llance, ginning Year	Charged to Costs and Expenses	Charged to Other Comprehensive Income	Charged to Retained Earnings (1)	Write-offs (2)	E	alance, Ind of Year
December 31, 2020								
Accounts receivable credit loss allowance (3)	\$	0.5	1.4	_	_	_	\$	1.9
Held-to-maturity debt securities credit loss allowance (4)	\$	_	0.3	_	0.6	_	\$	0.9
Deferred tax valuation allowance	\$	13.0	(1.9)	(2.7)	_	_	\$	8.4
December 31, 2019								
Accounts receivable credit loss allowance (3)	\$	0.4	0.1	_	_	_	\$	0.5
Deferred tax valuation allowance	\$	15.5	(1.9)	(0.6)		_	\$	13.0
December 31, 2018								
Accounts receivable credit loss allowance (3)	\$	0.4	_	_	_	_	\$	0.4
Deferred tax valuation allowance	\$	20.4	(2.6)	(2.3)	_	_	\$	15.5

⁽¹⁾ See Note 4 within the consolidated financial statements included within Part II. Item 8 of the Form 10-K for more information related to our adoption of the new accounting standard related to credit losses (ASU 2016-13).

⁽²⁾ Write-offs are net of recoveries.

⁽³⁾ Allowance for credit losses on accounts receivable is included within Accounts receivable, net on the consolidated balance sheet.

⁽⁴⁾ Allowance for credit losses on held-to-maturity debt securities is included within Restricted investment on the consolidated balance sheet.

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

None.

ITEM 9A. CONTROLS AND PROCEDURES

The Company maintains a system of disclosure controls and procedures designed to provide reasonable assurance that information required to be disclosed in the Company's reports filed or submitted under the Securities Exchange Act of 1934, as amended ("Exchange Act") is recorded, processed, summarized and reported within the time periods specified in the rules and forms of the SEC. These controls and procedures also provide reasonable assurance that information required to be disclosed in such reports is accumulated and communicated to management as appropriate to allow timely decisions regarding required disclosures.

As of December 31, 2020, the Company's Chief Executive Officer, who currently also serves as Ingevity's Chief Financial Officer ("CEO and CFO"), together with management, conducted an evaluation of the effectiveness of the Company's disclosure controls and procedures pursuant to Rules 13a-15(b) and 15d-15(b) of the Exchange Act. Based on that evaluation, the CEO and CFO concluded that these disclosure controls and procedures are effective at the reasonable assurance level.

Changes in Internal Control over Financial Reporting

There have been no changes in the Company's internal control over financial reporting that occurred during the quarter ended December 31, 2020 that have materially affected, or are reasonably likely to materially affect, the Company's internal control over financial reporting. We have not experienced any material impact to our internal controls over financial reporting despite the fact that many of our employees are working remotely due to the COVID-19 pandemic. We are continually monitoring and assessing the COVID-19 pandemic and its impact on the design and operating effectiveness of our internal controls over financial reporting.

We are also in the beginning stages of a multi-year implementation of a new global enterprise resource planning ("ERP") system, which will replace our existing operating and financial systems. The implementation is expected to occur in phases over the next several years. Currently, we have had no changes in our internal controls over financial reporting with respect to this implementation, however, as the implementation progresses, we will give appropriate consideration to whether any process changes necessitate changes in the design of and testing for effectiveness of internal controls over financial reporting.

Management's Report on Internal Control over Financial Reporting

Refer to Management's Report on Internal Control over Financial Reporting, which is included within Part II. Item 8 of this Form 10-K and is incorporated by reference to this Item 9A.

Report of Independent Registered Public Accounting Firm

Refer to the Report of Independent Registered Public Accounting Firm, which is included within Part II. Item 8 of this Form 10-K and is incorporated by reference to this Item 9A.

ITEM 9B. OTHER INFORMATION

None.

PART III

ITEM 10. DIRECTORS, EXECUTIVE OFFICERS AND CORPORATE GOVERNANCE

Information concerning directors, appearing under the caption "Proposal No. 1 - Election of Directors" in our Proxy Statement to be filed with the SEC in connection with the Annual Meeting of Stockholders scheduled to be held on April 22, 2021 (the "Proxy Statement"), information concerning executive officers, appearing under the caption "Information about our Executive Officers" in Part I of this Form 10-K, information concerning the Audit Committee, appearing under the caption "Board and Governance Matters - Corporate Governance - Committees of our Board of Directors - Audit Committee" in the Proxy Statement, and Code of Ethics, appearing under the caption "Codes of Business Conduct and Ethics" in the Proxy Statement, is incorporated herein by reference in response to this Item 10.

ITEM 11. EXECUTIVE COMPENSATION

The information contained in the Proxy Statement in the section titled "Executive Compensation Matters" in the section titled "Board and Governance Matters - Director Compensation," and in the section titled "Board and Governance Matters - Corporate Governance - LD&C Committee Interlocks and Insider Participation" is incorporated herein by reference in response to this Item 11.

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

The information contained in the section titled "Ownership of Equity Securities" in the Proxy Statement, with respect to security ownership of certain beneficial owners and management, is incorporated herein by reference in response to this Item 12.

Equity Compensation Plan Information

The table below sets forth information with respect to compensation plans under which equity securities of Ingevity are authorized for issuance as of December 31, 2020. All of the equity compensation plans pursuant to which we are currently granting equity awards have been approved by stockholders.

Plan Category	Number of Securities to be issued upon exercise of outstanding options and restricted stock awards (A) (2)	Weighted- average exercise price of outstanding options and restricted stock awards (B) (3)	Number of Securities remaining available for future issuance under equity compensation plans (excluding securities reflected in column (A))
Equity Compensation Plans approved by stockholders ⁽¹⁾	692,422	\$ 57.28	3,360,216

- (1) Plans approved by WestRock as sole stockholder prior to the Separation while the Company was a wholly owned subsidiary.
- Includes 345,867 stock options, 168,292 restricted stock units (RSUs) and 166,028 performance-based restricted stock units (PSUs) granted to employees and 12,235 DSUs to be issued to directors. In accordance with SEC rules, the number of shares to be issued for performance based stock unit awards has been calculated based on the assumption that the awards granted in 2018 will pay out at the maximum performance level (2x) because these awards are tracking above target, the awards granted in 2019 will pay out at the threshold (0.5x) because these awards are tracking below threshold, and the awards granted in 2020 will pay out at the target (1.0x) because these awards are tracking below target. The target payout of the performance based vesting restricted stock unit awards is 141,565 shares.
- (3) Represents the weighted-average exercise price of the outstanding stock options only. The outstanding RSUs and PSUs are not included in this calculation.
- (4) Includes 130,023 shares available for future issuance under the 2017 Ingevity Corporation Employee Stock Purchase Plan.

ITEM 13. CERTAIN RELATIONSHIPS AND RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE

The information contained in the Proxy Statement concerning our independent directors under the caption "Corporate Governance - Director Independence" and the information contained in the Proxy Statement concerning related party transactions and our review, approval or ratification thereof appearing under the caption "Related Party Transactions" is incorporated herein by reference in response to this Item 13.

ITEM 14. PRINCIPAL ACCOUNTING FEES AND SERVICES

The information contained in the Proxy Statement in the section titled "Proposal No. 2 - To Ratify Appointment of Independent Registered Public Accounting Firm" is incorporated herein by reference in response to this Item 14.

PART IV

ITEM 15. EXHIBITS

- (a) Documents filed with this Report
 - i. Consolidated financial statements of Ingevity Corporation and its subsidiaries are incorporated under Item 8 of this Form 10-K.
 - ii. The following supplementary financial information is filed in this Form 10-K:

	Page
Financial Statements Schedule II – Valuation and qualifying accounts and reserves for the years ended	
December 31, 2020, 2019, and 2018	<u>109</u>

The schedules not included herein are omitted because they are not applicable or the required information is presented in the financial statements or related notes.

iii. Exhibits: See attached Index of Exhibits

(b) Exhibits

Exhibit No.	Exhibit Description
2.1	Separation and Distribution Agreement between Ingevity Corporation and WestRock Company (incorporated by reference to Exhibit 2.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 16, 2016).
2.2	Asset Purchase Agreement, by and among Georgia-Pacific Chemicals, LLC, Georgia-Pacific LLC, Ingevity Arkansas, LLC, and Ingevity Corporation, dated as of August 22, 2017 (incorporated by reference to Exhibit 2.1 to Form 8-K (File No. 001-37586) filed August 22, 2017).
2.3	First Amendment to Asset Purchase Agreement among Ingevity Corporation, Ingevity Arkansas, LLC, Georgia-Pacific Chemicals LLC and Georgia-Pacific LLC, dated as of March 8, 2018 (incorporated by reference to Exhibit 2.2 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on March 8, 2018).
2.4	Agreement for the Sale and Purchase of Perstorp UK Ltd., dated as of December 10, 2018, by and amount Perstorp AB and Ingevity Corporation (incorporated by reference to Exhibit 2.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on December 10, 2018).
3.1	Ingevity Corporation Second Amended and Restated Certificate of Incorporation (incorporated by reference to Exhibit 3.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on April 25, 2019).
3.2	Ingevity Corporation Amended and Restated Bylaws (incorporated by reference to Exhibit 3.2 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on April 25, 2019).
4.1	Indenture, dated as of January 24, 2018, among Ingevity Corporation, the Guarantors, and U.S. Bank National Association, a national banking association (incorporated by reference to Exhibit 4.1 to Form 8-K filed January 24, 2018).
4.2	Indenture, dated as of October 28, 2020, among Ingevity Corporation, the guarantors party thereto and U.S. Bank National Association, as trustee (incorporated by reference to Exhibit 4.1 to Form 8-K filed October 28, 2020).
4.3	Description of Registrant's Securities.
10.1	Tax Matters Agreement between Ingevity Corporation and WestRock Company (incorporated by reference to Exhibit 10.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 16, 2016).

Exhibit No.	Exhibit Description
10.2	Employee Matters Agreement between Ingevity Corporation and WestRock Company (incorporated by reference to Exhibit 10.3 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 16, 2016).
10.3	Covington Plant Services Agreement between Ingevity Virginia Corporation and WestRock Virginia, LLC (incorporated by reference to Exhibit 10.2 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 11, 2016).
10.4	Covington Plant Ground Lease Agreement between Ingevity Virginia Corporation and WestRock Virginia, LLC (incorporated by reference to Exhibit 10.3 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 11, 2016).
10.5	Crude Tall Oil and Black Liquor Soap Skimmings Agreement by and between Ingevity Corporation, WestRock Shared Services, LLC and WestRock MWV, LLC (incorporated by reference to Exhibit 10.4 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 16, 2016).
10.6	Amendment No. 1 dated March 1, 2017, to Crude Tall Oil and Black Liquor Soap Skimming Agreement by and between WestRock Shared Services, LLC, WestRock MWV, LLC, on behalf of the affiliates of WestRock Company, and Ingevity Corporation. (incorporated by reference to Exhibit 10.7 to the Company's Quarterly Report on Form 10-Q, as filed with the U.S. Securities and Exchange Commission on May 4, 2017).
10.7	Credit Agreement, dated as of March 7, 2016, among Ingevity Corporation, as U.S. borrower, the lenders from time to time party thereto and Wells Fargo Bank, N.A., as administrative agent (incorporated by reference to Exhibit 10.8 to the Company's Amendment No. 2 to Form 10, as filed with the U.S. Securities and Exchange Commission on March 7, 2016).
10.8	Incremental Facility Agreement and Amendment No. 1, by and among Ingevity Corporation, Ingevity Holdings SPRL, the other loan parties party thereto, the lenders party thereto and Wells Fargo Bank, N.A., as administrative agent, dated as of August 21, 2017 (incorporated by reference to Exhibit 10.1 to Form 8-K (File No. 001-37586) filed August 22, 2017).
10.9	Incremental Facility Agreement 2nd Amendment No. 2, by and among Ingevity Corporation, Ingevity Holdings SPRL, the other loan parties party thereto, the lenders party thereto and Wells Fargo Bank, N.A., as administrative agent, dated as of August 7, 2018 (incorporated by reference to Exhibit 10.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on August 9, 2018).
10.10	Amendment No. 3, by and among Ingevity Corporation, Ingevity Holdings SPRL, the other loan parties party thereto, the lenders party thereto and Wells Fargo Bank, N.A., as administrative agent (incorporated by reference to Exhibit 10.1 to Form 8-K (File No. 001-37586) filed March 7, 2019).
10.11	Incremental Facility Agreement and Amendment No. 4, by and among Ingevity Corporation, Ingevity Holdings SPRL, the other loan parties party thereto, the lenders party thereto and Wells Fargo Bank, N.A., as administrative agent (incorporated by reference to Exhibit 10.2 to Form 8-K (File No. 001-37586) filed March 7, 2019).
10.12	Incremental Facility Agreement and Amendment No. 5, by and among Ingevity Corporation, Ingevity Holdings SPRL, the other loan parties party thereto, the lenders party thereto and JPMorgan Chase Bank, N.A., as successor administrative agent and Wells Fargo Bank, N.A., as resigning administrative agent (incorporated by reference to Exhibit 10.1 to Form 8-K filed October 28, 2020).
10.13	Intellectual Property Agreement by and between WestRock Company and Ingevity Corporation (incorporated by reference to Exhibit 10.5 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on May 16, 2016).
10.14+	Employment Letter, dated September 18, 2015, between WestRock Company, Ingevity Corporation and John Fortson (incorporated by reference to Exhibit 10.10 to the Company's Amendment No. 3 to Form 10, as filed with the U.S. Securities and Exchange Commission on April 4, 2016).

P. Burges	ent Letter, dated October 2, 2015, between WestRock Company, Ingevity Corporation and Katherine on (incorporated by reference to Exhibit 10.11 to the Company's Amendment No. 3 to Form 10, as the U.S. Securities and Exchange Commission on April 4, 2016).
Wilson (ii	ent Letter, dated July 24, 2015, between WestRock Company, Ingevity Corporation and Michael acorporated by reference to Exhibit 10.12 to the Company's Amendment No. 3 to Form 10, as filed I.S. Securities and Exchange Commission on April 4, 2016).
Exhibit 10	Corporation Amended and Restated 2016 Omnibus Incentive Plan (incorporated by reference to 0.1 to the Company's Current Report on Form 10-Q, as filed with the U.S. Securities and Exchange on on October 30, 2019).
WestRock	eement, between Ingevity Corporation, The Bank of New York Mellon Trust Company, N.A. and Company (incorporated by reference to Exhibit 10.1 to the Company's Current Report on Form 8-K, th the U.S. Securities and Exchange Commission on May 11, 2016).
	option Award Term under the Ingevity Corporation 2016 Omnibus Incentive Plan (incorporated by to Exhibit 10.13a to the company's Quarterly Report on Form 10-Q for the quarterly period ended 016).
Incentive	erformance-based Restricted Stock Unit Terms under the Ingevity Corporation 2016 Omnibus Plan (incorporated by reference to Exhibit 10.13b to the company's Quarterly Report on Form 10-Q arterly period ended June 30, 2016).
	eplacement Cash Awards under the Ingevity Corporation 2016 Omnibus Incentive Plan (incorporated ce to Exhibit 10.13c to the company's Quarterly Report on Form 10-Q for the quarterly period ended 016).
Incentive	estricted Stock Unit Terms (three year vesting) under the Ingevity Corporation 2016 Omnibus Plan (incorporated by reference to Exhibit 10.13d to the company's Quarterly Report on Form 10-Q arterly period ended June 30, 2016).
Plan (inco	estricted Stock Unit Terms (cliff vesting) under the Ingevity Corporation 2016 Omnibus Incentive rporated by reference to Exhibit 10.13e to the company's Quarterly Report on Form 10-Q for the period ended June 30, 2016).
Incentive	restricted Stock Unit Terms (D. Michael Wilson) under the Ingevity Corporation 2016 Omnibus Plan (incorporated by reference to Exhibit 10.13f to the company's Quarterly Report on Form 10-Quarterly period ended June 30, 2016).
Omnibus	loyee Director Terms and Conditions for Restricted Stock Units under the Ingevity Corporation 2016 Incentive Plan (incorporated by reference to Exhibit 10.14g to the company's Annual Report on Form he year ended December 31, 2016).
the Ingevi	loyee Director Terms and Conditions for Deferred Stock Units in lieu of Restricted Stock Units under ty Corporation 2016 Omnibus Incentive Plan (incorporated by reference to Exhibit 10.14h to the s Annual Report on Form 10-K for the year ended December 31, 2016).
the Ingevi	loyee Director Terms and Conditions for Deferred Stock Units in lieu of Annual Cash Retainer under ty Corporation 2016 Omnibus Incentive Plan (incorporated by reference to Exhibit 10.14i to the s Annual Report on Form 10-K for the year ended December 31, 2016).
	Corporation Deferred Compensation Plan, effective January 1, 2016. (incorporated by reference to 0.15 to the company's Annual Report on Form 10-K for the year ended December 31, 2016).
	Corporation Non-Employee Director Deferred Compensation Plan (incorporated by reference to 0.16 to the company's Annual Report on Form 10-K for the year ended December 31, 2016).

Exhibit No.	Exhibit Description
10.22+	Ingevity Corporation Non-Employee Director Compensation Policy (incorporated by reference to Exhibit 10.3 to the company's Current Report on Form 10-Q, as filed with the U.S. Securities and Exchange Commission on May 2, 2019).
10.23+	Change in control and severance agreement between Ingevity Corporation and D. Michael Wilson dated March 1, 2017 (incorporated by reference to Exhibit 10.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on March 7, 2017).
10.24+	Separation and Release Agreement, between Ingevity Corporation and D. Michael Wilson, dated as of February 20, 2020 (incorporated by reference to Exhibit 10.24 to the Company's Annual Report on Form 10-K, as filed with the U.S. Securities and Exchange Commission on February 26, 2020).
10.25+	Change in control and severance agreement between Ingevity Corporation and John C. Fortson dated August 21, 2020 (incorporated by reference to Exhibit 10.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on August 24, 2020).
10.26+	Change in control and severance agreement between Ingevity Corporation and Katherine P. Burgeson dated March 1, 2017 (incorporated by reference to Exhibit 10.3 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on March 7, 2017).
10.27+	Change in control and severance agreement between Ingevity Corporation and S. Edward Woodcock, Jr. dated March 1, 2017 (incorporated by reference to Exhibit 10.4 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on March 7, 2017).
10.28+	Change in control and severance agreement between Ingevity Corporation and Michael P. Smith dated March 1, 2017 (incorporated by reference to Exhibit 10.28 to the Company's Annual Report on Form 10-K, as filed with the U.S. Securities and Exchange Commission on February 26, 2020).
10.29+	Change in control and severance agreement between Ingevity Corporation and Stacy Cozard dated January 8, 2021.
10.30	Crude Tall Oil Supply Agreement between Ingevity Corporation and Georgia-Pacific LLC, dated as of March 8, 2018 (incorporated by reference to Exhibit 10.1 to the Company's Current Report on Form 8-K, as filed with the U.S. Securities and Exchange Commission on March 8, 2018).
10.31	Amendment to the Crude Tall Oil Supply Agreement, dated as of May 1, 2020, by and between Ingevity Corporation and Georgia-Pacific LLC.
21.1	Ingevity Corporation List of Significant Subsidiaries
23.1	Consent of PricewaterhouseCoopers LLP
31.1	Rule 13a-14(a)/15d-14(a) Certification of the Company's Principal Executive Officer and Principal Financial Officer.
32.1	Section 1350 Certification of the company's Principal Executive Officer and Principal Financial Officer. The information contained in this Exhibit shall not be deemed filed with the Securities and Exchange Commission nor incorporated by reference in any registration statement filed by the registrant under the Securities Act of 1933, as amended.
101	Inline XBRL Instance Document and Related Items - the instance document does not appear in the Interactive Data File because its XBRL tags are embedded within the Inline XBRL document.
104	The cover page from the Company's Annual Report on Form 10-K formatted in Inline XBRL (included in Exhibit 101).

⁺ Management contract or compensatory plan or arrangement

ITEM 16. FORM 10-K SUMMARY

None.

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.

INGEVITY CORPORATION (Registrant)

By:	/S/ JOHN C. FORTSON	
	<u> </u>	

John C. Fortson

President and Chief Executive Officer and Interim Chief Financial Officer and Treasurer

(Duly Authorized Officer)

Date: February 19, 2021

Pursuant to the requirements of the Securities and 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/ John C. Fortson John C. Fortson	Director, President and Chief Executive Officer and Interim Chief Financial Officer and Treasurer (Principal Executive Officer and Principal Financial Officer)	February 19, 2021
/s/ Phillip J. Platt Phillip J. Platt	Chief Accounting Officer and Corporate Controller (Principal Accounting Officer)	February 19, 2021
/s/ Jean S. Blackwell Jean S. Blackwell	Director	February 19, 2021
/s/ Luis Fernandez-Moreno Luis Fernandez-Moreno	Director	February 19, 2021
/s/ J. Michael Fitzpatrick J. Michael Fitzpatrick	Director	February 19, 2021
/s/ Diane H. Gulyas Diane H. Gulyas	Director	February 19, 2021
/s/ Frederick J. Lynch Frederick J. Lynch	Director	February 19, 2021
/s/ Karen G. Narwold Karen G. Narwold	Director	February 19, 2021
/s/ Daniel F. Sansone Daniel F. Sansone	Director	February 19, 2021

Non-GAAP Financial Measures Reconciliation

Ingevity has presented certain financial measures, defined below, which have not been prepared in accordance with U.S. generally accepted accounting principles ("GAAP") and has provided a reconciliation to the most directly comparable financial measure calculated in accordance with GAAP. These financial measures are not meant to be considered in isolation or as a substitute for the most directly comparable financial measure calculated in accordance with GAAP. The company believes these non-GAAP measures provide investors, potential investors, securities analysts and others with useful information to evaluate the performance of the business, because such measures, when viewed together with our financial results computed in accordance with GAAP, provide a more complete understanding of the factors and trends affecting our historical financial performance and projected future results.

Ingevity also uses the above financial measures as the primary measures of profitability used by managers of the business and its segments. In addition, Ingevity believes Adjusted EBITDA, Adjusted EBITDA Margin, and Net Debt Ratio are useful measures because they exclude the effects of financing and investment activities as well as non-operating activities. These non-GAAP financial measures are not intended to replace the presentation of financial results in accordance with GAAP and investors should consider the limitations associated with these non-GAAP measures, including the potential lack of comparability of these measures from one company to another. Reconciliations of these non-GAAP financial measures are set forth within the following pages.

Adjusted earnings (loss) is defined as net income (loss) attributable to Ingevity stockholders plus restructuring and other (income) charges, acquisition and other-related costs, pension and postretirement settlement and curtailment (income) charges, and the income tax expense (benefit) on those items, less the provision (benefit) from certain discrete tax items.

Reconciliation Net Income (Loss) (GAAP) to Adjusted Earnings (Loss) (Non-GAAP)

In millions, except per share amounts (unaudited)	2018	2019	2020
Net income (loss)	\$ 181.8	\$ 183.7	\$ 181.4
Less: Net income (loss) attributable to noncontrolling interests	12.7		
Net income (loss) attributable to Ingevity stockholders (GAAP)	169.1	183.7	181.4
Restructuring and other (income) charges, net	(0.5)	1.8	18.5
Acquisition and other related costs	12.2	35.3	1.8
Pension and postretirement settlement and curtailment (income) charges	0.2	_	0.1
Tax effect on items above	(3.0)	(6.8)	(4.4)
Certain discrete tax provision (benefit) ¹	(2.8)	(5.9)	5.2
Adjusted earnings (loss) (Non-GAAP)	\$ 175.2	\$ 208.1	\$ 202.6
Diluted earnings (loss) per common share (GAAP)	\$ 3.97	\$ 4.35	\$ 4.37
Restructuring and other (income) charges, net	(0.01)	0.04	0.45
Acquisition and other related costs	0.28	0.84	0.04
Pension and postretirement settlement and curtailment charges (income)	0.01	_	_
Tax effect on items above	(0.07)	(0.16)	(0.10)
Certain discrete tax provision (benefit) ¹	(0.07)	(0.14)	0.12
Diluted adjusted earnings (loss) per share (Non-GAAP)	\$ 4.11	\$ 4.93	\$ 4.88

⁽¹⁾ Represents certain discrete tax items such as excess tax benefits on stock compensation and impacts of legislative changes in the jurisdictions for which we operate (i.e. 2017 U.S. Tax Reform). Management believes excluding these discrete tax items assists investors, potential investors, securities analysts, and others in understanding the tax provision and the effective tax rate related to continuing operating results thereby providing useful supplemental information about operational performance.

Adjusted EBITDA is defined as net income (loss) plus provision for income taxes, interest expense, net, depreciation and amortization, restructuring and other (income) charges, separation costs and acquisition and other related costs, pension and postretirement settlement and curtailment (income) charges. **Adjusted EBITDA Margin** is defined as Adjusted EBITDA divided by Net sales.

Reconciliation Net Income (Loss) (GAAP) to Adjusted EBITDA (Non-GAAP)

In millions (unaudited)	2018	2019	2020
Net income (loss) (GAAP)	\$ 181.8	\$ 183.7	\$ 181.4
Provision for income taxes	40.0	44.2	53.7
Interest expense	33.2	54.6	47.1
Interest income	(3.4)	(7.7)	(4.9)
Depreciation and amortization	57.0	85.0	100.2
Restructuring and other (income) charges, net	(0.5)	1.8	18.5
Acquisition and other related costs	12.2	35.3	1.8
Pension and postretirement settlement and curtailment charges (income)	0.2		0.1
Adjusted EBITDA (Non-GAAP)	\$ 320.5	\$ 396.9	\$ 397.9
Net sales	\$1,133.6	\$1,292.9	\$1,216.1
Net income (loss) margin	16.0 %	14.2 %	14.9 %
Adjusted EBITDA Margin (Non-GAAP)	28.3 %	30.7 %	32.7 %

Net Debt is defined as the sum of notes payable, short-term debt, current maturities of long-term debt and long-term debt less the sum of cash and cash equivalents, restricted cash associated with our New Market Tax Credit financing arrangement, and restricted investment. **Net Debt Ratio** is defined as Net Debt divided by last twelve months Adjusted EBITDA, inclusive of acquisition-related pro forma adjustments.

Calculation of Total Debt to Net Income (Loss) Ratio (GAAP) to Net Debt to Adjusted EBITDA Ratio (Non-GAAP)

In millions, except ratios (unaudited)	Decem	nber 31, 2020
Notes payable and current maturities of long-term debt		26.0
Long-term debt including finance lease obligations		1,267.4
Debt issuance costs		13.1
Total Debt		1,306.5
Less:		
Cash and cash equivalents (1)		258.1
Restricted investment		73.6
Net Debt		974.8
Total Debt to Net income (loss) Ratio (GAAP)		
Net income (loss) - last twelve months (LTM) as of December 31, 2020	\$	181.4
Total debt to Net income (loss) ratio (GAAP)		7.20x
Net Debt Ratio (Non GAAP)		
Adjusted EBITDA LTM as of December 31, 2020	\$	397.9
Net debt ratio (Non GAAP)		2.45x

⁽¹⁾ Includes \$0.4 million of Restricted Cash related to the New Markets Tax Credit financing transaction which was entered into in November 2019.





Board of Directors

- Audit Committee
- Compensation Committee
- Executive Committee
- Nominating Governance and Sustainability Committee



Jean Blackwell ••• Former Exec. Vice President and CFO, Cummins Inc.



Mike Fitzpatrick •• Exec. Advisor Partner at Wind Point Partners, Inc.



Diane Gulyas • • Former President, DuPont Performance Polymers at E.I. du Pont de Nemours and Company



Fred Lynch ••• Operating Partner, AEA Investors, LP, and Former CEO and President at Masonite International Corporation



Luis Fernandez-Moreno • Sole Manager and Member at Strat and Praxis LLC

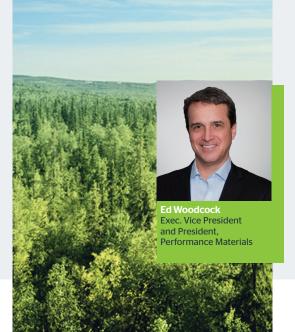


Karen Narwold • Exec. Vice President, Chief Administrative Officer and General Counsel at Albemarle Corporation



Dan Sansone •••
Former Exec. Vice President, Strategy at Vulcan Materials Company

Leadership Team





John FortsonPresident and Chief Executive
Officer



Stacy Cozad Exec. Vice President, General Counsel and Secretary



Mike Smith Exec. Vice President and President, Performance Chemicals, Strategy and Business Development



Cindy Cartmell Burns Sr. Vice President, Human Resources



Jack Maurer Sr. Vice President, Public Affairs and Investor Relations



Erik Ripple Chief Growth and Innvovation Officer

Ingevity Corporation 4920 O'Hear Avenue Suite 400 North Charleston, SC 29405 844 643 8489

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