

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
Washington D.C. 20549
Form 10-K**

ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934
For the fiscal year ended March 31, 2017

Or

TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934
For the transition period from _____ to _____.

Commission file number 001-32312

Novelis Inc.

(Exact name of registrant as specified in its charter)

Canada
(State or other jurisdiction of
incorporation or organization)
3560 Lenox Road, Suite 2000,
Atlanta, GA
(Address of principal executive offices)

98-0442987
(I.R.S. Employer
Identification Number)

30326
(Zip Code)

(404) 760-4000

(Registrant's telephone number, including area code)

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

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

Indicate by check mark if the Registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act of 1933. Yes No

Indicate by check mark if the Registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Securities Exchange Act of 1934 (the "Exchange Act"). Yes No

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

The registrant is a voluntary filer and is not subject to the filing requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934. However, the registrant has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months.

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files). Yes No

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of Registrant's knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K.

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

Large accelerated filer	<input type="checkbox"/>	Accelerated filer	<input type="checkbox"/>
Non-accelerated filer	<input checked="" type="checkbox"/> (Do not check if a smaller reporting company)	Smaller reporting company	<input type="checkbox"/>
Emerging growth company	<input type="checkbox"/>		

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

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

As of May 9, 2017, the Registrant had 1,000 common shares outstanding. All of the Registrant's outstanding shares were held indirectly by Hindalco Industries Ltd., the Registrant's parent company.

DOCUMENTS INCORPORATED BY REFERENCE: None

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SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS AND MARKET DATA

This document contains forward-looking statements that are based on current expectations, estimates, forecasts and projections about the industry in which we operate, and beliefs and assumptions made by our management. Such statements include, in particular, statements about our plans, strategies and prospects under the headings “Item 1. Business,” “Item 1A. Risk Factors” and “Item 7. Management’s Discussion and Analysis of Financial Condition and Results of Operations.” Words such as “expect,” “anticipate,” “intend,” “plan,” “believe,” “seek,” “estimate” and variations of such words and similar expressions are intended to identify such forward-looking statements. Examples of forward-looking statements in this Annual Report on Form 10-K include, but are not limited to, our expectations with respect to the impact of metal price movements on our financial performance; the effectiveness of our hedging programs and controls; and our future borrowing availability. These statements are based on beliefs and assumptions of Novelis’ management, which in turn are based on currently available information. These statements are not guarantees of future performance and involve assumptions and risks and uncertainties that are difficult to predict. Therefore, actual outcomes and results may differ materially from what is expressed, implied or forecasted in such forward-looking statements. We do not intend, and we disclaim any obligation, to update any forward-looking statements, whether as a result of new information, future events or otherwise.

This document also contains information concerning our markets and products generally, which is forward-looking in nature and is based on a variety of assumptions regarding the ways in which these markets and product categories will develop. These assumptions have been derived from information currently available to us and to the third party industry analysts quoted herein. This information includes, but is not limited to, product shipments and share of production. Actual market results may differ from those predicted. We do not know what impact any of these differences may have on our business, our results of operations, financial condition, and cash flow. Factors that could cause actual results or outcomes to differ from the results expressed or implied by forward-looking statements include, among other things:

- relationships with, and financial and operating conditions of, our customers, suppliers and other stakeholders;
- changes in the prices and availability of aluminum (or premiums associated with aluminum prices) or other materials and raw materials we use;
- fluctuations in the supply of, and prices for, energy in the areas in which we maintain production facilities;
- our ability to access financing, repay existing debt or refinance existing debt to fund current operations and for future capital requirements;
- our indebtedness and our ability to generate cash to service our indebtedness;
- lowering of our ratings by a credit rating agency;
- changes in the relative values of various currencies and the effectiveness of our currency hedging activities;
- union disputes and other employee relations issues;
- factors affecting our operations, such as litigation (including product liability claims), environmental remediation and clean-up costs, breakdown of equipment and other events;
- changes in general economic conditions, including deterioration in the global economy;
- the capacity and effectiveness of our hedging activities;
- impairment of our goodwill, other intangible assets, and long-lived assets;
- loss of key management and other personnel, or an inability to attract such management and other personnel;
- risks relating to future acquisitions or divestitures;
- our inability to successfully implement our growth initiatives;
- changes in interest rates that have the effect of increasing the amounts we pay under our senior secured credit facilities, other financing agreements and our defined benefit pension plans;
- risks relating to certain joint ventures and subsidiaries that we do not entirely control;
- the effect of derivatives legislation on our ability to hedge risks associated with our business;
- competition from other aluminum rolled products producers as well as from substitute materials such as steel, glass, plastic and composite materials;
- demand and pricing within the principal markets for our products as well as seasonality in certain of our customers’ industries;
- economic, regulatory and political factors within the countries in which we operate or sell our products, including changes in duties or tariffs; and
- changes in government regulations, particularly those affecting taxes and tax rates, health care reform, climate change, environmental, health or safety compliance.

The above list of factors is not exhaustive. These and other factors are discussed in more detail under “Item 1. Business,” “Item 1A. Risk Factors” and “Item 7. Management’s Discussion and Analysis of Financial Condition and Results of Operations.”

In this Annual Report on Form 10-K, unless otherwise specified, the terms “we,” “our,” “us,” “Company,” and “Novelis” refer to Novelis Inc., a company incorporated in Canada under the Canadian Business Corporations Act and its subsidiaries. References herein to “Hindalco” refer to Hindalco Industries Limited, which acquired Novelis in May 2007. In October 2007, Rio Tinto Group purchased all of the outstanding shares of Alcan Inc. References herein to “RT” refer to Rio Tinto Inc.

Exchange Rate Data

We report our financial statements in United States (U.S.) dollars. The following table sets forth exchange rate information expressed in terms of Canadian dollars per U.S. dollar based on exchange data published daily from Citibank as of 16:00 Greenwich Mean Time (GMT) (11:00 A.M. Eastern Standard Time). The rates set forth below may differ from the actual rates used in our accounting processes and in the preparation of our consolidated financial statements.

Period	At Period End	Average Rate(A)	High	Low
Year Ended March 31, 2013	1.0160	1.0030	1.0334	0.9601
Year Ended March 31, 2014	1.1044	1.0577	1.1127	1.0074
Year Ended March 31, 2015	1.2666	1.1467	1.2681	1.0665
Year Ended March 31, 2016	1.2978	1.3115	1.4015	1.2065
Year Ended March 31, 2017	1.3289	1.3137	1.3439	1.2542

(A) This represents the average of the 16:00 GMT buying rates on the last day of each month during the period.

All dollar figures herein are in U.S. dollars unless otherwise indicated.

Commonly Referenced Data

As used in this Annual Report, consolidated “aluminum rolled product shipments,” “flat rolled product shipments,” or “shipments” refers to aluminum rolled products shipments to third parties. “Aluminum rolled product shipments,” “flat rolled product shipments,” or “shipments” associated with the regions refers to aluminum rolled product shipments to third parties and intersegment shipments to other Novelis regions. Shipment amounts also include tolling shipments. References to “total shipments” include aluminum rolled products shipments as well as certain other non-rolled products shipments, primarily scrap, used beverage cans (UBCs), ingot, billets, and primary remelt. The term “aluminum rolled products” is synonymous with the terms “flat rolled products” and “FRP” which are commonly used by manufacturers and third party analysts in our industry. All tonnages are stated in metric tonnes. One metric tonne is equivalent to 2,204.6 pounds. One kilotonne (kt) is 1,000 metric tonnes.

A significant amount of our business is conducted under a conversion model, which allows us to pass through increases or decreases in the price of aluminum to our customers. Nearly all of our flat-rolled products have a price structure with three components: (i) a base aluminum price quoted off the London Metal Exchange (LME); (ii) a local market premium; and (iii) a “conversion premium” to produce the rolled product which reflects, among other factors, the competitive market conditions for that product.

The use of the term “conversion premium” in this Annual Report, refers to the conversion costs plus a margin we charge our customers to produce the rolled product which reflects, among other factors, the competitive market conditions for that product, exclusive of the pass through aluminum price.

PART I

Item 1. Business

Overview

We are the world's leading aluminum rolled products producer, based on shipment volume of 3,067 kt in fiscal 2017. We are also the global leader in the recycling of aluminum. We are the only known company of our size and scope focused solely on aluminum rolled products markets and capable of local supply of technologically sophisticated aluminum products in all four major industrialized continents: North America, South America, Europe and Asia. We had "Net sales" of \$10 billion for the year ended March 31, 2017.

Our History

Organization and Description of Business

All of the common shares of Novelis are owned directly by AV Metals Inc. and indirectly by Hindalco Industries Limited. We produce aluminum sheet and light gauge products primarily for use in the beverage can, automotive, specialty products (including consumer electronics, architecture, and other transportation) and foil markets. We also have recycling operations in many of our plants to recycle aluminum. As of March 31, 2017, we had manufacturing operations in ten countries on four continents: North America, South America, Europe and Asia, through 24 operating facilities, including recycling operations in eleven of these plants.

Our Industry

The aluminum rolled products market represents the global supply of, and demand for, aluminum sheet, plate and foil produced either from sheet ingot or continuously cast roll-stock in rolling mills operated by both independent aluminum rolled products producers and integrated aluminum companies.

Aluminum rolled products are semi-finished aluminum products that constitute the raw material for the manufacture of finished goods ranging from automotive structures and body panels to food and beverage cans. There are two major types of manufacturing processes for aluminum rolled products differing mainly in the process used to achieve the initial stage of processing:

- *hot mills* — which require sheet ingot, a rectangular slab of aluminum, as starter material; and
- *continuous casting mills* — which can convert molten metal directly into semi-finished sheet.

Both processes require subsequent rolling, which we refer to as cold rolling, and finishing steps such as annealing, coating, leveling or slitting to achieve the desired thickness, width and metal properties. Most customers receive shipments in the form of aluminum coil, a large roll of metal, which can be utilized in their fabrication processes.

Industry Sources of Metal

There are two sources of input material: (1) recycled aluminum, produced by remelting post-industrial and post-consumer scraps; and (2) primary aluminum, produced from bauxite processed in a smelter.

Primary aluminum and sheet ingot can generally be purchased at prices set on the LME, plus a local market premium that varies by geographic region of delivery, alloying material, form (ingot or molten metal) and purity.

Recycled aluminum is generally purchased at a discount compared to the price of primary aluminum depending on type and quality of the scrap, geographic region, and other market factors.

Industry End-use Markets

Aluminum rolled products companies produce and sell a wide range of products, which can be grouped into five end-use markets: (1) packaging; (2) transportation; (3) architectural; (4) industrial; and (5) consumer durables and other. Within each end-use market, aluminum rolled products are manufactured with a variety of alloy mixtures; a range of tempers (hardness), gauges (thickness) and widths; and various coatings and finishes. Large customers typically have customized needs resulting in the development of close relationships, including technical development relationships, with their supplying mills.

Aluminum, because of its light weight, recyclability and formability, has a wide variety of uses in packaging and other end-use markets. The recyclability of aluminum enables it to be used, collected, melted and returned to the original product form an unlimited number of times, unlike paper and polyethylene terephthalate (PET) plastic, which deteriorate with every iteration of recycling.

Packaging. Aluminum is used in beverage cans and bottles, food cans, beverage screw caps and foil, among others. Packaging is the largest aluminum rolled products application, according to market data from Commodity Research Unit International Limited (CRU), an independent business analysis and consultancy group. Beverage cans are one of the largest aluminum rolled products applications. In addition to their recyclability, aluminum beverage cans offer advantages in fabricating efficiency and product shelf life. Fabricators are able to produce and fill beverage cans at very high speeds, and non-porous aluminum cans provide longer shelf life than PET plastic containers. Additionally, the use of aluminum to package beverages such as craft beer is increasing, as aluminum blocks sunlight and therefore maintains the quality and taste of the product longer. Aluminum cans are light, stackable and use space efficiently, making them convenient and cost-efficient to ship.

Beverage can sheet is sold in coil form for the production of can bodies, ends and tabs. The material can be ordered as rolled, degreased, pre-lubricated, pre-treated and/or lacquered. Typically, can makers define their own specifications for material to be delivered in terms of alloy, gauge, width and surface finish.

Foil wrap or packaging foil is another packaging application and it includes household and institutional aluminum foil. Container foil is used to produce semi-rigid containers such as pie plates and take-out food trays.

Transportation. Aluminum rolled products are used in vehicle structures (also known as "body-in-white") as well as automotive body panel applications, including hoods, deck lids, fenders and lift gates. These uses typically result from cooperative efforts between aluminum rolled products manufacturers and their customers that yield solutions for specific requirements in alloy selection, fabrication procedure, surface quality and joining. There has been recent growth in certain geographic markets in passenger and commercial vehicle applications due to the lighter weight, better fuel economy and improved emissions performance associated with these applications. We expect increased growth in this end-use market driven by government regulations requiring improved emissions and better fuel economy; while also maintaining or improving vehicle performance and safety.

Heat exchangers, such as radiators and air conditioners, are an important application for aluminum rolled products in the transportation end-use market. Original equipment manufacturers also use aluminum sheet with specially treated surfaces and other specific properties for interior and exterior applications. Newly developed alloys are being used in transportation tanks and rigid containers allowing for safer and more economical transportation of hazardous and corrosive materials.

Aluminum is also used in aerospace applications, as well as in the construction of ships' hulls, superstructures and passenger rail cars because of its strength, light weight, formability and corrosion resistance.

Architectural. Construction is the largest application within this end-use market. Aluminum rolled products developed for the construction industry are often decorative and non-flammable, offer insulating properties, are durable and corrosion resistant, and have a high strength-to-weight ratio. Aluminum siding, gutters, and downspouts comprise a significant amount of construction volume. Other applications include doors, windows, awnings, canopies, facades, roofs and ceilings.

Industrial. Industrial applications include heat exchangers, process and electrical machinery, lighting fixtures, furniture and insulation.

Consumer Durables and Other. Aluminum's lightweight characteristics, high formability, ability to conduct electricity and dissipate heat and its corrosion resistance makes it useful in a wide variety of electronic applications. Uses of aluminum rolled products in electronics include flat screen televisions, personal computers, laptops, mobile devices, and digital music players. Other uses of aluminum rolled products in consumer durables include microwaves, coffee makers, air conditioners and cooking utensils.

Market Structure and Competition

The aluminum rolled products market is highly competitive and is characterized by economies of scale; and significant capital investments are required to achieve and maintain technological capabilities and demanding customer qualification standards. Our primary competitors are as follows:

North America

Alcoa, Inc. (Alcoa)
Aleris International, Inc. (Aleris)
Arconic Inc. (Arconic)
Constellium N.V. (Constellium)
Granges
UACJ Corporation/ Tri-Arrows Aluminum Inc. (Tri-Arrows)

Europe

Aleris
Arconic
Constellium
Norsk Hydro A.S.A.

Asia

Arconic
Binzhou Weiqiao Aluminium Science & Technology Co., Ltd
China Zhongwang Holdings Limited
Chinalco Group
Henan Mingtai Aluminum Industrial Co., Ltd
Henan Zhongfu Industrial Co., Ltd
Kobe Steel Ltd.
Shandong Nanshan Aluminum Co., Ltd
Southwest Aluminum (Group) Co., Ltd.
UACJ Corporation

South America

Arconic
Companhia Brasileira de Alumínio

The factors influencing competition vary by region and end-use market, but generally we compete on the basis of our value proposition; which includes price, product quality, the ability to meet customers' specifications, range of products offered, lead times, technical support and customer service. In some end-use markets, competition is also affected by fabricators' requirements that suppliers complete a qualification process to supply their plants. This process can be rigorous and may take many months to complete. As a result, obtaining business from these customers can be a lengthy and expensive process. However, the ability to obtain and maintain these qualifications can represent a competitive advantage.

In addition to competition from others within the aluminum rolled products industry, we also face competition from non-aluminum material producers. In the packaging end-use market (primarily beverage and food cans), aluminum rolled products compete mainly with glass, PET plastic, and in some regions, steel. In the transportation end-use market, aluminum rolled products compete mainly with steel and composites. Aluminum competes with wood, plastic, cement and steel in building products applications. In the consumer durables end-use market, aluminum rolled products compete mainly with plastic, steel, and magnesium. Additionally, aluminum competes with steel, copper, plastic, and glass in industrial applications. Factors affecting competition with substitute materials include price, ease to manufacture, consumer preference and performance characteristics.

Key Factors Affecting Supply and Demand

The following factors have historically affected the supply of aluminum rolled products:

Production Capacity and Alternative Technology. The addition of rolling capacity requires large capital investments and significant plant construction or expansion, and typically requires long lead-time equipment orders. Advances in technological capabilities allow aluminum rolled products producers to better align product portfolios and supply with industry demand. There are lower cost ways to enter the industry such as continuous casting, which offers the ability to increase capacity in smaller increments than is possible with hot mill additions; however, the continuous casting process results in a more limited range of products.

Trade. Some trade flows occur between regions despite shipping costs, import duties and the lack of localized customer support. Higher value-added products are more likely to be traded internationally, especially if demand in certain markets exceeds local supply. With respect to less technically demanding applications, emerging markets with low cost inputs may export commodity aluminum rolled products to larger, more mature markets, as we have seen with China.

The following factors have historically affected the demand for aluminum rolled products:

Economic Growth. We believe that economic growth is a significant driver of aluminum rolled products demand. In mature markets, growth in demand has typically correlated closely with industrial production growth. In many emerging markets, growth in demand typically exceeds industrial production growth largely because of expanding infrastructures, capital investments and rising incomes that often accompany economic growth in these markets.

Substitution Trends. Manufacturers' willingness to substitute other materials for aluminum in their products and competition from substitution materials suppliers also affect demand. There has been a strong substitution trend toward aluminum in the use of vehicles as automobile manufacturers look for ways to meet fuel efficiency regulations, improve performance and reduce carbon emissions in a cost-efficient manner. As a result of aluminum's durability, strength and light weight, automobile manufacturers are substituting heavier alternatives such as steel and iron with aluminum. Carbon fiber is another lightweight material option, but its relatively high cost and limited end-of-life recyclability reduce its competitiveness as a widespread material substitute today. Consequently, demand for flat rolled aluminum products has increased. We also see strong substitution trends toward aluminum and away from steel in the beverage can market in certain regions.

Seasonality. During our third fiscal quarter, we typically experience seasonal slowdowns resulting in lower shipment volumes. This is a result of declines in overall production output due primarily to holidays and cooler weather in North America and Europe, our two largest operating regions. We also experience downtime at our mills and customers' mills due to scheduled plant maintenance and are impacted to a lesser extent by the seasonal downturn in construction activity.

Sustainability. Growing awareness of environmentalism and demand for recyclable products has increased the demand for aluminum rolled products. Unlike other commonly recycled materials such as paper or PET plastic, aluminum can be infinitely recycled without affecting the quality of the product. Additionally, the recycling process uses 95% less energy than is required to produce primary aluminum from mining and smelting, with an equivalent reduction in greenhouse gas emissions.

Our Business Strategy

Following the successful completion of significant multi-year capital investments to increase our capacity, reshape our product portfolio and expand our recycling capacity, our primary objective as the world's largest aluminum rolling and recycling company is to increase shareholder value by delivering best in class customer service and high-quality, innovative solutions. In addition, we will maximize shareholder value through free cash flow generation and increasing return on capital employed. We intend to achieve these objectives through the following areas of focus:

Focus on Manufacturing Excellence

We are driving our business forward by focusing on manufacturing excellence. This includes a commitment to employee safety, customer service, product quality and system reliability.

As a manufacturing organization, our primary concern is the health and safety of our employees. We are committed to building a culture of safety across all levels of the organization. We are focused on optimizing our manufacturing and recycling operations to increase asset utilization and productivity. We continue to pursue a standardization of our manufacturing processes where possible; while still allowing the flexibility to respond to local market demands. We are focused on maintaining a competitive cost structure by managing metal inputs and employing initiatives to improve operational efficiencies across our plants globally.

Our customers demand consistent, high-quality products. We are committed to producing the best quality products and providing reliable on-time delivery and be a true partner in innovation and sustainable supply solutions. We are focused on building and maintaining strong, positive relationships with all of our customers.

Operate as an Integrated Global Company

We intend to continue operating as a globally integrated company to leverage our manufacturing excellence, risk management expertise, value-added conversion premium-based pricing and global assets according to a single, company-wide vision. We believe this integrated approach is the foundation for the effective execution of our strategy across the Novelis system.

We strive to service our customers in a consistent, global manner through seamless alignment of goals, methods and metrics across the organization, while still allowing for local flexibility.

Focus on Premium Products

We focus on capturing global growth in beverage can, automotive and specialty products markets. Our management approach helps us to systematically identify opportunities to improve the profitability of our operations through product portfolio analysis. This ensures that we grow in attractive market segments, while also taking actions to exit unattractive ones. We will continue to focus on these core products to drive enhanced profitability. In the recent past, we have taken steps to exit certain non-core operations, including aluminum smelting operations and hydroelectric facilities in Brazil, and consumer foil operations in North America and Europe.

Over the past several years, we invested in world-class assets and technical capabilities to position ourselves to meet increasing global demand for aluminum from the automotive market. We now have automotive finishing lines in North America, Europe, and Asia. Additionally, we believe there are opportunities to capture growth in other areas (e.g., beverage cans) driven by metal substitution and urbanization trends in emerging markets such as South America.

Utilize Recycled Metal Inputs

Utilizing recycled material allows us to diversify our metal supply, helps to control metal costs and provides environmental benefits. Since fiscal year 2011, our recycled inputs have increased from 33% to 55% in fiscal year 2017.

Novelis is working closely with our customers on innovation to drive more sustainable products for society. Novelis is the only company of its size offering independently certified, high-recycled content aluminum sheet for our beverage and specialty product customers. We are also working closely with our automotive customers to redesign automotive alloys to be made with more recycled inputs, as well as seeking to purchase the aluminum scrap resulting from our automotive customers' production processes.

Raw Materials and Suppliers

The input materials we use in manufacturing include primary aluminum, recycled aluminum, sheet ingot, alloying elements and grain refiners. These raw materials are generally available from several sources and are not generally subject to supply constraints in normal market conditions. We also consume considerable amounts of energy in the operation of our facilities.

Aluminum

We obtain aluminum from a number of sources, including the following:

Primary Aluminum Sourcing. We purchased or tolled approximately 1,490 kt of primary aluminum in fiscal 2017 in the form of sheet ingot, standard ingot and molten metal, approximately 21% of which we purchased from RT.

Aluminum Products Recycling. We operate facilities in several plants to recycle post-consumer aluminum, such as UBCs collected through recycling programs. In addition, we have agreements with several of our large customers where we have a closed-looped system whereby we take production scrap material from their fabricating activity and re-melt, cast and roll it to re-supply these customers with aluminum sheet. Other sources of recycled material include lithographic plates, and products with longer lifespans, like vehicles and buildings, which are starting to become high volume sources of recycled material. We purchased or tolled approximately 1,700 kt of recycled material inputs in fiscal 2017 and have made recycling investments in all of our operating regions to increase the amount of recycled material we use as raw materials.

The materials that we recycle are remelted, cast and then used in our operations. The net effect of all recycling activities was that on average approximately 55% of our total aluminum rolled products shipments in fiscal 2017 were made from recycled inputs. The overall benefit we receive from utilizing recycled metal is influenced by: 1) the overall price levels of the LME and local market premiums, 2) the spread between the price for recycled aluminum and the LME primary aluminum price and 3) our consumption levels of the recycled material inputs.

Our recycled content performance and methodology are detailed in our annual sustainability report, which can be found at www.novelis.com/sustainability. Information in our sustainability report does not constitute part of this Annual Report on Form 10-K.

Energy

We use several sources of energy in the manufacture and delivery of our aluminum rolled products. In fiscal 2017, natural gas and electricity represented approximately 98% of our energy consumption by cost. We also use fuel oil and transport fuel. The majority of energy usage occurs at our casting centers and during the hot rolling process. Our cold rolling facilities require relatively less energy. We purchase our natural gas on the open market, which subjects us to market pricing fluctuations. We have in the past and may continue to seek to stabilize our future exposure to natural gas prices through the use of derivative instruments. Natural gas prices in Europe and South America have historically been more stable than in the United States. A portion of our electricity requirements are purchased pursuant to long-term contracts in the local regions in which we operate. A number of our facilities are located in regions with regulated prices, which affords relatively stable costs. We have fixed pricing on some of our energy supply arrangements.

Our Operating Segments

Due in part to the regional nature of supply and demand of aluminum rolled products and in order to best serve our customers, we manage our activities on the basis of geographical areas and are organized under four operating segments: North America, Europe, Asia and South America. Each segment manufactures aluminum sheet and light gauge products, and recycles aluminum.

The table below shows "Net sales" and total shipments by segment. For additional financial information related to our operating segments, see Note 21 — Segment, Geographical Area, Major Customer and Major Supplier Information to our accompanying audited consolidated financial statements.

Net sales in millions Shipments in kilotonnes	Year Ended March 31,		
	2017	2016	2015
Consolidated			
Net sales	\$ 9,591	\$ 9,872	\$ 11,147
Total shipments	3,176	3,325	3,374
North America(A)			
Net sales	\$ 3,228	\$ 3,266	\$ 3,483
Total shipments	1,014	1,049	1,030
Europe(A)			
Net sales	\$ 2,968	\$ 3,223	\$ 3,783
Total shipments	951	1,076	1,153
Asia(A)			
Net sales	\$ 1,791	\$ 1,992	\$ 2,340
Total shipments	699	770	770
South America(A)			
Net sales	\$ 1,510	\$ 1,575	\$ 1,850
Total shipments	562	569	583

(A) "Net sales" and "Total shipments" by segment include intersegment sales and the results of our affiliates on a proportionately consolidated basis, which is consistent with the way we manage our business segments.

The following is a description of our operating segments as of March 31, 2017:

North America

Headquartered in Atlanta, Georgia, Novelis North America operates eight aluminum rolled products facilities. This includes two fully dedicated recycling facilities and one facility with recycling operations. These sites manufacture a broad range of aluminum sheet and light gauge products. End-use markets for this segment include beverage and food cans, containers and packaging, automotive and other transportation applications, architectural and other industrial applications. The majority of North America's volumes are currently directed toward the beverage can sheet market.

Recycling is important in the manufacturing process and we have three facilities in North America that re-melt post-consumer aluminum and recycled process material. Most of the recycled material is from UBCs and automotive scrap, and the material is cast into sheet ingot at our plants in Greensboro, Georgia; Berea, Kentucky; and Oswego, New York. Additionally, our Logan Aluminum joint venture facility ("Logan") in Russellville, Kentucky is a manufacturer of aluminum sheet products for the can stock market and operates modern and high-speed equipment for ingot casting, hot-rolling, cold-rolling and finishing.

In response to the lightweighting trend in the automotive industry, we have expanded our Oswego, New York facility by constructing three automotive finishing lines and supporting automotive scrap recycling capabilities.

Europe

Headquartered in Künsnacht, Switzerland, Novelis Europe operates ten aluminum rolled product facilities. This includes two fully dedicated recycling facilities and two facilities with recycling operations. These sites manufacture a broad range of sheet and foil products. We also have distribution centers in Italy and sales offices in several European countries. End-use markets for this segment include beverage and food can, automotive, architectural and industrial products, foil and technical products and lithographic sheet. Beverage and food can represent the largest end-use market in terms of shipment volume for Europe. Operations include our 50% joint venture interest in Aluminium Norf GmbH (Alunorf), which is the world's largest aluminum rolling and remelt facility. Alunorf supplies high quality can stock, foilstock and feeder stock for finishing at our other European operations.

We have built a fully integrated recycling facility at our Nachterstedt, Germany plant, which commissioned in fiscal 2015 and is the largest aluminum recycling facility in the world. Additionally, a second automotive finishing line at our Nachterstedt, Germany facility was commissioned in fiscal 2016, to further expand our production of aluminum automotive sheet products in Europe.

Asia

Headquartered in Seoul, South Korea, Novelis Asia operates four aluminum rolled product facilities. This includes three facilities with recycling operations. These sites manufacture a broad range of aluminum sheet and light gauge products. End-use markets include beverage and food cans, electronics, architectural, automotive, foil, industrial and other products. The beverage can market represents the largest end-use market in terms of volume. Recycling is an important part of our operations with recycling facilities at both the Ulsan and Yeongju, South Korea plants. Additionally, we have a facility in Binh Duong, Vietnam, which handles the collection and processing of UBCs.

We built an aluminum automotive sheet finishing plant in Changzhou, China, which was commissioned in fiscal 2015.

South America

Headquartered in Sao Paulo, Brazil, Novelis South America operates two aluminum rolled product facilities. This includes one facility with recycling operations. These sites manufacture a broad range of can sheet, industrial sheet and light gauge products. The main markets are beverage and food can, specialty, industrial, foil and other packaging and transportation end-use applications. Beverage can represents the largest end-use application in terms of shipment volume.

During fiscal 2015, we closed the Ouro Preto smelter facility and we sold the majority of our hydroelectric generation operations in Brazil.

Financial Information About Geographic Areas

Certain financial information about geographic areas is contained in Note 21— Segment, Geographical Area, Major Customer and Major Supplier Information to our accompanying audited consolidated financial statements.

Our Customers

We focus significant efforts on developing and maintaining close working relationships with our customers and end-users. Our major customers include:

Beverage and Food Cans

Anheuser-Busch LLC
Ardagh Group
Ball Corporation
Can-Pack S.A.
Crown Cork & Seal Company
Various bottlers of the Coca-Cola System

Construction, Industrial and Other

Agfa Graphics
Lotte Aluminum Co. Ltd.
Prefa
Reynolds Consumer Products LLC
Ryerson Inc.

Automotive

BMW Group
Daimler Group
Fiat Chrysler Automobiles N.V.
Ford Motor Company
General Motors LLC
Jaguar Land Rover Limited
Volkswagen Group

Electronics

LG International Corporation
Samsung Electronics Co., Ltd

Our single largest end-use product is beverage can sheet. We sell can sheet directly to beverage makers and bottlers as well as to can fabricators that sell the cans they produce to bottlers. In certain cases, we operate under umbrella agreements with beverage makers and bottlers under which they direct their can fabricators to source their requirements for beverage can body, end and tab stock from us.

Additional information related to our top customers is contained in Note 21 — Segment, Geographical Area, Major Customer and Major Supplier Information to our accompanying audited consolidated financial statements.

Distribution and Backlog

We have two principal distribution channels for the end-use markets in which we operate: direct sales to our customers and sales to distributors.

	Year Ended March 31,		
	2017	2016	2015
Direct sales as a percentage of total "Net sales"	94%	95%	92%
Distributor sales as a percentage of total "Net sales"	6%	5%	8%

Direct Sales

We supply various end-use markets all over the world through a direct sales force operating from individual facilities or sales offices, as well as from regional sales offices in 10 countries. The direct sales channel typically serves very large, sophisticated fabricators and original equipment manufacturers. Longstanding relationships are maintained with leading companies in industries using aluminum rolled products. Supply contracts for large global customers generally range from one to five years in length and historically there has been a high degree of renewal business with these customers. Given the customized nature of products and in some cases, large order sizes, switching costs are significant, thus adding to the overall consistency of the customer base.

We also use third party agents or traders in some regions to complement our own sales force. These agents provide service to our customers in countries where we do not have local expertise.

Distributors

We also sell our products through third party aluminum distributors. Customers of distributors are widely dispersed, and sales through this channel are highly fragmented. Distributors sell mostly commodity or less specialized products into many end-use markets in small quantities, including the architectural and industrial markets. We collaborate with our distributors to develop new end-use products and improve the supply chain and order efficiencies.

Backlog

We believe order backlog is not a material aspect of our business.

Research and Development

The table below summarizes our “Research and development expenses”, which include mini-scale production lines equipped with hot mills, can lines and continuous casters (in millions).

	Year Ended March 31,		
	2017	2016	2015
Research and development expenses	\$ 58	\$ 54	\$ 50

We conduct research and development activities in order to satisfy current and future customer requirements, improve our products and reduce our conversion costs. Our customers work closely with our research and development professionals to improve their production processes and market options. We have approximately 350 employees dedicated to research and development. We have a global research and technology center in Kennesaw, Georgia, which offers state of the art research and development capabilities to help Novelis meet the global long-term demand for aluminum used for the automotive, beverage can and specialty markets.

Our Employees

The table below summarizes our approximate number of employees by region, including our proportionate share of those employed by less than wholly owned affiliates.

Employees	North America	Europe	Asia	South America	Total
March 31, 2017	3,310	4,880	1,670	1,590	11,450
March 31, 2016	3,430	4,970	2,020	1,550	11,970

We consider our employee relations to be satisfactory. A substantial portion of our employees are represented by labor unions and their employment conditions are governed by collective bargaining agreements. Collective bargaining agreements are negotiated on a site, regional or national level, and are of varying durations. As of March 31, 2017, approximately 1,800 of our employees were covered under collective bargaining agreements that expire within one year.

Intellectual Property

We actively review intellectual property arising from our operations and our research and development activities and, when appropriate, we apply for patents in appropriate jurisdictions. We currently hold patents and patent applications on approximately 204 different items of intellectual property. While these patents and patent applications are important to our business on an aggregate basis, no single patent or patent application is deemed to be material to our business.

We have applied for, or received registrations for, the “Novelis” word trademark and the Novelis logo trademark in approximately 50 countries where we have significant sales or operations. Novelis uses the Aditya Birla logo under license from Aditya Birla Management Corporation Private Limited.

We have also registered the word “Novelis” and several derivations thereof as domain names in numerous top level domains around the world to protect our presence on the world wide web.

Environment, Health and Safety

We own and operate numerous manufacturing and other facilities in various countries around the world. Our operations are subject to environmental laws and regulations from various jurisdictions, which govern, among other things, air emissions, wastewater discharges, the handling, storage and disposal of hazardous substances and wastes, the remediation of contaminated sites, post-mining reclamation and restoration of natural resources, and employee health and safety. Future environmental regulations may impose stricter compliance requirements on the industries in which we operate. Additional equipment or process changes at some of our facilities may be needed to meet future requirements. The cost of meeting these requirements may be significant. Failure to comply with such laws and regulations could subject us to administrative, civil or criminal penalties, obligations to pay damages or other costs, and injunctions and other orders, including orders to cease operations.

We are involved in proceedings under the U.S. Comprehensive Environmental Response, Compensation, and Liability Act, also known as CERCLA or Superfund, or analogous state provisions regarding our liability arising from the usage, storage, treatment or disposal of hazardous substances and wastes at a number of sites in the United States, as well as similar proceedings under the laws and regulations of the other jurisdictions in which we have operations, including Brazil and certain countries in the European Union. Many of these jurisdictions have laws that impose joint and several liability, without regard to fault or the legality of the original conduct, for the costs of environmental remediation, natural resource damages, third party claims, and other expenses. In addition, we are, from time to time, subject to environmental reviews and investigations by relevant governmental authorities.

We have established procedures for regularly evaluating environmental loss contingencies, including those arising from environmental reviews and investigations and any other environmental remediation or compliance matters. We believe we have a reasonable basis for evaluating these environmental loss contingencies, and we also believe we have made reasonable estimates for the costs that are reasonably possible for these environmental loss contingencies. Accordingly, we have established liabilities based on our estimates for the currently anticipated costs that are deemed probable associated with these environmental matters. Management has determined the currently anticipated costs associated with these environmental matters will not, individually or in the aggregate, materially impair our operations or materially adversely affect our financial condition.

Available Information

We are a voluntary filer and not subject to the reporting and information requirements of the Securities Exchange Act of 1934, as amended (Exchange Act). However, we file periodic reports and other information with the Securities and Exchange Commission (SEC). We make these filings available on our website free of charge, the URL of which is <http://www.novelis.com>, as soon as reasonably practicable after we electronically file such material with, or furnish it to, the SEC. The SEC maintains a website (<http://www.sec.gov>) that contains our annual, quarterly and current reports and other information we file electronically with the SEC. You can read and copy any materials we file with the SEC at the SEC's Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the Public Reference Room by calling the SEC at 1-800-SEC-0330. Information on our website does not constitute part of this Annual Report on Form 10-K.

Item 1A. Risk Factors

In addition to the factors discussed elsewhere in this report, you should consider the following factors, which could materially affect our business, financial condition or results of operations in the future. The following factors, among others, could cause our actual results to differ from those projected in any forward looking statements we make.

Certain of our customers are significant to our revenues, and we could be adversely affected by changes in the business or financial condition of these significant customers or by the loss of their business.

Our ten largest customers accounted for approximately 63%, 60%, and 55% of our total “Net sales” for the year ended March 31, 2017, 2016 and 2015, respectively. A significant downturn in the business or financial condition of our significant customers could materially adversely affect our results of operations and cash flows. In addition, some of our customer contracts are subject to renewal, renegotiation or re-pricing at periodic intervals or upon changes in competitive supply conditions. Our failure to successfully renew, renegotiate or re-price such agreements could result in a reduction or loss in customer purchase volume or revenue, and if we are not successful in replacing business lost from such customers, our results of operations and cash flows could be adversely affected. Additionally, in the event of further consolidation among our customers, our customers may be able to use increased leverage in negotiating prices and other contract terms. Consolidation in our customer base may also lead to reduced demand for our products or cancellations of sales orders, which could adversely affect our results of operations and cash flows. We also factor and forfeit certain trade receivables from time to time to manage working capital. As a result, any deterioration of the financial condition or downgrade of the credit rating of certain of our customers may make it more difficult or costly for us to engage in these activities, which could negatively impact our cash flows and liquidity.

We face significant price and other forms of competition from other aluminum rolled products producers, which could hurt our results of operations and cash flows.

Generally, the markets in which we operate are highly competitive. We compete primarily on the basis of our value proposition, including price, product quality, ability to meet customers' specifications, range of products offered, lead times, technical support and customer service. Some of our competitors may benefit from greater capital resources, more efficient technologies, lower raw material and energy costs and may be able to sustain longer periods of price competition. In particular, we face increased competition from producers in China, which have significantly lower production costs and pricing. For example, the price gap for aluminum between the Shanghai Futures Exchange (“SHFE”) and the LME may make our products manufactured in Asia based on LME prices less competitive compared to products manufactured by competitors in China based on SHFE prices. Lower pricing by Chinese competitors has eroded the market prices of our products in the Chinese market and elsewhere in Asia and could further erode prices in the future.

In addition, our competitive position within the global aluminum rolled products industry may be affected by, among other things, consolidation among our competitors, exchange rate fluctuations that may make our products less competitive in relation to the products of companies based in other countries (despite the U.S. dollar-based input cost and the marginal costs of shipping) and economies of scale in purchasing, production and sales, which accrue to the benefit of some of our competitors.

Increased competition could cause a reduction in our shipment volumes and profitability, which could have a material adverse effect on our financial results and cash flows.

The end-use markets for certain of our products are highly competitive and customers may choose substitutes for our products.

The end-use markets for certain aluminum rolled products are highly competitive. Aluminum competes with other materials, such as steel, plastics, composite materials and glass, among others, for various applications, including in packaging, automotive, architectural, industrial, and consumer durables end-use markets. Our customers may choose materials other than aluminum to achieve desired attributes for their products. For example, customers in the automotive industry seeking to reduce vehicle weight may increase their use of high-strength steel and other materials rather than aluminum for certain applications. The willingness of customers to accept substitutes for aluminum products could have a material adverse effect on our financial results and cash flows.

If we are unable to obtain sufficient quantities of primary aluminum, recycled aluminum, sheet ingot and other raw materials used in the production of our products, our ability to produce and deliver products or to manufacture products using the desired mix of metal inputs could be adversely affected.

If we are unable to obtain sufficient quantities of primary aluminum, recycled aluminum, sheet ingot and other raw materials used in the production of our products, our ability to produce and deliver products or to manufacture products using the desired mix of metal inputs could be adversely affected.

The supply risks relating to our metal inputs vary by input type. For example, we produce sheet ingot internally and source the remainder of our requirements from multiple third parties in various jurisdictions, usually under contracts having a duration of at least one year. If our suppliers are unable to deliver sufficient quantities of aluminum on a timely basis, our production could be disrupted and our net sales, profitability and cash flows could be adversely affected. Although aluminum is traded on the world markets, developing alternative suppliers of sheet ingot could be time consuming and expensive.

Our operations consume energy and our profitability and cash flows may decline if energy costs were to rise, or if our energy supplies were interrupted.

We consume substantial amounts of energy in our rolling and casting operations. The factors affecting our energy costs and supply reliability tend to be specific to each of our facilities. A number of factors could materially affect our energy position adversely including:

- increases in costs of natural gas;
- increases in costs of supplied electricity;
- increases in fuel oil related to transportation;
- interruptions in energy supply due to equipment failure or other causes; and
- the inability to extend energy supply contracts upon expiration on economical terms.

If energy costs were to rise, or if energy supplies or supply arrangements were disrupted, our profitability and cash flows could decline.

Our results and short term liquidity can be negatively impacted by timing differences between the prices we pay under purchase contracts and metal prices we charge our customers.

Our purchase and sales contracts for primary aluminum are based on the LME price plus a regional market premium, which is a surcharge in addition to the LME price. There are typically timing differences between the pricing periods for purchases and sales where purchase prices we pay tend to be fixed and paid earlier than sales prices we charge our customers. This creates a price exposure we call “metal price lag.” We use derivative instruments to manage the timing differences related to LME associated with metal price lag. However, the derivative market for local market premiums is not robust or efficient enough for us to offset the impacts of LMP price movements beyond a very small volume. The timing difference associated with metal price lag could positively or negatively impact our operating results and short term liquidity position.

A deterioration of our financial condition or a downgrade of our ratings by a credit rating agency could limit our ability or increase our costs to enter into hedging and financing transactions, and our business relationships and financial condition could be adversely affected.

A deterioration of our financial condition or a downgrade of our credit ratings for any reason could increase our borrowing costs, limit our access to the capital or credit markets or liquidity facilities, adversely affect our ability to obtain new financing on favorable terms or at all, result in more restrictive covenants for future indebtedness incurrences and have an adverse effect on our business relationships with customers, suppliers and hedging counterparties. We enter into various forms of hedging activities against currency, interest rate, energy and metal price fluctuations. Financial strength and credit ratings are important to the availability and terms of these hedging activities. As a result, any deterioration of our financial condition or downgrade of our credit ratings may make it more difficult or costly for us to engage in these activities in the future.

Adverse changes in currency exchange rates could negatively affect our financial results or cash flows and the competitiveness of our aluminum rolled products relative to other materials.

Our businesses and operations are exposed to the effects of changes in the exchange rates of the U.S. dollar, the Euro, the British pound, the Brazilian real, the Korean won, the Swiss franc and other currencies. We have implemented a hedging policy that attempts to manage currency exchange rate risks to an acceptable level based on management's judgment of the

appropriate trade-off between risk, opportunity and cost; however, this hedging policy may not successfully or completely eliminate the effects of currency exchange rate fluctuations which could have a material adverse effect on our financial results and cash flows.

We prepare our consolidated financial statements in U.S. dollars, but a portion of our earnings and expenditures are denominated in other currencies, primarily the Euro, the Korean won and the Brazilian real. Changes in exchange rates will result in increases or decreases in our operating results and may also affect the book value of our assets located outside the U.S.

Most of our facilities are staffed by a unionized workforce, and union disputes and other employee relations issues could materially adversely affect our financial results.

A substantial portion of our employees are represented by labor unions under a large number of collective bargaining agreements with varying durations and expiration dates. We may not be able to satisfactorily renegotiate our collective bargaining agreements when they expire. In addition, existing collective bargaining agreements may not prevent a strike or work stoppage at our facilities in the future.

Loss of our key management and other personnel, or an inability to attract and retain such management and other personnel, could adversely impact our business.

We employ all of our senior executive officers and other highly-skilled key employees on an at-will basis, and their employment can be terminated by us or them at any time, for any reason and without notice, subject, in certain cases, to severance payment obligations. Competition for qualified employees among companies that rely heavily on engineering and technology is intense, and if our highly skilled key employees leave us, we may be unable to promptly attract and retain qualified replacement personnel, which could result in our inability to improve manufacturing operations, conduct research activities successfully, develop marketable products and compete effectively for our share of the growth in key markets.

We could be adversely affected by disruptions of our operations.

Breakdown of equipment or other events, including catastrophic events such as war or natural disasters, leading to production interruptions at our plants could have a material adverse effect on our financial results and cash flows. Further, because many of our customers are, to varying degrees, dependent on planned deliveries from our plants, any customers that have to reschedule their own production due to our missed deliveries could pursue claims against us and reduce their future business with us. We may incur costs to correct any of these problems, in addition to facing claims from customers. Further, our reputation among actual and potential customers may be harmed, resulting in loss of business. While we maintain insurance policies covering, among other things, physical damage, business interruptions and product liability, these policies would not cover all of our losses.

Our operations have been and will continue to be exposed to various business and other risks, changes in conditions and events beyond our control in countries where we have operations or sell products.

We are, and will continue to be, subject to financial, political, economic and business risks in connection with our global operations. We have made investments and carry on production activities in various emerging markets, including China and Brazil, and we market our products in these countries, as well as certain other countries in Asia, Africa, the Middle East and South America. While we anticipate higher growth or attractive production opportunities from these emerging markets, they also present a higher degree of risk than more developed markets.

In addition to the business risks inherent in developing and servicing new markets, economic conditions may be more volatile, legal and regulatory systems less developed and predictable, and the possibility of various types of adverse governmental action more pronounced. In addition, inflation, fluctuations in currency and interest rates, competitive factors, civil unrest and labor problems could affect our revenues, expenses and results of operations. Our operations could also be adversely affected by acts of war, terrorism or the threat of any of these events as well as government actions such as controls on imports, exports and prices, tariffs, new forms of taxation, or changes in fiscal regimes and increased government regulation in the countries in which we operate or service customers.

Global uncertainty about the direction of US trade policy and the rising threat of changes in tariffs and trade barriers in countries where we do business could cause our customers to delay or reduce spending on our products. In addition, changes in trade policies could cause our costs to rise and negatively impact our ability to plan for future periods.

Unexpected or uncontrollable events or circumstances in any of these markets could have a material adverse effect on our financial results and cash flows.

We face risks relating to certain joint ventures, subsidiaries and assets that we do not entirely control.

Some of our activities are, and will in the future be, conducted through entities that we do not entirely control or wholly-own. These entities include our Alunorf, Germany and Logan, Kentucky joint ventures and our Sierre, Switzerland facility, the property and equipment of which we lease from a third party. Under the governing documents, agreements or securities laws applicable to certain of these entities, our ability to fully control certain operational matters may be limited. Further, in some cases we do not have rights to prevent a joint venture partner from selling its joint venture interests to a third party.

Derivatives legislation could have an adverse impact on our ability to hedge risks associated with our business and on the cost of our hedging activities.

We use over-the-counter (OTC) derivative products to hedge against currency, interest rate, energy and metal price fluctuations. The Commodity Futures Trading Commission and the SEC have enacted certain rules and regulations to increase regulatory oversight of the OTC markets and the entities that participate in those markets. The Dodd-Frank Wall Street Reform and Consumer Protection Act (Dodd-Frank Act) includes extensive provisions regulating the derivatives market, and many of the regulations implementing the derivatives provisions have become effective and additional requirements will become effective in the future. As such, we have become and could continue to become subject to additional regulatory costs, both directly and indirectly, through increased costs of doing business with more market intermediaries that are now subject to extensive regulation pursuant to the Dodd-Frank Act. Other regulations implementing the Dodd-Frank Act remain to be finalized or implemented and it is not possible to predict when this will be accomplished or what impact these regulations will have on our ability to hedge our business risks, or the costs of doing so.

In addition, the European Market Infrastructure Regulation (EMIR) and the Financial Market Infrastructure Act (FMIA), which became effective in 2012 and 2016, respectively, include regulations related to the trading, reporting and clearing of derivatives. We have entities and counterparties located in jurisdictions subject to EMIR and FMIA. Our efforts to comply with EMIR and FMIA, and EMIR and FMIA's effects on the derivatives markets and their participants, create similar risks and could have similar adverse impacts as those under the Dodd-Frank Act.

If future regulations subject us to additional capital or margin requirements or other restrictions on our trading and commodity positions, they could have an adverse effect on our ability to hedge risks associated with our business and on the cost of our hedging activities. It is also possible that additional similar regulations may be imposed in other jurisdictions where we conduct business and any such regulations could pose risks and have adverse effects on our operations and profitability.

We may not be able to successfully develop and implement new technology initiatives.

We have invested in, and are involved with, a number of technology and process initiatives. Several technical aspects of these initiatives are still unproven, and the eventual commercial outcomes cannot be assessed with any certainty. Even if we are successful with these initiatives, we may not be able to deploy them in a timely fashion. Accordingly, the costs and benefits from our investments in new technologies and the consequent effects on our financial results may vary from present expectations.

Security breaches and other disruptions to our information technology networks and systems could interfere with our operations, and could compromise the confidentiality of our proprietary information.

We rely upon information technology networks and systems, some of which are managed by third parties, to process, transmit and store electronic information, and to manage or support a variety of business and manufacturing processes and activities. Additionally, we collect and store sensitive data, including intellectual property, proprietary business information, as well as personally identifiable information of our employees, in data centers and on information technology networks. The secure operation of these information technology networks, and the processing and maintenance of this information is important to our business operations and strategy. Despite security measures and business continuity plans, our information technology networks and systems may be vulnerable to damage, disruptions or shutdowns due to attacks by hackers or breaches due to errors or malfeasance by employees, contractors and others who have access to our networks and systems, or other disruptions during the process of upgrading or replacing computer software or hardware, power outages, computer viruses, telecommunication or utility failures or natural disasters or other catastrophic events. The occurrence of any of these events could compromise our networks and the information stored there could be accessed, publicly disclosed, lost or stolen. Any such access, disclosure or other loss of information could result in legal claims or proceedings, liability or regulatory penalties under laws protecting the privacy of personal information, disrupt operations and reduce the competitive advantage we hope to derive from our investment in new or proprietary business initiatives.

Future acquisitions, divestitures or restructuring actions may adversely affect our financial results.

As part of our strategy for growth, we may pursue acquisitions, divestitures or strategic alliances, which may not be completed or, if completed, may not be ultimately beneficial to us. There are numerous risks commonly encountered in strategic transactions, including the risk that we may not be able to complete a transaction that has been announced, effectively integrate businesses acquired or generate the cost savings and synergies anticipated. Failure to do so could have a material adverse effect on our financial results.

Any additional restructuring efforts we may undertake in the future could result in significant severance-related costs, environmental remediation expenses, impairment charges, restructuring charges and related costs and expenses, which could adversely affect our profitability and cash flows.

Capital investments in organic growth initiatives may not produce the returns we anticipate.

A significant element of our strategy has been to invest in opportunities to increase the production capacity of our operating facilities through modifications of and investments in existing facilities and equipment and to evaluate other investments in organic growth in our target markets. In particular, over the past several years we have invested substantial resources into projects intended to increase our global automotive finishing capacity and raise the recycled content of our products. These projects involve numerous risks and uncertainties, including the risk that our forecasted demand levels prove to be inaccurate and the risk that aluminum price trends diminish the benefits we anticipate from our recycling investments.

Demand for our automotive products is dependent on vehicle production cycles and material preferences of our customers. Although certain automotive companies have increased their use of aluminum in recent years, there is no assurance that our automotive customers will not turn to steel or other materials in the future, due to the price of aluminum or other factors.

If our capital investments do not produce the benefits we anticipate, our financial condition and results of operations could be adversely affected.

Our goodwill, other intangible assets and other long-lived assets could become impaired, which could require us to take non-cash charges against earnings.

We assess, at least annually and potentially more frequently, whether the value of our goodwill has been impaired. We assess the recoverability of finite-lived other intangible assets and other long-lived assets whenever events or changes in circumstances indicate we may not be able to recover the asset's carrying amount. Any impairment of goodwill, other intangible assets, or long-lived assets as a result of such analysis would result in a non-cash charge against earnings, which could materially adversely affect our reported results of operations. A significant and sustained decline in our future cash flows, a significant adverse change in the economic environment or slower growth rates could result in the need to perform additional impairment analysis in future periods.

Economic conditions could negatively affect our financial condition and results of operations.

Our financial condition and results of operations depend significantly on worldwide economic conditions. Uncertainty about current or future global economic conditions poses a risk as our customers may postpone purchases in response to tighter credit and negative financial news, which could adversely impact demand for our products. In addition, there can be no assurance that actions we may take in response to economic conditions will be sufficient to counter any continuation or any downturn or disruption.

We have significant operations in Europe, including operations in the United Kingdom, and material portion of our revenues are generated in Europe. The June 2016 vote in the United Kingdom to withdraw from the European Union (Brexit) could result in legal uncertainty and influence the economic outlook of the European Union. In addition, elections in other European countries this year, including France and Germany, may also fuel economic uncertainty in the European Union. Any disruptions in the European financial markets or instability of the euro could have negative implications for global economic conditions. A significant global economic downturn or disruption in the financial markets could have a material adverse effect on our financial condition and results of operations.

A significant global economic downturn or disruption in the financial markets could have a material adverse effect on our financial condition and results of operations.

Our results of operations, cash flows and liquidity could be adversely affected if we were unable to transact in derivative instruments or if counterparties to our derivative instruments fail to honor their agreements.

We use various derivative instruments to manage the risks arising from fluctuations in aluminum prices, exchange rates, energy prices and interest rates. If for any reason we were unable to transact in derivative instruments to manage these risks, our results of operations, cash flows and liquidity could be adversely affected. In addition, we may be exposed to losses in the future if the counterparties to our derivative instruments fail to honor their agreements. In particular, deterioration in the financial condition of our counterparties and any resulting failure to pay amounts owed to us or to perform obligations or services owed to us could have a negative effect on our business and financial condition. Further, if major financial institutions consolidate and are forced to operate under more restrictive capital constraints and regulations, there could be less liquidity in the derivative markets, which could have a negative effect on our ability to hedge and transact with creditworthy counterparties.

We could be required to make unexpected contributions to our defined benefit pension plans as a result of adverse changes in interest rates and the capital markets.

Most of our pension obligations relate to funded defined benefit pension plans for our employees in the U.S., the U.K. Switzerland, and Canada, unfunded pension benefits in Germany and lump sum indemnities payable to our employees in France, Italy, Korea and Malaysia upon retirement or termination. Our pension plan assets consist primarily of funds invested in listed stocks and bonds. Our estimates of liabilities and expenses for pensions and other postretirement benefits incorporate a number of assumptions, including expected long-term rates of return on plan assets and interest rates used to discount future benefits. Our results of operations, liquidity or shareholder's (deficit) equity in a particular period could be adversely affected by capital market returns that are less than their assumed long-term rate of return or a decline of the rate used to discount future benefits. These factors or others may require us to make unexpected cash contributions to the pension plans in the future, preventing the use of such cash for other purposes.

We are subject to a broad range of environmental, health and safety laws and regulations, and we may be exposed to substantial environmental, health and safety costs and liabilities.

We are subject to a broad range of environmental, health and safety laws and regulations in the jurisdictions in which we operate. These laws and regulations impose stringent environmental, health and safety protection standards and permitting requirements regarding, among other things, air emissions, wastewater storage, treatment and discharges, the use and handling of hazardous or toxic materials, waste disposal practices, the remediation of environmental contamination, post-mining reclamation and working conditions for our employees. Some environmental laws, such as Superfund and comparable laws in the U.S. and other jurisdictions worldwide, impose joint and several liability for the cost of environmental remediation, natural resource damages, third party claims, and other expenses, without regard to the fault or the legality of the original conduct.

The costs of complying with these laws and regulations, including participation in assessments and remediation of contaminated sites and installation of pollution control facilities, have been, and in the future could be, significant. In addition, these laws and regulations may also result in substantial environmental liabilities associated with divested assets, third party locations and past activities. In certain instances, these costs and liabilities, as well as related action to be taken by us, could be

accelerated or increased if we were to close, divest of or change the principal use of certain facilities with respect to which we may have environmental liabilities or remediation obligations. Currently, we are involved in a number of compliance efforts, remediation activities and legal proceedings concerning environmental matters, including certain activities and proceedings arising under Superfund and comparable laws in the U.S. and other jurisdictions worldwide in which we have operations.

We have established liabilities for environmental remediation activities where appropriate. However, the cost of addressing environmental matters (including the timing of any charges related thereto) cannot be predicted with certainty, and these liabilities may not ultimately be adequate, especially in light of changing interpretations of laws and regulations by regulators and courts, the discovery of previously unknown environmental conditions, the risk of governmental orders to carry out additional compliance on certain sites not initially included in remediation in progress, our potential liability to remediate sites for which provisions have not been previously established and the adoption of more stringent environmental laws including, for example, the possibility of increased regulation of the use of bisphenol-A, a chemical component commonly used in the coating of aluminum cans. Such future developments could result in increased environmental costs and liabilities, which could have a material adverse effect on our financial condition, results or cash flows. Furthermore, the failure to comply with our obligations under the environmental laws and regulations could subject us to administrative, civil or criminal penalties, obligations to pay damages or other costs, and injunctions or other orders, including orders to cease operations. In addition, the presence of environmental contamination at our properties could adversely affect our ability to sell the property, receive full value for a property or use a property as collateral for a loan.

Some of our current and potential operations are located or could be located in or near communities that may regard such operations as having a detrimental effect on their social and economic circumstances. Community objections could have a material adverse impact upon the profitability or, in extreme cases, the viability of an operation.

We use a variety of hazardous materials and chemicals in our rolling processes and in connection with maintenance work on our manufacturing facilities. Because of the nature of these substances or related residues, we may be liable for certain costs, including, among others, costs for health-related claims or removal or re-treatment of such substances. Certain of our current and former facilities incorporate asbestos-containing materials, a hazardous substance that has been the subject of health-related claims for occupational exposure. In addition, although we have developed environmental, health and safety programs for our employees, including measures to reduce employee exposure to hazardous substances, and conduct regular assessments at our facilities, we are currently, and in the future may be, involved in claims and litigation filed on behalf of persons alleging injury predominantly as a result of occupational exposure to substances or other hazards at our current or former facilities. It is not possible to predict the ultimate outcome of these claims and lawsuits due to the unpredictable nature of personal injury litigation. If these claims and lawsuits, individually or in the aggregate, were finally resolved against us, our results of operations and cash flows could be adversely affected.

We may be exposed to significant legal proceedings or investigations.

From time to time, we are involved in, or the subject of, disputes, proceedings and investigations with respect to a variety of matters, including environmental, health and safety, product liability, employee, tax, personal injury, contractual and other matters as well as other disputes and proceedings that arise in the ordinary course of business. Certain of these matters are discussed in the preceding risk factor. Any claims against us or any investigations involving us, whether meritorious or not, could be costly to defend or comply with and could divert management's attention as well as operational resources. Any such dispute, litigation or investigation, whether currently pending or threatened or in the future, may have a material adverse effect on our financial results and cash flows.

In addition, we are sometimes exposed to warranty and product liability claims. There can be no assurance that we will not experience material product liability losses arising from individual suits or class actions alleging product liability defects or related claims in the future and that these will not have a negative impact on us. We generally maintain insurance against many product liability risks, but there can be no assurance that this coverage will be adequate for any liabilities ultimately incurred. In addition, there is no assurance that insurance will continue to be available on terms acceptable to us. A successful claim that exceeds our available insurance coverage could have a material adverse effect on our financial results and cash flows.

We may be affected by global climate change or by legal, regulatory, or market responses to such change.

Increased concern over climate change has led to new and proposed legislative and regulatory initiatives, such as cap-and-trade systems and additional limits on emissions of greenhouse gases. New laws enacted could directly and indirectly affect our customers and suppliers (through an increase in the cost of production or their ability to produce satisfactory products) or our business (through an impact on our inventory availability, cost of sales, operations or demand for the products)

we sell), which could result in an adverse effect on our financial condition, results of operations and cash flows. Compliance with any new or more stringent laws or regulations, or stricter interpretations of existing laws, could require additional expenditures by us, our customers or our suppliers. Also, we rely on natural gas, electricity, fuel oil and transport fuel to operate our facilities. Any increased costs of these energy sources because of new laws could be passed along to us and our customers and suppliers, which could also have a negative impact on our profitability.

Income tax payments may ultimately differ from amounts currently recorded by the Company. Future tax law changes may materially increase the Company's prospective income tax expense.

We are subject to income taxation in many jurisdictions. Judgment is required in determining our worldwide income tax provision and accordingly there are many transactions and computations for which our final income tax determination is uncertain. We are routinely audited by income tax authorities in many tax jurisdictions. Although we believe the recorded tax estimates are reasonable, the ultimate outcome from any audit (or related litigation) could be materially different from amounts reflected in our income tax provisions and accruals. Future settlements of income tax audits may have a material effect on earnings between the period of initial recognition of tax estimates in the financial statements and the point of ultimate tax audit settlement. Additionally, it is possible that future income tax legislation in any jurisdiction to which we are subject may be enacted that could have a material impact on our worldwide income tax provision beginning with the period that such legislation becomes effective.

Our indebtedness could adversely affect our business.

As of March 31, 2017, we had \$4.9 billion of indebtedness outstanding. Our indebtedness and interest expense could have important consequences to our Company and holders of notes, including:

- limiting our ability to borrow additional amounts for working capital, capital expenditures or other general corporate purposes;
- increasing our vulnerability to general adverse economic and industry conditions, including volatility in LME aluminum prices;
- limiting our ability to capitalize on business opportunities and to react to competitive pressures and adverse changes in government regulation; and
- limiting our ability or increasing the costs to refinance indebtedness.

The covenants in our senior secured credit facilities and the indentures governing our Senior Notes impose operating and financial restrictions on us.

Our senior secured credit facilities and the indentures governing our Senior Notes impose certain operating and financial restrictions on us. These restrictions limit our ability and the ability of our restricted subsidiaries, among other things, to:

- incur additional debt and provide additional guarantees;
- pay dividends and make other restricted payments, including certain investments;
- create or permit certain liens;
- make certain asset sales;
- use the proceeds from the sales of assets and subsidiary stock;
- create or permit restrictions on the ability of our restricted subsidiaries to pay dividends or make other distributions to us;
- engage in certain transactions with affiliates;
- enter into sale and leaseback transactions; and
- consolidate, merge or transfer all or substantially all of our assets or the assets of our restricted subsidiaries.

See Note 11 — Debt for additional discussion.

Hindalco and its interests as equity holder may conflict with the interests of the holders of our senior notes in the future.

Novelis is an indirectly wholly-owned subsidiary of Hindalco. As a result, Hindalco may exercise control over our decisions to enter into any corporate transaction or capital restructuring and has the ability to approve or prevent any transaction that requires the approval of our shareholder. Hindalco may have an interest in pursuing acquisitions, divestitures, financings or other transactions that, in its judgment, could enhance its equity investment, even though such transactions might involve risks to holders of our Senior Notes.

Additionally, Hindalco operates in the aluminum industry and may from time to time acquire and hold interests in businesses that compete, directly or indirectly, with us. Hindalco has no obligation to provide us with financing and is able to sell their equity ownership in us at any time.

Item 1B. Unresolved Staff Comments

None.

Item 2. Properties

Our global headquarters are located in Atlanta, Georgia. Our global research and technology center is located in Kennesaw, Georgia, which contains state-of-the-art research and development capabilities to help us better partner and innovate with our customers. Our regional headquarters are located in the following cities: North America - Atlanta, Georgia; Europe - Küssnacht, Switzerland; Asia - Seoul, South Korea; and South America - Sao Paulo, Brazil. We also have a research facility in Spokane, Washington specializing in molten metal processing.

The total number of operating facilities within our operating segments as of March 31, 2017 is shown in the table below, including operating facilities we jointly own and operate with third parties.

	Total Operating Facilities	Facilities with Recycling Operations
North America	8	3
Europe	10	4
Asia	4	3
South America	2	1
Total	24	11

The following tables provide information, by operating segment, about the plant locations, processes and major end-use markets/applications for the aluminum rolled products, recycling and primary metal facilities we operated during all or part of the year ended March 31, 2017.

North America

<u>Locations</u>	<u>Plant Processes</u>	<u>Major Products</u>
Berea, Kentucky	Recycling, sheet ingot casting	Sheet ingot from recycled metal
Fairmont, West Virginia	Cold rolling, finishing	Foil, HVAC material
Greensboro, Georgia	Recycling, sheet ingot casting	Sheet ingot from recycled metal
Kingston, Ontario	Cold rolling, finishing	Automotive sheet, construction sheet, industrial sheet
Russellville, Kentucky (A)	Hot rolling, cold rolling, finishing	Can stock
Oswego, New York (B)	Sheet ingot casting, hot rolling, cold rolling, recycling, brazing, finishing, heat treatment	Can stock, automotive sheet, construction sheet, industrial sheet, semi-finished coil
Terre Haute, Indiana	Cold rolling, finishing	Foil
Warren, Ohio	Coating	Can stock

(A) We own 40% of the outstanding common shares of Logan, but we have made equipment investments such that our portion of Logan's total machine hours provides us approximately 55% of Logan's total production.

(B) In fiscal 2015 and 2016, we began production at three automotive sheet finishing lines and expanded our recycling operations in our Oswego, New York facility.

Our Oswego, New York facility operates modern equipment used for recycling beverage cans and other aluminum scrap, ingot casting, hot rolling, cold rolling and finishing. The Oswego facility produces can stock, automotive sheet, as well as building and industrial products. The facility also provides feedstock to our Kingston, Ontario facility, which produces automotive sheet and products for construction and industrial applications, and to our Fairmont, West Virginia facility, which produces foil and light-gauge sheet.

Our Logan facility is a processing joint venture between us and Tri-Arrows Aluminum Inc. (Tri-Arrows). Logan is a dedicated manufacturer of aluminum sheet products for the can stock market and operates modern and high-speed equipment for ingot casting, hot-rolling, cold-rolling and finishing. A portion of the can end stock is coated at North America's Warren, Ohio facility, in addition to Logan's on-site coating assets. Together with Tri-Arrows, we operate Logan as a production cooperative, with each party supplying its own primary metal inputs for conversion at the facility. The converted product is then returned to the supplying party at cost. Logan does not own any of the primary metal inputs or any of the converted products. Most of the fixed assets at Logan are directly owned by us and Tri-Arrows in varying ownership percentages or solely by each party.

Along with our recycling center in Oswego, New York, we own two other fully dedicated recycling facilities in North America, located in Berea, Kentucky and Greensboro, Georgia. Each offers a modern, cost-efficient process to recycle UBCs and other aluminum scrap into sheet ingot to supply our hot mills in Logan and Oswego.

Europe

<u>Locations</u>	<u>Plant Processes</u>	<u>Major Products</u>
Bresso, Italy	Finishing, painting	Painted sheet, construction sheet
Göttingen, Germany	Cold rolling, finishing, painting	Can stock, food can, lithographic, painted sheet, automotive sheet
Latchford, United Kingdom	Recycling	Sheet ingot from recycled metal
Ludenscheid, Germany	Foil rolling, finishing, converting	Foil, packaging
Nachterstedt, Germany	Cold rolling, finishing, painting, recycling, heat treatment	Automotive sheet, can stock, industrial sheet, painted sheet, construction sheet, sheet ingot
Neuss, Germany (A)	Hot rolling, cold rolling, recycling	Can stock, foilstock, feeder stock for finishing operations
Ohle, Germany	Cold rolling, finishing, converting	Foil, packaging
Pieve, Italy	Continuous casting, cold rolling, finishing, recycling	Coil for finishing operations, industrial sheet
Sierre, Switzerland (B)	Sheet ingot casting, hot rolling, cold rolling, finishing	Automotive sheet, industrial sheet
Crick, United Kingdom (C)	Finishing	Automotive sheet

(A) Operated as a 50/50 joint venture between us and Hydro Aluminium Deutschland GmbH (Hydro). This joint venture is known as "Alunorf".

(B) Operated under a long-term lease arrangement with a third party lessor.

(C) In fiscal year 2016, we moved operations from the Wednesbury, U.K. facility to a facility in Crick, U.K.

Aluminium Norf GmbH (Alunorf) in Germany, a 50/50 production-sharing joint venture between us and Hydro, is a large scale, modern manufacturing hub, located in Neuss, Germany, for several of our operations in Europe, and is the largest aluminum rolling mill and remelting operation in the world. Together with Hydro, we operate Alunorf as a production cooperative, with each party supplying its own primary metal inputs for transformation at the facility. The transformed product is then transferred back to the supplying party on a pre-determined cost-plus basis. Alunorf supplies hot coil for further processing through cold rolling to some of our other plants, including Göttingen and Nachterstedt in Germany and provides foilstock to our plants in Ohle and Ludenscheid in Germany. The Ohle and Ludenscheid cold mill and finishing lines produce products for a number of end use applications, such as flexible tubes and bare, container, and converter foil.

Our Göttingen plant has a cold mill and paint line as well as finishing capability for can, food, and automotive sheet. Our Nachterstedt plant cold rolls and finishes automotive, can, industrial, and architectural sheet. In October 2014, we opened the world's largest recycling center at our Nachterstedt, Germany site. It is a fully integrated recycling facility, capable of recycling a wide variety of scrap. The Pieve plant, located near Milan, Italy, produces continuous cast coil that is cold rolled into paintstock and sent to the Bresso, Italy plant for painting and finishing.

The Sierre rolling mill and remelt operation in Switzerland, along with the Nachterstedt and Göttingen plants in Germany, combine to make Novelis Europe's leading producer of automotive sheet in terms of shipments.

We lease a facility in Crick, U.K., that houses a small finishing operation for automotive products.

Asia

<u>Locations</u>	<u>Plant Processes</u>	<u>Major Products</u>
Binh Duong, Vietnam	Recycling	Recycled material
Changzhou, China	Heat treatment	Automotive sheet
Ulsan, South Korea	Sheet ingot casting, hot rolling, cold rolling, recycling, finishing	Can stock, construction sheet, industrial sheet, electronics, automotive sheet for finishing operations, foilstock, and recycled material
Yeongju, South Korea	Sheet ingot casting, hot rolling, cold rolling, recycling, finishing	Can stock, construction sheet, industrial sheet, electronics, foilstock and recycled material

In addition to its rolling operations, Novelis Asia operates recycling furnaces at both its Ulsan and Yeongju facilities in South Korea for the conversion of customer and third-party recycled aluminum. We also have an aluminum automotive sheet finishing plant in Changzhou, China. In addition, we have a facility in Binh Duong, Vietnam, which handles the collection and processing of UBCs.

South America

<u>Locations</u>	<u>Plant Processes</u>	<u>Major Products</u>
Pindamonhangaba, Brazil	Sheet ingot casting, hot rolling, cold rolling, recycling, finishing, coating	Can stock, construction sheet, industrial sheet, foilstock, sheet ingot
Santo Andre, Brazil	Foil rolling, finishing	Foil

Our Pinda rolling and recycling facility in Brazil has an integrated process including sheet ingot casting, hot rolling, cold rolling, coating, finishing, and recycling operations. A coating line also produces painted products, including can end stock. Pinda supplies foilstock to our Santo Andre foil plant, which produces converter, household and container foil, among others.

Pinda is the largest aluminum rolling and recycling facility in South America in terms of shipments and is the only facility in South America capable of producing can stock. Pinda recycles primarily UBCs, and is engaged in tolling recycled metal for our customers.

We also own certain hydroelectric power assets that used to supply electricity for our primary aluminum smelting operations closed in December 2014. From 2015 onwards, we sold most of these hydroelectric power assets including one plant in fiscal 2017. Currently, there is one power plant operating, which is held for sale, that supplies energy to Pinda or sells energy on the spot market.

Item 3. *Legal Proceedings*

We are a party to litigation incidental to our business from time to time. For additional information regarding litigation to which we are a party, see Note 20 — Commitments and Contingencies to our accompanying audited consolidated financial statements, which are incorporated by reference into this item.

Item 4. *Mine Safety Disclosures*

Not applicable.

PART II

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

There is no established public trading market for the Company's common stock. All of the common shares of Novelis are owned directly by AV Metals Inc. and indirectly by Hindalco Industries Limited. None of the equity securities of the Company are authorized for issuance under any equity compensation plan.

Dividends or returns of capital are at the discretion of the board of directors and will depend on, among other things, our financial resources, cash flows generated by our business, our cash requirements, restrictions under and covenant compliance under the instruments governing our indebtedness, being in compliance with the appropriate indentures and covenants under the instruments that govern our indebtedness that would allow us to legally pay dividends or return capital and other relevant factors.

In March 2014, we declared a return of capital to our shareholder, AV Metals Inc., in the amount of \$250 million, which we subsequently paid on April 30, 2014.

Item 6. Selected Financial Data

The selected consolidated financial data should be read in conjunction with our consolidated financial statements for the respective periods and the related notes included elsewhere in this Form 10-K.

All of our common shares were indirectly held by Hindalco; thus, earnings per share data are not reported. Amounts in the tables below are in millions.

	Year Ended March 31,				
	2017	2016	2015	2014	2013
Net sales	\$ 9,591	\$ 9,872	\$ 11,147	\$ 9,767	\$ 9,812
Net income (loss) attributable to our common shareholder	\$ 45	\$ (38)	\$ 148	\$ 104	\$ 202
Return of capital (A)	\$ —	\$ —	\$ —	\$ 250	\$ —

	March 31,				
	2017	2016	2015	2014	2013
Total assets (B)	\$ 8,344	\$ 8,280	\$ 9,102	\$ 9,114	\$ 8,522
Long-term debt (including current portion) (B)	\$ 4,558	\$ 4,468	\$ 4,457	\$ 4,451	\$ 4,464
Short-term borrowings	\$ 294	\$ 579	\$ 846	\$ 723	\$ 468
Cash and cash equivalents	\$ 594	\$ 556	\$ 628	\$ 509	\$ 301
Total (deficit) equity	\$ (77)	\$ (59)	\$ (70)	\$ 268	\$ 239

(A) In March 2014, we declared a return of capital to our shareholder in the amount of \$250 million, which we subsequently paid on April 30, 2014.

(B) The March 31, 2016 balance above is \$30 million lower than the March 31, 2016 balance in the prior year disclosure due to the adoption of ASU 2015-03. Refer to Note 1 — Business and Summary of Significant Accounting Policies for further information.

OVERVIEW AND REFERENCES

Novelis is the world's leading aluminum rolled products producer based on shipment volume in fiscal 2017. We produce aluminum sheet and light gauge products for use in the packaging market, which includes beverage and food can and foil products, as well as for use in the automotive, transportation, electronics, architectural and industrial product markets. We are also the world's largest recycler of aluminum and have recycling operations in many of our plants to recycle both post-consumer aluminum and post-industrial aluminum. As of March 31, 2017, we had manufacturing operations in ten countries on four continents, which include 24 operating plants, and recycling operations in eleven of these plants.

The following discussion contains forward-looking statements that reflect our plans, estimates and beliefs. Our actual results could differ materially from those discussed in these forward-looking statements. Factors that could cause or contribute to these differences include, but are not limited to, those discussed below and elsewhere in this Annual Report, particularly in "Special Note Regarding Forward-Looking Statements and Market Data" and "Risk Factors."

HIGHLIGHTS

We reported "Segment income" of \$1,054 million for the year ended March 31, 2017, compared to \$791 million in the prior year. The increase is primarily due to favorable impacts from strong operational performance globally, our focus on driving asset efficiency, lower metal input costs, record automotive shipments and significant operating cost reductions. The increase is also due to favorable foreign exchange, as well as the lessening of unfavorable metal price lag impacts caused by volatility in local market premiums in the prior year.

We reported "Net income" of \$46 million for the year ended March 31, 2017, compared to "Net loss" of \$38 million for the year ended March 31, 2016. Capital expenditures declined as our larger strategic projects have all been completed. We spent \$224 million for the year ended March 31, 2017 compared to \$370 million for the year ended March 31, 2016.

Additionally, we successfully refinanced a significant portion of our long-term debt through the repayment of our 2017 Notes, 2020 Notes and Term Loan with the new issuance of 2024 Notes, 2026 Notes and new Term Loan during fiscal year 2017. The refinancings resulted in a "Loss on extinguishment of debt" of \$134 million, partially offset by interest expense decreasing by \$33 million primarily as a result of lower interest rates on the new debt. Furthermore, we will benefit from future annual cash interest savings of \$79 million.

Furthermore, effective May 10, 2017, Novelis Korea, a subsidiary of Novelis Inc., entered into definitive agreements with Kobe Steel Ltd. (Kobe) under which Novelis Korea and Kobe will jointly own and operate the Ulsan manufacturing plant currently owned by Novelis Korea. To effect the transaction, Novelis Korea will form a new wholly owned subsidiary, Ulsan Aluminum, Ltd. (UAL) and will contribute the assets of the Ulsan plant to UAL. Kobe will purchase up to 50% of the outstanding shares of UAL for a purchase price of \$315 million. The agreements contemplate that each of Novelis Korea and Kobe will supply input metal to UAL and UAL will produce flat-rolled aluminum products exclusively for Novelis Korea and Kobe. The transaction is expected to close in September 2017, subject to customary closing conditions. Upon completion, the transaction will generate cash proceeds to enhance Novelis' strategic flexibility and reduce its net debt.

BUSINESS AND INDUSTRY CLIMATE

Economic growth and material substitution continue to drive increasing global demand for aluminum and rolled products. However, slower economic growth in South America has muted beverage can demand in that region. Global can sheet overcapacity, increased competition from Chinese suppliers of flat rolled aluminum products, and customer consolidation are also adding downward pricing pressures in the can sheet market.

Meanwhile, the demand for aluminum in the automotive industry continues to grow. This demand has been primarily driven by the benefits that result from using lighter weight materials in the vehicles, as companies respond to government regulations, which are driving improved emissions and better fuel economy; while also maintaining or improving vehicle safety and performance. We expect the automotive aluminum market to grow significantly through the end of the decade, which has driven the investments we made in our automotive sheet finishing capacity in North America, Europe and Asia.

Key Sales and Shipment Trends

(in millions, except shipments which are in kt)

	Three Months Ended				Year Ended	Three Months Ended				Year Ended
	Jun 30, 2015	Sept 30, 2015	Dec 31, 2015	Mar 31, 2016	Mar 31, 2016	Jun 30, 2016	Sept 30, 2016	Dec 31, 2016	Mar 31, 2017	Mar 31, 2017
Net sales	\$ 2,634	\$ 2,482	\$ 2,354	\$ 2,402	\$ 9,872	\$ 2,296	\$ 2,361	\$ 2,313	\$ 2,621	\$ 9,591
Percentage increase (decrease) in net sales versus comparable previous year period	(2)%	(12)%	(17)%	(14)%	(11)%	(13)%	(5)%	(2)%	9 %	(3)%
Rolled product shipments:										
North America	261	269	253	249	1,032	242	252	247	269	1,010
Europe	252	250	232	244	978	246	236	226	235	943
Asia	193	187	193	187	760	178	176	162	174	690
South America	107	117	132	134	490	103	121	125	125	474
Eliminations	(45)	(35)	(31)	(26)	(137)	(14)	(12)	(10)	(14)	(50)
Total	768	788	779	788	3,123	755	773	750	789	3,067

The following summarizes the percentage increase (decrease) in rolled product shipments versus the comparable previous year period:

North America	5 %	3 %	(1)%	2 %	2 %	(7)%	(6)%	(2)%	8 %	(2)%
Europe	2 %	7 %	6 %	2 %	4 %	(2)%	(6)%	(3)%	(4)%	(4)%
Asia	3 %	1 %	(3)%	(5)%	(1)%	(8)%	(6)%	(16)%	(7)%	(9)%
South America	(6)%	1 %	2 %	2 %	— %	(4)%	3 %	(5)%	(7)%	(3)%
Total	— %	3 %	3 %	4 %	2 %	(2)%	(2)%	(4)%	— %	(2)%

Business Model and Key Concepts

Conversion Business Model

A significant amount of our business is conducted under a conversion model, which allows us to pass through increases or decreases in the price of aluminum to our customers. Nearly all of our flat-rolled products have a price structure with three components: (i) a base aluminum price quoted off the LME; (ii) a local market premium; and (iii) a “conversion premium” to produce the rolled product which reflects, among other factors, the competitive market conditions for that product. Base aluminum prices are typically driven by macroeconomic factors and global supply and demand of aluminum. The local market premiums tend to vary based on the supply and demand for metal in a particular region and associated transportation costs.

In North America, Europe and South America, we pass through local market premiums to our customers which are recorded through "Net sales." In Asia we purchase our metal inputs based on the LME and incur a local market premium; however, many of our competitors in this region price their metal off the Shanghai Futures Exchange, which does not include a local market premium, making it difficult for us to fully pass through this component of our metal input cost to some of our customers.

LME Base Aluminum Prices and Local Market Premiums

The average (based on the simple average of the monthly averages) and closing prices for aluminum set on the LME for the years ended March 31, 2017, 2016, and 2015 are as follows:

	Year Ended March 31,			Percent Change	
	2017	2016	2015	Year Ended March 31, 2017 versus March 31, 2016	Year Ended March 31, 2016 versus March 31, 2015

London Metal Exchange Prices

Aluminum (per metric tonne, and presented in U.S. dollars):

Closing cash price as of beginning of period	\$ 1,492	\$ 1,789	\$ 1,731	(17)%	3 %
Average cash price during period	\$ 1,688	\$ 1,592	\$ 1,889	6 %	(16)%
Closing cash price as of end of period	\$ 1,947	\$ 1,492	\$ 1,789	30 %	(17)%

Local market premiums have been fairly stable over the past year, but in the previous year premiums decreased rapidly. The local market premiums in all four of our regions were lower for the year ended March 31, 2017 compared to the year ended March 31, 2016. The weighted average local market premium was as follows:

	Year Ended March 31,			Percent Change	
	2017	2016	2015	Year Ended March 31, 2017 versus March 31, 2016	Year Ended March 31, 2016 versus March 31, 2015

Weighted average Local Market Premium (per metric tonne, and presented in U.S. dollars)

	\$ 151	\$ 194	\$ 464	(22)%	(58)%
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Metal Price Lag and Related Hedging Activities

Increases or decreases in the price of aluminum based on the average LME base aluminum prices and local market premiums directly impact “Net sales,” “Cost of goods sold (exclusive of depreciation and amortization)” and working capital. The timing of these impacts varies based on contractual arrangements with customers and metal suppliers in each region. These timing impacts are referred to as metal price lag. Metal price lag exists due to: (i) the period of time between the pricing of our purchases of metal, holding and processing the metal, and the pricing of the sale of finished inventory to our customers, and (ii) certain customer contracts containing fixed forward price commitments which result in exposure to changes in metal prices for the period of time between when our sales price fixes and the sale actually occurs.

We use LME aluminum forward contracts to preserve our conversion margins and manage the timing differences associated with the LME base metal component of “Net sales,” and “Cost of goods sold (exclusive of depreciation and amortization).” These derivatives directly hedge the economic risk of future LME base metal price fluctuations to better match the purchase price of metal with the sales price of metal. The derivative market for local market premiums is not robust or efficient enough for us to offset the impacts of LMP price movements beyond a very small volume. As a consequence, volatility in local market premiums can have a significant impact on our results of operations and cash flows.

We elect to apply hedge accounting to better match the recognition of gains or losses on certain derivative instruments with the recognition of the underlying exposure being hedged in the statement of operations. For undesignated metal derivatives, there are timing differences between the recognition of unrealized gains or losses on the derivatives and the recognition of the underlying exposure in the statement of operations. The recognition of unrealized gains and losses on undesignated metal derivative positions typically precedes inventory cost recognition, customer delivery and revenue recognition. The timing difference between the recognition of unrealized gains and losses on undesignated metal derivatives and cost or revenue recognition impacts “Income before income taxes” and “Net income.” Gains and losses on metal derivative contracts are not recognized in “Segment income” until realized.

See *Segment Review* below for the impact of metal price lag on each of our segments.

Foreign Currency and Related Hedging Activities

We operate a global business and conduct business in various currencies around the world. We have exposure to foreign currency risk as fluctuations in foreign exchange rates impact our operating results as we translate the operating results from various functional currencies into our U.S. dollar reporting currency at the current average rates. We also record foreign exchange remeasurement gains and losses when business transactions are denominated in currencies other than the functional currency of that operation. Global economic uncertainty is contributing to higher levels of volatility among the currency pairs in which we conduct business. The following table presents the exchange rates as of the end of each period and the average of the month-end exchange rates for the years ended March 31, 2017, 2016, and 2015:

	Exchange Rate as of March 31,			Average Exchange Rate Year Ended March 31,		
	2017	2016	2015	2017	2016	2015
U.S. dollar per Euro	1.068	1.139	1.075	1.098	1.102	1.256
Brazilian real per U.S. dollar	3.168	3.559	3.208	3.290	3.624	2.504
South Korean won per U.S. dollar	1,116	1,154	1,105	1,148	1,158	1,059
Canadian dollar per U.S. dollar	1.329	1.298	1.267	1.314	1.312	1.147
Swiss franc per Euro	1.069	1.094	1.045	1.084	1.076	1.170

Exchange rate movements have an impact on our operating results. In Europe, where we have predominantly local currency selling prices and operating costs, we benefit as the Euro strengthens, but are adversely affected as the Euro weakens. In South Korea, where we have local currency operating costs and U.S. dollar denominated selling prices for exports, we benefit as the won weakens but are adversely affected as the won strengthens. In Brazil, where we have predominately U.S. dollar selling prices and local currency manufacturing costs, we benefit as the real weakens, but are adversely affected as the real strengthens.

We use foreign exchange forward contracts and cross-currency swaps to manage our exposure arising from recorded assets and liabilities, firm commitments, and forecasted cash flows denominated in currencies other than the functional currency of certain operations, which include capital expenditures and net investment in foreign subsidiaries. The impact of foreign exchange remeasurement, net of related hedges, was a net gain of \$5 million in fiscal 2017, a net gain of \$2 million in fiscal 2016, and a net loss of \$27 million in fiscal 2015. The movement of currency exchange rates during fiscal 2017, fiscal 2016 and fiscal 2015 resulted in less than \$8 million of net unrealized losses, less than \$8 million of net unrealized gains, and \$3 million of net unrealized gains, respectively, on undesignated foreign currency derivatives.

See *Segment Review* below for the impact of foreign currency on each of our segments.

Recent Developments

Sierre Leases

We lease real and personal property at our Sierre, Switzerland rolling facility from a subsidiary of Constellium N.V. (Constellium) as part of a long-term, renewable lease agreement. In January 2017, Constellium submitted to the Company a notice of termination of the lease agreements on the grounds that the Company breached certain terms and failed to remedy the alleged breaches within the cure period of the lease agreements. The Company believes it has not breached the lease agreements and Constellium does not have a right to terminate the leases. Novelis has submitted the dispute to arbitration under the rules of the International Chamber of Commerce as required by the lease agreements, has filed formal challenges to the termination notice, and has requested a stay of execution of the notice of termination at least until the arbitration has concluded.

Results of Operations

Year Ended March 31, 2017 Compared with the Year Ended March 31, 2016

"Net sales" were \$9.6 billion, a decrease of 3% driven by a 2% decrease in flat rolled product shipments and a 22% decrease in local market premiums, partially offset by a 6% increase in average base aluminum prices and a favorable impact from our strategic shift to higher conversion premium products.

"Cost of goods sold (exclusive of depreciation and amortization)" was \$8.0 billion, a decrease of 9%, due to lower flat rolled product shipments and cost improvements which contributed to lower average metal costs. Total metal input costs included in "Cost of goods sold (exclusive of depreciation and amortization)" decreased \$638 million.

"Income before income taxes" for the year ended March 31, 2017 was \$197 million compared to \$8 million in the year ended March 31, 2016. In addition to the factors noted above, the following items affected "Income before income taxes:"

- Increased stability in the current year local market premiums, resulted in a \$31 million metal price lag loss during the year ended March 31, 2017 compared to a \$172 million metal price lag loss during the year ended March 31, 2016.
- "Restructuring and impairment, net" of \$10 million for the year ended March 31, 2017, includes \$5 million of severance charges and \$3 million of other charges across our regions. Additionally, there were \$2 million of impairment charges related to assets in North America. In the prior year, we incurred \$48 million, which related to \$21 million of charges related to capitalized software impairments, \$14 million of severance and other charges related to restructuring actions at our global headquarters and \$10 million of severance and other charges across our regions;
- A decline in interest expense of \$33 million primarily resulting from the refinancing of the 2017 Notes, 2020 Notes and Term Loan, due to lower interest rates;
- "Loss on extinguishment of debt" in the current year of \$134 million relates to the extinguishment of the 2017 Notes, 2020 Notes and Term Loan. In the prior year, the loss related to an amendment leading to a partial extinguishment of the Term Loan; and
- A loss of \$27 million was recognized on the sale of our interest in Aluminium Company of Malaysia Berhad, which was reported in "Other (income) expense, net".
- A gain of \$10 million was recognized related to the settlement of a business interruption recovery claim due to an outage at the hotmill in the Logan facility in North America for the year ended March 31, 2016. There were no such gain recorded in the current year.

We recognized \$151 million of tax expense for the year ended March 31, 2017, due to the results of operations at statutory tax rates, as well as due to tax losses in jurisdictions where we believe it is more likely than not that we will not be able to utilize those losses and therefore have a valuation allowance recorded and tax rate differences on foreign earnings, offset by dividends not subject to tax. We recognized \$46 million of tax expense for the year ended March 31, 2016, primarily due to the results of operations at statutory tax rates, tax losses in jurisdictions where we believe it to be more likely than not that we will not be able to utilize those losses and therefore have a valuation allowance recorded and the net impact of foreign exchange translation and remeasurement of deferred income taxes, offset by dividends not subject to tax.

We reported "Net income attributable to our common shareholder" of \$45 million for the year ended March 31, 2017 as compared to "Net loss attributable to our common shareholder" of \$38 million for the year ended March 31, 2016, primarily as a result of the factors discussed above.

Segment Review

Due in part to the regional nature of supply and demand of aluminum rolled products and in order to best serve our customers, we manage our activities on the basis of geographical regions and are organized under four operating segments: North America, Europe, Asia and South America.

We measure the profitability and financial performance of our operating segments based on "Segment income." We define "Segment income" as earnings before (a) "depreciation and amortization"; (b) "interest expense and amortization of debt issuance costs"; (c) "interest income"; (d) unrealized gains (losses) on changes in fair value of derivative instruments, net, except for foreign currency remeasurement hedging activities, which are included in segment income; (e) impairment of goodwill; (f) gain or loss on extinguishment of debt; (g) noncontrolling interests' share; (h) adjustments to reconcile our proportional share of "Segment income" from non-consolidated affiliates to income as determined on the equity method of accounting; (i) "restructuring and impairment, net"; (j) gains or losses on disposals of property, plant and equipment and businesses, net; (k) other costs, net; (l) litigation settlement, net of insurance recoveries; (m) sale transaction fees; (n) provision or benefit for taxes on income (loss) and (o) cumulative effect of accounting changes, net of tax. The financial information for our segments includes the results of our affiliates on a proportionately consolidated basis, which is consistent with the way we manage our business segments. See Note 8 — Consolidation and Note 9 — Investment in and Advances to Non-Consolidated Affiliates and Related Party Transactions for further information about these affiliates. Our presentation of "Segment income" on a consolidated basis is a non-GAAP financial measure. See "Non-GAAP Financial Measures" below for additional discussion about our use of "Total segment income."

The tables below show selected segment financial information (in millions, except shipments which are in kt). For additional financial information related to our operating segments, see Note 21 — Segment, Geographical Area, Major Customer and Major Supplier Information. In order to reconcile the financial information for the segments shown in the tables below to the relevant U.S. GAAP-based measures, "Eliminations and other" must adjust for proportional consolidation of each line item, and eliminate intersegment shipments (in kt) and intersegment "Net sales."

Selected Operating Results Year Ended March 31, 2017	North America	Europe	Asia	South America	Eliminations and other	Total
Net sales	\$ 3,228	\$ 2,968	\$ 1,791	\$ 1,510	\$ 94	\$ 9,591
Shipments						
Rolled products - third party	1,009	927	682	449	—	3,067
Rolled products - intersegment	1	16	8	25	(50)	—
Total rolled products	1,010	943	690	474	(50)	3,067
Non-rolled products	4	8	9	88	—	109
Total shipments	1,014	951	699	562	(50)	3,176

Selected Operating Results Year Ended March 31, 2016	North America	Europe	Asia	South America	Eliminations and other	Total
Net sales	\$ 3,266	\$ 3,223	\$ 1,992	\$ 1,575	\$ (184)	\$ 9,872
Shipments						
Rolled products - third party	1,031	918	718	456	—	3,123
Rolled products - intersegment	1	60	42	34	(137)	—
Total rolled products	1,032	978	760	490	(137)	3,123
Non-rolled products	17	98	10	79	(2)	202
Total shipments	1,049	1,076	770	569	(139)	3,325

The following table reconciles changes in “Segment income” for the year ended March 31, 2016 to the year ended March 31, 2017 (in millions).

Changes in Segment income	North America	Europe	Asia	South America	Eliminations (A)	Total
Segment income - Year Ended March 31, 2016	\$ 258	\$ 116	\$ 135	\$ 282	\$ —	\$ 791
Volume	(22)	(34)	(36)	(18)	74	(36)
Conversion premium and product mix	(2)	12	(10)	18	—	18
Conversion costs (B)	84	40	50	13	(75)	112
Metal price lag (C)	84	59	(1)	(1)	—	141
Foreign exchange	(4)	4	11	52	—	63
Primary operations	—	—	—	(1)	—	(1)
Selling, general & administrative and research & development costs (D)	(5)	(11)	—	(7)	(2)	(25)
Other changes	(9)	(6)	4	2	—	(9)
Segment income - Year Ended March 31, 2017	<u>\$ 384</u>	<u>\$ 180</u>	<u>\$ 153</u>	<u>\$ 340</u>	<u>\$ (3)</u>	<u>\$ 1,054</u>

- (A) The recognition of "Segment income" by a region on an intersegment shipment could occur in a period prior to the recognition of "Segment income" on a consolidated basis, depending on the timing of when the inventory is sold to the third party customer. The "Eliminations" column adjusts regional "Segment income" for intersegment shipments that occur in a period prior to recognition of "Segment income" on a consolidated basis. The "Eliminations" column also reflects adjustments for changes in regional volume, conversion premium and product mix, and conversion costs related to intersegment shipments for consolidation.
- (B) Conversion costs include expenses incurred in production such as direct and indirect labor, energy, freight, scrap usage, alloys and hardeners, coatings, alumina, melt loss, the benefit of utilizing scrap and other metal costs. Fluctuations in this component reflect cost efficiencies (inefficiencies) during the period as well as cost (inflation) deflation.
- (C) Metal price lag impacts on year over year comparisons were primarily driven by local market premium price volatility. The derivative market for local market premiums is not robust or efficient enough for us to offset the impacts of LMP price movements beyond a very small volume.
- (D) Selling, general & administrative costs and research & development costs include costs incurred directly by each segment and all corporate related costs, which are allocated to each of our segments.

North America

“Net sales” decreased \$38 million, or 1%, primarily due to lower can shipments partially offset by higher automotive shipments and higher average aluminum prices as we continue to adjust our product mix.

“Segment income” was \$384 million, an increase of 49%, due to strong operational performance resulting from lower metal input and conversion costs, favorable metal price lag due to reduced local market premium volatility, operational efficiencies and higher automotive shipments. These positive factors were partially offset by lower volumes associated with can and specialties shipments and higher fixed costs related to the commissioning of our third automotive line.

Europe

“Net sales” decreased \$255 million, or 8%, primarily due to lower can and specialties shipments, partially offset by higher automotive shipments and higher average aluminum prices.

“Segment income” was \$180 million, an increase of 55%, primarily related to favorable metal price lag, lower metal input costs resulting from increased production and usage of internally manufactured sheet ingot from our new recycling facility in Nachterstedt, Germany, and favorable product mix as a result of our portfolio optimization efforts. These benefits were partially offset by reduced can and specialty volumes.

Asia

“Net sales” decreased \$201 million, or 10%, due to lower can shipments, lower can pricing, partially offset by higher average aluminum prices.

“Segment income” was \$153 million, an increase of 13%, primarily due to lower metal input costs associated with increased usage of internally manufactured sheet ingot, a decrease in the local market premium which is a cost we incur and are unable to fully pass along to some of our customers, favorable product mix within can and automotive, and foreign currency exchange rates. These factors were partially offset by lower can shipments and can pricing.

South America

“Net sales” decreased \$65 million, or 4%, due to lower can shipments partially offset by favorable pricing conditions.

“Segment income” was \$340 million, an increase of 21%, primarily due to foreign currency benefits, favorable can pricing, lower metal input costs, and operational efficiencies, which were partially offset by lower can shipments.

Reconciliation of segment results to “Net income (loss) attributable to our common shareholder”

Costs such as depreciation and amortization, interest expense and unrealized gains (losses) on changes in the fair value of derivatives (except for derivatives used to manage our foreign currency remeasurement activities) are not utilized by our chief operating decision maker in evaluating segment performance. The table below reconciles income from reportable segments to “Net income (loss) attributable to our common shareholder” for the years ended March 31, 2017 and 2016 (in millions).

	Year ended March 31,	
	2017	2016
North America	\$ 384	\$ 258
Europe	180	116
Asia	153	135
South America	340	282
Intersegment eliminations	(3)	—
Total segment income	1,054	791
Depreciation and amortization	(360)	(353)
Interest expense and amortization of debt issuance costs	(294)	(327)
Adjustment to eliminate proportional consolidation	(28)	(30)
Unrealized gains (losses) on change in fair value of derivative instruments, net	5	(4)
Realized gains (losses) on derivative instruments not included in segment income	5	(1)
Gain on assets held for sale	2	(13)
Loss on extinguishment of debt	(134)	—
Restructuring and impairment, net	(10)	(48)
Loss on sale of business	(27)	—
Loss on sale of fixed assets	(6)	(4)
Other costs, net	(10)	(3)
Income before income taxes	197	8
Income tax provision	151	46
Net income (loss)	46	(38)
Net income attributable to noncontrolling interests	1	—
Net income (loss) attributable to our common shareholder	\$ 45	\$ (38)

“Adjustment to eliminate proportional consolidation” relates to depreciation and amortization and income taxes at our Aluminium Norf GmbH (Alunorf) joint venture. Income taxes and depreciation and amortization related to our equity method investments are reflected in the carrying value of the investment and not in our consolidated “Income tax provision” or “Depreciation and amortization.”

“Realized gains (losses) on derivative instruments not included in segment income” represents realized gains and (losses) on foreign currency derivatives related to asset sales, capital expenditures and net investment.

"Other costs, net" related primarily to losses on certain indirect tax expenses in Brazil, partially offset by interest income.

Year Ended March 31, 2016 Compared with the Year Ended March 31, 2015

"Net sales" were \$9.9 billion, a decrease of 11% driven by a 16% decrease in average base aluminum prices, and a 58% decrease in local market premiums. This decline in base aluminum prices more than offset a 73 kt increase in flat rolled products shipments to a record level for a fiscal year of 3,123 kt, and a favorable impact from our strategic shift to higher conversion premium products.

"Cost of goods sold (exclusive of depreciation and amortization)" was \$8.7 billion, a decrease of 11% due to lower weighted average metal costs, partially offset by an increase in flat rolled products shipments and higher costs related to our strategic expansion projects. Total metal input costs included in "Cost of goods sold (exclusive of depreciation and amortization)" decreased \$1.1 billion.

"Income before income taxes" for the year ended March 31, 2016 was \$8 million compared to \$162 million in the year ended March 31, 2015. In addition to the factors noted above, the following items affected "Income before income taxes:"

- Sharp declines in local market premiums in the current period compared to prior year, which we are unable to hedge economically, resulted in significant unfavorable metal price lag of \$172 million.
- "Selling, general and administrative expenses" decreased \$20 million primarily due to tighter cost control in the current year and lower long-term incentive plan costs;
- "Restructuring and impairment, net" of \$48 million for the year ended March 31, 2016, includes \$21 million of charges related to the impairment of certain capitalized software assets, \$14 million of severance and other charges related to restructuring actions at our global headquarters and \$10 million of severance and other charges across our regions. Additionally, there were \$3 million of impairment charges related to certain non-core assets in North America, South America, and Asia. In the prior year, we incurred \$37 million, primarily related to \$28 million of charges related to ceasing operations of the Ouro Preto smelter in South America, \$7 million of severance, contract termination and other restructuring charges in North America, Europe and South America related to past restructuring actions, and \$2 million of impairment charges related to certain non-core assets in North America. (See Note 2 — Restructuring and impairment to our accompanying consolidated financial statements for further details on restructuring activities);
- "Gain on assets held for sale, net" for the year ended March 31, 2015 includes \$23 million from the sale of our share of the joint venture of the Consorcio Candonga joint venture in Brazil, \$7 million from the sale of our consumer foil operations in North America and \$6 million from property and mining rights sales in South America partially offset by a \$14 million loss on the sale of certain hydroelectric assets in South America;
- "Loss on extinguishment of debt" includes a \$13 million loss on the partial extinguishment of our Term Loan Facility, which was amended during the first quarter of fiscal 2016; and
- Foreign currency remeasurement losses primarily due to volatility in European currency markets that resulted in a \$27 million loss in fiscal 2015.

For the year ended March 31, 2016, we recognized \$46 million of tax expense as a result of the net impact of statutory tax expense, losses in jurisdictions where we believe it is more likely than not that we will not be able to utilize those losses, and the net impact of foreign exchange movement. For the year ended March 31, 2015, we recognized \$14 million in tax expense primarily due to losses in jurisdictions where we believe it is more likely than not that we will not be able to utilize those losses, partially offset by favorable foreign exchange movement.

We reported "Net loss attributable to our common shareholder" of \$38 million for the year ended March 31, 2016 as compared to "Net income attributable to our common shareholder" of \$148 million for the year ended March 31, 2015, primarily as a result of the factors discussed above.

Segment Review

Due in part to the regional nature of supply and demand of aluminum rolled products and in order to best serve our customers, we manage our activities on the basis of geographical regions and are organized under four operating segments: North America, Europe, Asia and South America.

We measure the profitability and financial performance of our operating segments based on "Segment income." We define "Segment income" as earnings before (a) "depreciation and amortization"; (b) "interest expense and amortization of debt issuance costs"; (c) "interest income"; (d) unrealized gains (losses) on changes in fair value of derivative instruments, net, except for foreign currency remeasurement hedging activities, which are included in segment income; (e) impairment of goodwill; (f) gain or loss on extinguishment of debt; (g) noncontrolling interests' share; (h) adjustments to reconcile our proportional share of "Segment income" from non-consolidated affiliates to income as determined on the equity method of accounting; (i) "restructuring and impairment, net"; (j) gains or losses on disposals of property, plant and equipment and businesses, net; (k) other costs, net; (l) litigation settlement, net of insurance recoveries; (m) sale transaction fees; (n) provision or benefit for taxes on income (loss) and (o) cumulative effect of accounting changes, net of tax. The financial information for our segments includes the results of our affiliates on a proportionately consolidated basis, which is consistent with the way we manage our business segments. See Note 8 — Consolidation and Note 9 — Investment in and Advances to Non-Consolidated Affiliates and Related Party Transactions for further information about these affiliates. Our presentation of "Segment income" on a consolidated basis is a non-GAAP financial measure. See "Non-GAAP Financial Measures" below for additional discussion about our use of "Total Segment income."

The tables below show selected segment financial information (in millions, except shipments which are in kt). For additional financial information related to our operating segments, see Note 21 — Segment, Geographical Area, Major Customer and Major Supplier Information. In order to reconcile the financial information for the segments shown in the tables below to the relevant U.S. GAAP-based measures, "Eliminations and other" must adjust for proportional consolidation of each line item, and eliminate intersegment shipments (in kt) and intersegment "Net sales."

Selected Operating Results Year Ended March 31, 2016	North America	Europe	Asia	South America	Eliminations and other	Total
Net sales	\$ 3,266	\$ 3,223	\$ 1,992	\$ 1,575	\$ (184)	\$ 9,872
Shipments						
Rolled products - third party	1,031	918	718	456	—	3,123
Rolled products - intersegment	1	60	42	34	(137)	—
Total rolled products	1,032	978	760	490	(137)	3,123
Non-rolled products	17	98	10	79	(2)	202
Total shipments	1,049	1,076	770	569	(139)	3,325

Selected Operating Results Year Ended March 31, 2015	North America	Europe	Asia	South America	Eliminations and other	Total
Net sales	\$ 3,483	\$ 3,783	\$ 2,340	\$ 1,850	\$ (309)	\$ 11,147
Shipments						
Rolled products - third party	1,002	889	701	458	—	3,050
Rolled products - intersegment	5	49	67	32	(153)	—
Total rolled products	1,007	938	768	490	(153)	3,050
Non-rolled products	23	215	2	93	(9)	324
Total shipments	1,030	1,153	770	583	(162)	3,374

The following table reconciles changes in "Segment income" for the year ended March 31, 2015 to the year ended March 31, 2016 (in millions).

Changes in Segment income	North America (A)	Europe	Asia	South America	Eliminations (B)	Total
Segment income - Year Ended March 31, 2015	\$ 273	\$ 250	\$ 141	\$ 240	\$ (2)	\$ 902
Volume	21	47	(5)	—	2	65
Conversion premium and product mix	74	19	9	25	(17)	110
Conversion costs (C)	(13)	(111)	22	(24)	17	(109)
Metal price lag	(79)	(77)	(21)	(1)	—	(178)
Foreign exchange	1	(32)	(11)	64	—	22
Primary operations	—	—	—	(14)	—	(14)
Selling, general & administrative and research & development costs (D)	(14)	11	—	(5)	—	(8)
Other changes	(5)	9	—	(3)	—	1
Segment income - Year Ended March 31, 2016	\$ 258	\$ 116	\$ 135	\$ 282	\$ —	\$ 791

(A) Included in the North America "Segment income" for the year ended March 31, 2016 were the operating results of our consumer foil operations in North America that we sold on June 30, 2014. The change to "Segment income" attributable to these operations for the year ended March 31, 2016 compared to the prior year was unfavorable by \$1 million. The following table reconciles changes in "Segment income" for the year ended March 31, 2015 to the year ended March 31, 2016 (in millions), with the impact of the consumer foil operations separately identified.

Changes in Segment income	North America	Total
Segment income - Year Ended March 31, 2015	\$ 273	\$ 902
Volume	25	69
Conversion premium and product mix	84	120
Conversion costs	(24)	(120)
Metal price lag	(79)	(178)
Foreign exchange	1	22
Primary metal production	—	(14)
Selling, general & administrative and research & development costs	(16)	(10)
Other changes	(5)	1
Net impact of North America consumer foil operations sold in fiscal 2015	(1)	(1)
Segment income - Year Ended March 31, 2016	\$ 258	\$ 791

- (B) The recognition of "Segment income" by a region on an intersegment shipment could occur in a period prior to the recognition of "Segment income" on a consolidated basis, depending on the timing of when the inventory is sold to the third party customer. The "Eliminations" column adjusts regional "Segment income" for intersegment shipments that occur in a period prior to recognition of "Segment income" on a consolidated basis. The "Eliminations" column also reflects adjustments for changes in regional volume, conversion premium and product mix, and conversion costs related to intersegment shipments for consolidation.
- (C) Conversion costs include expenses incurred in production such as direct and indirect labor, energy, freight, scrap usage, alloys and hardeners, coatings, alumina, melt loss, the benefit of utilizing scrap and other metal costs. Fluctuations in this component reflect cost efficiencies (inefficiencies) during the period as well as cost (inflation) deflation.
- (D) Selling, general & administrative costs and research & development costs include costs incurred directly by each segment and all corporate related costs, which are allocated to each of our segments.

North America

"Net sales" decreased \$217 million, or 6%, reflecting lower average base aluminum prices, lower local market premiums and a decrease in can and specialty shipments, partially offset by higher automotive shipments. As a result of our continued ramp-up of our new automotive lines in the region and commissioning of our third automotive line during the fourth quarter of fiscal 2016, along with higher demand in the automotive sector, we expect to see positive year over year automotive shipment growth during the next fiscal year.

"Segment income" was \$258 million, a decrease of 5%, reflecting significant unfavorable metal price lag of \$79 million, higher fixed, variable, and selling, general, and administrative costs associated with the commissioning and support of our new automotive capacity. Partially offsetting these was a significant increase in automotive shipments, which then doubled, as a result of our strategic product portfolio shift to higher premium products and higher conversion premiums from the related product mix shift. Fiscal 2016 was also favorably impacted by strong production whereas in December 2014 we experienced an unscheduled outage at the hot mill in the Logan Aluminum joint venture facility that significantly reduced "Segment income" during the fourth quarter of fiscal 2015.

Europe

"Net sales" decreased \$560 million, or 15%, reflecting lower average base aluminum prices, lower local market premiums, and a decrease in specialty and non-flat rolled products shipments, partially offset by higher can and automotive shipments. Shipments in fiscal 2016 were at record levels. As a result of the commissioning of our second automotive line Nachterstedt, Germany during the fourth quarter of fiscal 2016, along with higher demand in the automotive sector, we expect to see positive year over year automotive shipment growth during the next fiscal year.

"Segment income" was \$116 million, a decrease of 54%, reflecting significant unfavorable metal price lag of \$77 million, unfavorable changes in foreign currency rates, and higher fixed costs associated with increased employment costs, and the ramp-up of our new recycling facility in Nachterstedt, Germany, as well as less favorable metal input costs. Partially offsetting these were favorable higher conversion premiums from the related product mix shift. Fiscal 2016 was also favorably impacted by strong production whereas in fiscal 2015 we experienced an unscheduled outage in a hot mill motor at one of our facilities in Europe leading to reduced "Segment income."

Asia

"Net sales" decreased \$348 million, or 15%, reflecting lower average aluminum prices and lower shipments of our specialties products due to increased competition, partially offset by higher can and automotive shipments. The increase in our can volumes was driven by shipments to customers in the Middle East. Intersegment shipments of specialty products declined which was partially offset by an increase of intersegment shipments of automotive products to Novelis Europe and Novelis North America. A portion of the increase in demand for our automotive products was driven by customers in China.

"Segment income" was \$135 million, a decrease of 4%, reflecting unfavorable metal price lag of \$21 million, an unfavorable impact from changes in foreign currency rates, partially offset by lower metal input costs associated with a decrease in the local market premium which is a cost we incur and are unable to fully pass along to some of our customers, and a favorable shift in product mix towards automotive that more than offset some can and specialty pricing pressures. We continue to experience pricing pressures and competition within the region.

South America

"Net sales" decreased \$275 million, or 15%, reflecting lower average aluminum prices as well as lower specialty and non-flat rolled products shipments, partially offset by higher can shipments. Shipments in fiscal 2016 were at record levels. Despite slowing economic conditions and political unrest in Brazil, can shipments were strong; however, shipments of specialty products decreased.

"Segment income" was \$282 million, an increase of 18%, reflecting favorable foreign currency changes, customer price adjustments resulting from inflation, and improved product mix shift towards can as demand continues to increase, partially offset by higher utility and employment costs, and an impact related to the closure of our smelting operations in fiscal 2015.

Reconciliation of segment results to “Net (loss) income attributable to our common shareholder”

Costs such as depreciation and amortization, interest expense and unrealized gains (losses) on changes in the fair value of derivatives (except for derivatives used to manage our foreign currency remeasurement activities) are not utilized by our chief operating decision maker in evaluating segment performance. The table below reconciles income from reportable segments to “Net (loss) income attributable to our common shareholder” for the years ended March 31, 2016 and 2015 (in millions).

	Year ended March 31,	
	2016	2015
North America	\$ 258	\$ 273
Europe	116	250
Asia	135	141
South America	282	240
Intersegment eliminations	—	(2)
Total segment income	791	902
Depreciation and amortization	(353)	(352)
Interest expense and amortization of debt issuance costs	(327)	(326)
Adjustment to eliminate proportional consolidation	(30)	(33)
Unrealized losses on change in fair value of derivative instruments, net	(4)	—
Realized (losses) gains on derivative instruments not included in segment income	(1)	(6)
Restructuring and impairment, net	(48)	(37)
Gain on assets held for sale	—	22
Loss on extinguishment of debt	(13)	—
Loss on sale of fixed assets	(4)	(5)
Other costs, net	(3)	(3)
Income before income taxes	8	162
Income tax provision	46	14
Net (loss) income	(38)	148
Net income attributable to noncontrolling interests	—	—
Net (loss) income attributable to our common shareholder	\$ (38)	\$ 148

“Adjustment to eliminate proportional consolidation” relates to depreciation and amortization and income taxes at our Aluminium Norf GmbH (Alunorf) joint venture. Income taxes and depreciation and amortization related to our equity method investments are reflected in the carrying value of the investment and not in our consolidated “Income tax provision” or “Depreciation and amortization.”

“Realized (losses) gains on derivative instruments not included in segment income” represents realized gains on foreign currency derivatives related to asset sales, capital expenditures and net investment.

“Other costs, net” related primarily to losses on certain indirect tax expenses in Brazil, partially offset by interest income.

Liquidity and Capital Resources

Our significant investments in the business were funded through cash flows generated by our operations and a combination of local financing and our senior secured credit facilities. Most of our expansion projects are currently ramping up operations and will generate additional operating cash flows. We expect to be able to fund our continued expansions, service our debt obligations, and provide sufficient liquidity to operate our business through one or more of the following: the generation of operating cash flows; our existing debt facilities, including refinancing; and new debt issuances, as necessary.

Debt Refinancing

In January 2017, we entered into a new Term Loan Credit Agreement. The Agreement provided Novelis with \$1.8 billion, and the proceeds were used to extinguish the existing Term Loan agreement originally maturing on June 2, 2022 and fund related transaction expenses. The Term Loan Credit Agreement matures on June 2, 2022, subject to 0.25% quarterly amortization payments. The Term Loan Credit Agreement also requires customary mandatory prepayments with excess cash flow, asset sale and condemnation proceeds and proceeds of prohibited indebtedness, all subject to customary exceptions. The Term Loan may be prepaid, in full or in part, at any time at the Company's election without penalty or premium; provided that any optional prepayment in connection with a repricing amendment or refinancing through the issuance of lower priced debt made within six-months after the earlier of (i) completion of the initial syndication of the Term Loan and (ii) April 13, 2017, will be subject to a 1.00% prepayment premium. The Term Loan Credit Agreement allows for additional term loans to be issued in an amount not to exceed \$300 million (or its equivalent in other currencies) if, after giving effect to such incurrence on a pro forma basis, the senior secured net leverage ratio does not exceed 3.50 to 1.00, plus an unlimited amount if, after giving effect to such incurrence on a pro forma basis, the senior secured net leverage ratio does not exceed 3.00 to 1.00. The lenders under the Term Loan Credit Agreement have not committed to provide any such additional term loans.

On August 15, 2016, we commenced a cash tender offer to purchase any and all of our \$1.1 billion aggregate principal amount of outstanding 8.375% Senior Notes due 2017 (the 2017 Notes). Approximately \$636 million of the \$1.1 billion outstanding 2017 Notes, which represents approximately 58% of the outstanding 2017 Notes, were tendered in the tender offer. On August 29, 2016, Novelis Corporation, an indirect wholly-owned subsidiary of Novelis Inc., issued and sold \$1.15 billion principal amount of the 2024 Notes. Using proceeds from the sales of the 2024 Notes, we paid approximately \$660 million to purchase the 2017 Notes tendered in the tender offer. Also on August 29, 2016, we irrevocably deposited with the trustee for the 2017 Notes funds sufficient to fund the redemption of the remaining outstanding 2017 Notes that were not tendered in the tender offer, which included payment of accrued and unpaid interest through, but not including, the December 15, 2016 redemption date. As a result, we were released from our obligations under the 2017 Notes and the indenture governing the 2017 Notes pursuant to the satisfaction and discharge provisions thereunder.

On September 7, 2016, we commenced a cash tender offer to purchase any and all of our \$1.4 billion aggregate principal amount of 8.75% Senior Notes due 2020 (the 2020 Notes). Approximately \$1.1 billion of the \$1.4 billion outstanding 2020 Notes, which represented approximately 79% of the outstanding 2020 Notes, were tendered in the tender offer. On September 16, 2016, Novelis Corporation issued and sold \$1.5 billion principal amount of 2026 Notes. Using proceeds from the sale of the 2026 Notes, we paid approximately \$1.2 billion to purchase the 2020 Notes tendered in the tender offer. Also on September 16, 2016, we irrevocably deposited with the trustee for the 2020 Notes funds sufficient to fund the redemption of the remaining outstanding 2020 Notes that were not tendered in the tender offer, which included payment of accrued and unpaid interest through the October 14, 2016 redemption date. As a result, we were released from our obligations under the 2020 Notes and the indenture governing the 2020 Notes pursuant to the satisfaction and discharge provisions thereunder.

See the "Highlights" section for details regarding the anticipated interest savings due to the new issuances.

The 2024 and 2026 Notes issued by Novelis Corporation as part of the refinancing transactions are fully and unconditionally guaranteed, jointly and severally, on a senior unsecured basis, by Novelis Inc. and all of Novelis Inc.'s existing and future Canadian and U.S. restricted subsidiaries (other than Novelis Corporation), certain of its existing foreign restricted subsidiaries and other restricted subsidiaries that guarantee debt in the future under any credit facilities, subject to certain exceptions. The 2024 Notes and the 2026 Notes contain customer covenants and events of default. See Note 7 — Debt - Senior Notes to our accompanying consolidated financial statements for additional information. In addition, pursuant to the indentures governing the 2024 and 2026 Notes, the Company is required to provide the following financial information regarding its subsidiaries:

As of March 31, 2017, the Company's subsidiaries that are not guarantors represented the following approximate percentages of (a) net sales, (b) Adjusted EBITDA, and (c) total assets of the Company, on a consolidated basis (including intercompany balances):

Item Description	Ratio
Consolidated net sales represented by net sales to third parties by non-guarantor subsidiaries (for the year ended March 31, 2017)	20%
Consolidated Adjusted EBITDA represented by non-guarantor subsidiaries (for the year ended March 31, 2017)	16%
Consolidated assets are owned by non-guarantor subsidiaries (as of March 31, 2017)	17%

In addition, for the years ended March 31, 2017 and March 31, 2016, the Company's subsidiaries that are not guarantors had net sales of \$2.2 billion and \$2.4 billion, respectively, and, as of March 31, 2017, those subsidiaries had assets of \$2.0 billion and debt and other liabilities of \$1.3 billion (including inter-company balances).

Available Liquidity

Our available liquidity as of March 31, 2017 and 2016 is as follows (in millions):

	March 31,	
	2017	2016
Cash and cash equivalents	\$ 594	\$ 556
Availability under committed credit facilities	701	640
Total liquidity	\$ 1,295	\$ 1,196

We reported available liquidity of \$1,295 million as of March 31, 2017, which represents an increase compared to \$1,196 million reported as of March 31, 2016. The increase is primarily attributable positive free cash flow of \$361 million, net proceeds under our debt instruments of \$86 million, an increase in the ABL borrowing base of \$42 million and other increases of \$1 million; partially offset by the extinguishment of the \$200 million Subordinated Lien Revolver and debt issuance costs of \$191 million. As of March 31, 2017, our availability under committed credit facilities of \$701 million was comprised of \$448 million under our ABL Revolver and \$253 million under our Korea, China, and Middle East loan facilities.

The "Cash and cash equivalents" balance above includes cash held in foreign countries in which we operate. As of March 31, 2017, we held \$2 million of "Cash and cash equivalents" in Canada, in which we are incorporated, with the rest held in other countries in which we operate. As of March 31, 2017, we held \$276 million of cash in jurisdictions for which we have asserted that earnings are permanently reinvested and we plan to continue to fund operations and local expansions with cash held in those jurisdictions. Our significant future uses of cash include servicing our debt obligations domestically, which we plan to fund with cash flows from operating activities and, if necessary, by repatriating cash from jurisdictions for which we have not asserted that earnings are indefinitely reinvested. Cash held outside of Canada is free from significant restrictions that would prevent the cash from being accessed to meet the Company's liquidity needs including, if necessary, to fund operations and service debt obligations in Canada. Upon the repatriation of any earnings to Canada, in the form of dividends or otherwise, we could be subject to Canadian income taxes (subject to adjustment for foreign taxes paid and the utilization of the large cumulative net operating losses we have in Canada) and withholding taxes payable to the various foreign jurisdictions. As of March 31, 2017, we do not believe adverse tax consequences exist that restrict our use of "Cash or cash equivalents" in a material manner.

Free Cash Flow

We define “Free cash flow” (which is a non-GAAP measure) as: (a) “net cash provided by (used in) operating activities,” (b) plus “net cash provided by (used in) investing activities” and (c) less “net proceeds from sales of assets, net of transaction fees and hedging.” Management believes “Free cash flow” is relevant to investors as it provides a measure of the cash generated internally that is available for debt service and other value creation opportunities. However, “Free cash flow” does not necessarily represent cash available for discretionary activities, as certain debt service obligations must be funded out of “Free cash flow.” Our method of calculating “Free cash flow” may not be consistent with that of other companies.

The following table shows the “Free cash flow” for the year ended March 31, 2017, 2016 and 2015, the change between periods, as well as the ending balances of cash and cash equivalents (in millions).

	Year Ended March 31,			Change	
				2017 versus 2016	2016 versus 2015
	2017	2016	2015	2016	2015
Net cash provided by operating activities	\$ 575	\$ 541	\$ 604	\$ 34	\$ (63)
Net cash used in investing activities	(212)	(378)	(416)	166	38
Less: Proceeds from sales of assets and business, net of transactions fees and hedging	(2)	(3)	(117)	1	114
Free cash flow	\$ 361	\$ 160	\$ 71	\$ 201	\$ 89
Ending cash and cash equivalents	\$ 594	\$ 556	\$ 628	\$ 38	\$ (72)

“Free cash flow” was \$361 million in fiscal 2017, an increase of \$201 million as compared to fiscal 2016. “Free cash flow” was positive \$160 million in fiscal 2016, an increase of \$89 million as compared to fiscal 2015. The changes in “Free cash flow” are described in greater detail below.

Operating Activities

Net cash provided by operating activities was \$575 million for the year ended March 31, 2017, which compares favorably to \$541 million in the year ended March 31, 2016. The increase in net cash provided by operating activities was primarily related to higher “Segment income”, driven by favorable impacts from metal price lag and lower metal input costs. The following summarizes changes in working capital accounts (in millions).

	Year Ended March 31,			Change	
				2017 versus 2016	2016 versus 2015
	2017	2016	2015	2016	2015
Net cash provided by (used in) operating activities due to changes in working capital:					
Accounts receivable	\$ (154)	\$ 336	\$ (54)	\$ (490)	\$ 390
Inventories	(193)	268	(390)	(461)	658
Accounts payable	253	(327)	578	580	(905)
Other current assets and liabilities	19	(5)	39	24	(44)
Net change in working capital	\$ (75)	\$ 272	\$ 173	\$ (347)	\$ 99

Year Ended March 31, 2017

"Accounts receivable, net" increased due to the timing of cash collections on certain customer receivables balances offset by 3% lower sales and higher factoring balances. As of March 31, 2017 and 2016, we had factored, without recourse, certain trade receivable aggregating \$679 million and \$626 million, respectively, which had a favorable impact to net cash provided by operating activities of \$53 million for the year ended March 31, 2017. We determine the need to factor our receivables based on local cash needs including the need to fund our strategic investments, as well as attempting to balance the timing of cash flows of trade payables and receivables. "Inventories" were higher due to higher quantities on hand partially offset by lower average metal costs. The higher quantities of inventory on hand at March 31, 2017 is the result of recent capacity expansions as well as longer supply chains to support the automotive sector and expand our scrap procurement network. As of March 31, 2017, we had sold certain inventories to third parties and have agreed to repurchase the same or similar inventory back from the third parties subsequent to March 31, 2017. Our estimated repurchase obligation for this inventory as of March 31, 2017 is \$12 million, based on market prices as of this date. We sell and repurchase inventory with third parties in an attempt to better manage inventory levels and to better match the purchasing of inventory with the demand for our products. We experienced an increase in "Accounts payable" primarily due to the timing of payments to vendors.

Included in cash flows from operating activities for the year ended March 31, 2017 were \$288 million of interest payments, \$128 million of cash paid for income taxes, \$13 million of payments on restructuring programs, and \$66 million of contributions to our pension plans. As of March 31, 2017, we had \$24 million of outstanding restructuring liabilities, of which \$16 million we estimate will result in cash outflows within the next twelve months.

Year Ended March 31, 2016

We experienced a decrease in "Accounts receivable, net" due to lower base aluminum prices and local market premiums compared to the end of the fourth quarter of prior year, and the timing of cash collections on certain customer receivables balances; partially offset by higher shipments and higher factoring of accounts receivable. As of March 31, 2016 and 2015, we had factored, without recourse, certain trade receivable aggregating \$626 million and \$591 million, respectively, which had a favorable impact to net cash provided by operating activities of \$35 million for the year ended March 31, 2016. We determine the need to factor our receivables based on local cash needs including the need to fund our strategic investments, as well as attempting to balance the timing of cash flows of trade payables and receivables. "Inventories" were lower due to lower base aluminum prices and local market premiums when compared to the fourth quarter of fiscal 2015. As of March 31, 2016, we had sold certain inventories to third parties and have agreed to repurchase the same or similar inventory back from the third parties subsequent to March 31, 2016. Our estimated repurchase obligation for this inventory as of March 31, 2016 is \$22 million, based on market prices as of this date. We sell and repurchase inventory with third parties in an attempt to better manage inventory levels and to better match the purchasing of inventory with the demand for our products. We experienced a decrease in "Accounts payable" due to lower base aluminum prices and lower local market premiums when compared to the end of the fourth quarter of fiscal 2015, partially offset by the timing of payments on vendor payables outstanding as of March 31, 2016 and obtaining longer payment terms with certain vendors.

Included in cash flows from operating activities for the year ended March 31, 2016 were \$308 million of interest payments, \$123 million of cash paid for income taxes, \$22 million of payments on restructuring programs, and \$64 million of contributions to our pension plans. As of March 31, 2016, we had \$27 million of outstanding restructuring liabilities, of which \$23 million we estimate will result in cash outflows within the next twelve months.

Year Ended March 31, 2015

We experienced an increase in "Accounts receivable, net" due to an increase in shipments, as well as higher base aluminum prices and local market premiums compared to the end of the fourth quarter of fiscal 2014, partially offset by higher factoring of accounts receivable. As of March 31, 2015 and March 31, 2014, we had factored, without recourse, certain trade receivable aggregating \$591 million and \$245 million, respectively, which had a favorable impact to net cash provided by operating activities of \$346 million for the year ended March 31, 2015. "Inventories" were higher due to an increase in quantities on hand, as well as higher base aluminum prices and local market premiums when compared to the fourth quarter of fiscal 2014. The higher quantities of inventory on hand at March 31, 2015 is the result of capacity expansions, as well as longer supply chains to support the automotive sector and expand our scrap procurement network. As of March 31, 2015, we had sold certain inventories to third parties and have agreed to repurchase the same or similar inventory back from the third parties subsequent to March 31, 2015. Our estimated repurchase obligation for this inventory as of March 31, 2015 is \$218 million, based on market prices as of this date. We experienced an increase in "Accounts payable" due to higher purchases of inventory, higher base aluminum prices and higher local market premiums when compared to the end of the fourth quarter of fiscal 2014, the timing of payments on vendor payables outstanding as of March 31, 2015, and obtaining longer payment terms with certain vendors.

Included in cash flows from operating activities for the year ended March 31, 2015 were \$303 million of interest payments, \$131 million of cash paid for income taxes, \$32 million of payments on restructuring programs, and \$59 million of contributions to our pension plans.

Hedging Activities

We use derivative contracts to manage risk as well as liquidity. Under our terms of credit with counterparties to our derivative contracts, we do not have any material margin call exposure. No material amounts have been posted by Novelis nor do we hold any material amounts of margin posted by our counterparties. We settle derivative contracts in advance of billing on the underlying physical inventory and collecting payment from our customers, which temporarily impacts our liquidity position. The lag between derivative settlement and customer collection typically ranges from 30 to 90 days.

More details on our operating activities can be found above in "Results of operations for the year ended March 31, 2017 compared with the year ended March 31, 2016."

Investing Activities

The following table presents information regarding our "Net cash used in investing activities" (in millions).

	Year Ended March 31,			Change	
	2017	2016	2015	2017 versus 2016	2016 versus 2015
				2016	2015
Capital expenditures	\$ (224)	\$ (370)	\$ (518)	\$ 146	\$ 148
Proceeds (outflows) from settlement of other undesignated derivative instruments, net	8	(9)	5	17	(14)
Proceeds from sales of assets, third party, net of transaction fees and hedging	4	3	117	1	(114)
Outflows from the sale of business, net of transaction fees	(2)	—	—	(2)	—
Proceeds (outflows) from investment in and advances to non-consolidated affiliates, net	2	(2)	(20)	4	18
Net cash used in investing activities	\$ (212)	\$ (378)	\$ (416)	\$ 166	\$ 38

We had \$224 million of cash outflows for "Capital expenditures" for the year ended March 31, 2017, compared to \$370 million for the year ended March 31, 2016 and \$518 million for the year ended March 31, 2015. For the year ended March 31, 2017, our "Capital expenditures" were primarily attributable to the maintenance of existing property, plant and equipment. For the year ended March 31, 2016, our "Capital expenditures" were primarily attributable to our automotive sheet finishing expansions in the U.S. and Germany. For the year ended March 31, 2015, our "Capital expenditures" were primarily attributable to our automotive sheet finishing expansions in the U.S., China and Germany, our recycling expansion in Germany, and expenditures related to our ERP implementation.

As of March 31, 2017, we had \$42 million of outstanding accounts payable and accrued liabilities related to capital expenditures in which the cash outflows will occur subsequent to March 31, 2017.

The settlement of undesignated derivative instruments resulted in cash inflow of \$8 million for the year ended March 31, 2017, and cash outflows of \$9 million and proceeds of \$5 million for the years ended 2016 and 2015, respectively. The variance in these cash flows related primarily to changes in average aluminum prices and foreign currency rates which impact gains or losses we realize on the settlement of derivatives.

The net proceeds from asset sales for the year ended March 31, 2017 were \$4 million which primarily related to the sale of fixed assets in North America and our sale of one hydroelectric power generation facility in South America. During the year ended March 31, 2016, net proceeds from the asset sales were \$3 million which primarily related to the sale of fixed assets at the Ouro Preto smelter in South America. During the year ended March 31, 2015, net proceeds from the sale of assets were \$29 million related to the sale of our consumer foil operations in North America and \$63 million for the sale of our joint venture of the Consorcio Candonga in Brazil, net of related gains on currency derivatives and transaction fees, and proceeds of \$17 million from the sale of the majority of our hydroelectric power generation operations in South America.

"Outflows from the sale of a business, net of transaction fees" is comprised of cash formerly held by ALCOM, which was a consolidated entity sold during the three months ended September 30, 2016, offset by additional proceeds of \$12 million received during the three months ended December 31, 2016. Refer to Note 14 — Other Expense (Income), Net for further details.

"Proceeds (outflows) from investments in and advances to non-consolidated affiliates, net" for the years ended March 31, 2017, 2016, and 2015 were primarily comprised of loan repayments and advances made to our non-consolidated affiliate, Alunorf, to fund capital expenditures.

Financing Activities

The following table presents information regarding our "Net cash used in financing activities" (in millions).

	Year Ended March 31,			Change	
	2017	2016	2015	2017 versus 2016	2016 versus 2015
Proceeds from issuance of long-term and short-term borrowings	\$ 4,572	\$ 174	\$ 362	\$ 4,398	\$ (188)
Principal payments of long-term and short-term borrowings	(4,477)	(216)	(324)	(4,261)	108
Revolving credit facilities and other, net	(229)	(187)	160	(42)	(347)
Return of capital to our common shareholder	—	—	(250)	—	250
Dividends, noncontrolling interest	—	(1)	(1)	1	—
Debt issuance costs	(191)	(15)	(3)	(176)	(12)
Net cash used in financing activities	\$ (325)	\$ (245)	\$ (56)	\$ (80)	\$ (189)

Year Ended March 31, 2017

During the year ended March 31, 2017, we received proceeds of \$4.5 billion related to the refinancing of the Term Loan, 2017 and 2020 Notes as well as issuances of new loans in Brazil and Vietnam, and other locations of \$81 million, \$40 million, and \$2 million, respectively. Additionally, we made principal repayments of \$1.8 billion on our Term Loan Facility related to the refinancing, \$1.1 billion and \$1.4 billion on our 2017 and 2020 Notes, respectively, \$108 million on short-term loans in Brazil, \$49 million on Vietnam principal repayments, \$17 million in Korean loan repayments, \$10 million on capital leases, and \$5 million in other principal repayments. The change in our credit facilities balance is related to net incremental repayments of \$196 million on our ABL Revolver partially offset by net proceeds of \$16 million in our China credit facilities.

As of March 31, 2017, our short-term borrowings were \$294 million consisting of \$184 million of loans under our ABL Revolver, \$50 million in Novelis Brazil loans, \$59 million in Novelis China loans, and \$1 million in other short-term borrowings. The weighted average interest rate on our total short-term borrowings was 2.92% as of March 31, 2017. As of March 31, 2017, \$20 million of the ABL Revolver was utilized for letters of credit, reducing our availability under that facility.

During the year ended March 31, 2017, we incurred costs of \$191 million related to the refinancing of our Term Loan and Senior Notes facilities.

Year Ended March 31, 2016

During the year ended March 31, 2016, we received proceeds of \$60 million related to the refinancing of the Term Loan as well as issuances of new loans in Brazil, Korea, Vietnam, and other locations of \$45 million, \$39 million, \$28 million, and \$2 million, respectively. We made principal repayments of \$134 million on short-term loans in Brazil, \$30 million on Vietnam principal repayments, \$14 million on our Term Loan Facility, \$9 million on capital leases, \$26 million on long-term loans in Korea and \$3 million in other principal repayments. The change in our credit facilities balance is related to net incremental repayments of \$227 million on our ABL Revolver partially offset by an increase in other borrowings of \$40 million.

Year Ended March 31, 2015

During the year ended March 31, 2015, we received proceeds related to the issuance of new short-term loans in Brazil, Korea, Vietnam, and other locations of \$315 million, \$27 million, \$19 million, and \$1 million, respectively. We made principal repayments of \$253 million on short-term loans in Brazil, \$30 million on Vietnam principal repayments, \$18 million on our Term Loan Facility, \$9 million on capital leases, \$7 million on long-term loans in Korea and \$7 million in other principal repayments. The change in our credit facilities balance is related to net incremental borrowings of \$124 million on our ABL Revolver and a net increase of \$29 million on our Korea facilities, and an increase in other borrowings of \$7 million. On April 30, 2014, we made a return of capital payment to our direct shareholder, AV Metals Inc., in the amount of \$250 million.

OFF-BALANCE SHEET ARRANGEMENTS

In accordance with SEC rules, the following qualify as off-balance sheet arrangements:

- any obligation under certain derivative instruments;
- any obligation under certain guarantees or contracts;
- a retained or contingent interest in assets transferred to an unconsolidated entity or similar entity or similar arrangement that serves as credit, liquidity or market risk support to that entity for such assets; and
- any obligation under a material variable interest held by the registrant in an unconsolidated entity that provides financing, liquidity, market risk or credit risk support to the registrant, or engages in leasing, hedging or research and development services with the registrant.

The following discussion addresses the applicable off-balance sheet items for our Company.

Derivative Instruments

See Note 15 — Financial Instruments and Commodity Contracts to our accompanying audited consolidated financial statements for a full description of derivative instruments.

Guarantees of Indebtedness

We have issued guarantees on behalf of certain of our subsidiaries. The indebtedness guaranteed is for trade accounts payable to third parties. Some of the guarantees have annual terms while others have no expiration and have termination notice requirements. Neither we nor any of our subsidiaries holds any assets of any third parties as collateral to offset the potential settlement of these guarantees. Since we consolidate wholly-owned and majority-owned subsidiaries in our consolidated financial statements, all liabilities associated with trade payables and short-term debt facilities for these entities are already included in our consolidated balance sheets.

We have guaranteed the indebtedness for a credit facility and loan on behalf of Alunorf. The guarantee is limited to 50% of the outstanding debt, not to exceed 6 million euros. As of March 31, 2017, there were no amounts outstanding under our guarantee with Alunorf. We have also guaranteed the payment of early retirement benefits on behalf of Alunorf. As of March 31, 2017, this guarantee totaled \$2 million.

Other Arrangements

Factoring of Trade Receivables

We factor and forfeit trade receivables (collectively, we refer to these as "factoring" programs) based on local cash needs, as well as attempting to balance the timing of cash flows of trade payables and receivables and fund other business needs. Factored invoices are not included in our consolidated balance sheets when we do not retain a financial or legal interest. If a financial or legal interest is retained, we classify these factorings as secured borrowings.

Summary of Disclosures of Factored Financial Amounts

The following tables summarize our factoring amounts (in millions).

	Year Ended March 31,		
	2017	2016	2015
Receivables factored	\$ 5,149	\$ 3,314	\$ 1,796
Factoring expense	\$ 16	\$ 19	\$ 10

	March 31,	
	2017	2016
Factored receivables outstanding	\$ 679	\$ 626

Other

As part of our ongoing business, we do not participate in transactions that generate relationships with unconsolidated entities or financial partnerships, such as entities often referred to as special purpose entities (SPEs), which would have been established for the purpose of facilitating off-balance sheet arrangements or other contractually narrow or limited purposes. As of March 31, 2017 and 2016, we were not involved in any unconsolidated SPE transactions.

CONTRACTUAL OBLIGATIONS

We have future obligations under various contracts relating to debt and interest payments, capital and operating leases, long-term purchase obligations, and postretirement benefit plans. The following table presents our estimated future payments under contractual obligations that exist as of March 31, 2017, based on undiscounted amounts (in millions). The future cash flow commitments we may have related to derivative contracts are excluded from our contractual obligations table as these are fair value measurements determined at an interim date within the contractual term of the arrangement and, accordingly, do not represent the ultimate contractual obligation (which could ultimately become a receivable). As a result, the timing and amount of the ultimate future cash flows related to our derivative contracts, including the \$164 million of derivative liabilities recorded on our balance sheet as of March 31, 2017, are uncertain. Furthermore, due to the difficulty in determining the timing of settlements, the table excludes \$36 million of uncertain tax positions. See Note 19 — Income Taxes to our accompanying audited consolidated financial statements.

	Less Than 1 Year	1-3 Years	3-5 Years	More Than 5 Years	Total
Debt (A)	\$ 406	\$ 127	\$ 39	\$ 4,355	\$ 4,927
Interest on long-term debt (B)	207	412	410	561	1,590
Capital leases (C)	9	12	—	—	21
Operating leases (D)	30	39	26	33	128
Purchase obligations (E)	2,460	1,577	1,039	297	5,373
Unfunded pension plan benefits (F)	16	29	31	88	164
Other post-employment benefits (F)	6	13	17	52	88
Funded pension plans (F)	55	127	142	427	751
Total	\$ 3,189	\$ 2,336	\$ 1,704	\$ 5,813	\$ 13,042

- (A) Includes only principal payments on our Senior Notes, term loans, revolving credit facilities and notes payable to banks and others. These amounts exclude payments under capital lease obligations.
- (B) Interest on our fixed rate debt is estimated using the stated interest rate. Interest on our variable-rate debt is estimated using the rate in effect as of March 31, 2017. Actual future interest payments may differ from these amounts based on changes in floating interest rates or other factors or events. Excluded from these amounts are interest related to capital lease obligations, the amortization of debt issuance and other costs related to indebtedness.
- (C) Includes both principal and interest components of future minimum capital lease payments. Excluded from these amounts are insurance, taxes and maintenance associated with the property.
- (D) Includes the minimum lease payments for non-cancelable leases for property and equipment used in our operations. We do not have any operating leases with contingent rents. Excluded from these amounts are insurance, taxes and maintenance associated with the properties and equipment.
- (E) Includes agreements to purchase goods (including raw materials, inventory repurchase obligations, and capital expenditures) and services that are enforceable and legally binding on us, and that specify all significant terms. Some of our raw material purchase contracts have minimum annual volume requirements. In these cases, we estimate our future purchase obligations using annual minimum volumes and costs per unit that are in effect as of March 31, 2017. Due to volatility in the cost of our raw materials, actual amounts paid in the future may differ from these amounts. Excluded from these amounts are the impact of any derivative instruments and any early contract termination fees, such as those typically present in energy contracts.
- (F) Obligations for postretirement benefit plans are estimated based on actuarial estimates using benefit assumptions for, among other factors, discount rates, rates of compensation increases and health care cost trends. Payments for unfunded pension plan benefits and other post-employment benefits are estimated through 2026. For funded pension plans, estimating the requirements beyond fiscal 2017 is not practical, as it depends on the performance of the plans' investments, among other factors.

RETURN OF CAPITAL

Payments to our shareholder are at the discretion of the board of directors and will depend on, among other things, our financial resources, cash flows generated by our business, our cash requirements, restrictions under the instruments governing our indebtedness, being in compliance with the appropriate indentures and covenants under the instruments that govern our indebtedness and other relevant factors.

In March 2014, we declared a return of capital to our direct shareholder, AV Metals Inc., in the amount of \$250 million, which we subsequently paid on April 30, 2014.

ENVIRONMENT, HEALTH AND SAFETY

We strive to be a leader in environment, health and safety (EHS). Our EHS system is aligned with ISO 14001, an international environmental management standard, and OHSAS 18001, an international occupational health and safety management standard. As of March 31, 2017 and March 31, 2016, 23 and 24 of our established manufacturing facilities worldwide were ISO 14001 certified and OHSAS 18001 certified, respectively, and all have dedicated quality improvement management systems.

Our expenditures for environmental protection (including estimated and probable environmental remediation costs as well as general environmental protection costs at our facilities) and the betterment of working conditions in our facilities were \$13 million in fiscal 2017, of which \$11 million was expensed and \$2 million capitalized. We expect these expenditures will be approximately \$17 million in fiscal 2018, of which we estimate \$10 million will be expensed and \$7 million capitalized. Generally, expenses for environmental protection are recorded in "Cost of goods sold (exclusive of depreciation and amortization)." However, significant remediation costs that are not associated with on-going operations are recorded in "Restructuring and impairment, net."

CRITICAL ACCOUNTING POLICIES AND ESTIMATES

Our discussion and analysis of our results of operations, liquidity and capital resources are based on our consolidated financial statements which have been prepared in accordance with accounting principles generally accepted in the United States (U.S. GAAP). In connection with the preparation of our consolidated financial statements, we are required to make assumptions and estimates about future events, and apply judgments that affect the reported amounts of assets, liabilities, revenue, expenses, and the related disclosures. We base our assumptions, estimates and judgments on historical experience, current trends and other factors we believe to be relevant at the time we prepare our consolidated financial statements. On a regular basis, we review the accounting policies, assumptions, estimates and judgments to ensure that our consolidated financial statements are presented fairly and in accordance with U.S. GAAP. However, because future events and their effects cannot be determined with certainty, actual results could differ from our assumptions and estimates, and such differences could be material.

Our significant accounting policies are discussed in Note 1 — Business and Summary of Significant Accounting Policies to our accompanying consolidated financial statements. We believe the following accounting policies are the most critical to aid in fully understanding and evaluating our reported financial results, as they require management to make difficult, subjective or complex judgments, and to make estimates about the effect of matters that are inherently uncertain. Although management believes that the estimates and judgments discussed herein are reasonable, actual results could differ, which could result in gains or losses that could be material. We have reviewed these critical accounting policies and related disclosures with the Audit Committee of our board of directors.

Derivative Financial Instruments

We hold derivatives for risk management purposes and not for trading. We use derivatives to mitigate uncertainty and volatility caused by underlying exposures to aluminum prices, foreign exchange rates, interest rates, and energy prices. The fair values of all derivative instruments are recognized as assets or liabilities at the balance sheet date and are reported gross.

The majority of our derivative contracts are valued using industry-standard models that use observable market inputs as their basis, such as time value, forward interest rates, volatility factors, and current (spot) and forward market prices for foreign exchange rates. See Note 15 — Financial Instruments and Commodity Contracts and Note 17 — Fair Value Measurements to our accompanying consolidated audited financial statements for discussion on fair value of derivative instruments.

We may be exposed to losses in the future if the counterparties to our derivative contracts fail to perform. We are satisfied that the risk of such non-performance is remote due to our monitoring of credit exposures. Additionally, we enter into master netting agreements with contractual provisions that allow for netting of counterparty positions in case of default, and we do not face credit contingent provisions that would result in the posting of collateral.

For derivatives designated as fair value hedges, we assess hedge effectiveness by formally evaluating the high correlation of changes in the fair value of the hedged item and the derivative hedging instrument. The changes in the fair values of the underlying hedged items are reported in other current and noncurrent assets and liabilities in the consolidated balance sheets. Changes in the fair values of these derivatives and underlying hedged items generally offset and the effective portion is recorded in "Net sales" consistent with the underlying hedged item and the net ineffectiveness is recorded in "Other (income) expense, net."

For derivatives designated as cash flow hedges or net investment hedges, we assess hedge effectiveness by formally evaluating the high correlation of the expected future cash flows of the hedged item and the derivative hedging instrument. The effective portion of gain or loss on the derivative is included in Other Comprehensive Income (Loss) and reclassified to earnings in the period in which earnings are impacted by the hedged items or in the period that the transaction becomes probable of not occurring. Gains or losses representing reclassifications of OCI to earnings are recognized in the line item most reflective of the underlying risk exposure. We exclude the time value component of foreign currency and aluminum price risk hedges when measuring and assessing ineffectiveness to align our accounting policy with risk management objectives when it is necessary. If at any time during the life of a cash flow hedge relationship we determine that the relationship is no longer effective, the derivative will no longer be designated as a cash flow hedge and future gains or losses on the derivative will be recognized in "Other (income) expense, net."

For all derivatives designated in hedging relationships, gains or losses representing hedge ineffectiveness or amounts excluded from effectiveness testing are recognized in "Other (income) expense, net" in our current period earnings. If no hedging relationship is designated, gains or losses are recognized in "Other (income) expense, net" in our current period earnings.

Consistent with the cash flows from the underlying risk exposure, we classify cash settlement amounts associated with designated derivatives as part of either operating or investing activities in the consolidated statements of cash flows. If no hedging relationship is designated, we classify cash settlement amounts as part of investing activities in the consolidated statement of cash flows.

Impairment of Goodwill

Goodwill represents the excess of the purchase price over the fair value of the identifiable net assets of acquired companies. As a result of Hindalco's indirect purchase of Novelis, we estimated fair value of the identifiable net assets using a number of factors, including the application of multiples and discounted cash flow estimates. The carrying value of goodwill for each of our reporting units, which is tested for impairment annually, is as follows (in millions):

	As of March 31, 2017	
North America	\$	285
Europe		181
South America		141
	<u>\$</u>	<u>607</u>

Goodwill is not amortized; instead, it is tested for impairment annually or more frequently if indicators of impairment exist. On an ongoing basis, absent any impairment indicators, we perform our goodwill impairment testing as of the last day of February of each fiscal year. We do not aggregate components of operating segments to arrive at our reporting units, and as such our reporting units are the same as our operating segments.

The accounting guidance provides an entity the option to first assess qualitative factors to determine whether the existence of events or circumstances leads to a determination that it is more likely than not that the estimated fair value of a reporting unit is less than its carrying amount. If an entity elects to perform a qualitative assessment and determines that an impairment is more likely than not, the entity is then required to perform the existing two-step quantitative impairment test, otherwise no further analysis is required. An entity also may elect not to perform the qualitative assessment and, instead, proceed directly to the two-step quantitative impairment test. The ultimate outcome of the goodwill impairment review for a reporting unit should be the same whether an entity chooses to perform the qualitative assessment or proceeds directly to the two-step quantitative impairment test.

For our fiscal year 2017 test, we elected to perform the two-step quantitative impairment test, where step one compares the fair value of each reporting unit to its carrying amount, and if step one indicates that the carrying value of a reporting unit exceeds the fair value, step two is performed to measure the amount of impairment, if any. For purposes of our step one analysis, our estimate of fair value for each reporting unit is based on discounted cash flows (the income approach). When available and as appropriate, we use quoted market prices/relationships (the market approach) to corroborate the estimated fair value. The approach to determining fair value for all reporting units is consistent given the similarity of our operations in each region.

Under the income approach, the fair value of each reporting unit is based on the present value of estimated future cash flows. The income approach is dependent on a number of significant management assumptions including markets and market share, sales volumes and prices, costs to produce, capital spending, working capital changes and the discount rate. We estimate future cash flows for each of our reporting units based on our projections for the respective reporting unit. These projected cash flows are discounted to the present value using a weighted average cost of capital (discount rate). The discount rate is commensurate with the risk inherent in the projected cash flows and reflects the rate of return required by an investor in the current economic conditions. For our annual impairment test, we used a discount rate of 9% for all reporting units. An increase or decrease of 0.5% in the discount rate would have impacted the estimated fair value of each reporting unit by approximately \$75-\$275 million, depending on the relative size of the reporting unit. Additionally, an increase or decrease of 0.5% in the terminal year growth rate assumption would have impacted the estimated fair value of each reporting unit by approximately \$50-\$200 million, depending on the relative size of the reporting unit. The projections are based on both past performance and the expectations of future performance and assumptions used in our current operating plan. We use specific revenue growth assumptions for each reporting unit based on history and economic conditions, and the terminal year revenue growth assumptions were approximately 2.0%.

Under the market approach, the fair value of each reporting unit is determined based upon comparisons to public companies engaged in similar businesses.

As a result of our annual goodwill impairment test for the year ended March 31, 2017, no goodwill impairment was identified. The fair values of the reporting units exceeded their respective carrying amounts as of the last day of February in fiscal 2017 by 171% for North America, by 54% for Europe and by 154% for South America.

Equity Investments

We invest in certain joint ventures and consortiums. We use the equity method to account for our investments in entities that we do not control, but where we have the ability to exercise significant influence over operating and financial policies. We exercise judgment to determine which investments should be accounted for using the equity method and which investments should be consolidated.

As a result of Hindalco's indirect purchase of Novelis, investments in and advances to equity method affiliates were adjusted to reflect fair value as of May 16, 2007. We review these investments for impairment whenever certain indicators are present suggesting that the carrying value of an investment is not recoverable. This analysis requires a significant amount of judgment to identify events or circumstances indicating that an investment may be impaired. Once an impairment indicator is identified, we must determine if an impairment exists, and if so, whether the impairment is other than temporary, in which case the investment would be written down to its estimated fair value.

Impairment of Long Lived Assets and Other Intangible Assets

We assess the recoverability of long-lived assets and finite-lived intangible assets whenever events or changes in circumstances indicate that we may not be able to recover the asset's carrying amount. Such events or circumstances include, but are not limited to, a significant decrease in the fair value of the underlying business or a change in utilization of property and equipment.

We group assets to test for impairment at the lowest level for which identifiable cash flows are largely independent of the cash flows of other groups of assets and liabilities. These levels are dependent upon an asset's usage, which may be on an individual asset level or aggregated at a higher level including a region-wide grouping. The metal flow and management of supply within our regions creates an interdependency of the plants within a region on one another to generate cash flows. Accordingly, under normal operating conditions, our assets are grouped on a region-wide basis for impairment testing. Any expected change in usage, retirement, disposal or sale of an individual asset or group of assets below the region level which would generate a separate cash flow stream outside of normal operations could result in grouping assets below the region level for impairment testing.

When evaluating long-lived assets and finite-lived intangible assets for potential impairment, we first compare the carrying value of the asset to the asset's estimated future net cash flows (undiscounted and without interest charges). If the estimated future net cash flows are less than the carrying value of the asset, we calculate and recognize an impairment loss. If we recognize an impairment loss, the carrying amount of the asset is adjusted to fair value based on the discounted estimated future net cash flows and will be its new cost basis. For a depreciable long-lived asset, the new cost basis will be depreciated over the remaining useful life of that asset. For an amortizable intangible asset, the new cost basis will be amortized over the remaining useful life of the asset.

Our impairment loss calculations require management to apply judgments in estimating future cash flows to determine asset fair values, including forecasting useful lives of the assets and selecting the discount rate that represents the risk inherent in future cash flows. Impairment charges are recorded in "Restructuring and impairment, net" in our consolidated statement of operations. For the year ended March 31, 2017, we recorded impairment charges of \$2 million of related to assets in North America. For the year ended March 31, 2016, we recorded impairment charges on long-lived assets and intangible assets of \$3 million of certain non core assets in North America, South American and Asia. Additionally, we recorded restructuring charges during the year ended March 31, 2016 of \$21 million related to the impairment of capitalized software intangible assets that would no longer be developed. For the year ended March 31, 2015, we recorded impairment charges on long-lived assets and intangible assets of \$2 million of certain non core assets in North America.

Our other intangible assets of \$457 million and \$523 million as of March 31, 2017 and March 31, 2016, respectively, consisted of trade names, technology and software, customer relationships and favorable energy and supply contracts and are amortized over an original period of 3 to 20 years. As of March 31, 2017, we do not have any other intangible assets with indefinite useful lives, other than Goodwill.

If actual results are not consistent with our assumptions and judgments used in estimating future cash flows and asset fair values, we may be exposed to additional impairment losses that could be material to our results of operations.

Pension and Other Postretirement Plans

We account for our pensions and other postretirement benefits in accordance with ASC 715, *Compensation — Retirement Benefits* (ASC 715). Liabilities and expense for pension plans and other postretirement benefits are determined using actuarial methodologies and incorporate significant assumptions, including the rate used to discount the future estimated liability, the long-term rate of return on plan assets, and several assumptions related to the employee workforce (compensation increases, health care cost trend rates, expected service period, retirement age, and mortality). These assumptions bear the risk of change as they require significant judgment and they have inherent uncertainties that management may not be able to control.

The actuarial models use an attribution approach that generally spreads the financial impact of changes to the plan and actuarial assumptions over the average remaining service lives of the employees in the plan. The principle underlying the required attribution approach is that employees render service over their average remaining service lives on a relatively smooth basis and, therefore, the accounting for benefits earned under the pension or non-pension postretirement benefits plans should follow the same relatively smooth pattern. Changes in the liability due to changes in actuarial assumptions such as discount rate, rate of compensation increases and mortality, as well as annual deviations between what was assumed and what was experienced by the plan are treated as actuarial gains or losses. The gains and losses are initially recorded to "Other comprehensive income (loss)" and are subsequently amortized over periods of 15 years or less, which represent the group's average future service life of the employees or the group's average life expectancy.

The most significant assumption used to calculate pension and other postretirement obligations is the discount rate used to determine the present value of benefits. The discount rate is based on spot rate yield curves and individual bond matching models for pension and other postretirement plans in Canada, the United States, United Kingdom, and other Euro zone countries, and on published long-term high quality corporate bond indices in other countries with adjustments made to the index rates based on the duration of the plans' obligations for each country, at the end of each fiscal year. This bond matching approach matches the bond yields with the year-to-year cash flow projections from the actuarial valuation to determine a discount rate that more accurately reflects the timing of the expected payments. The weighted average discount rate used to determine the pension benefit obligation was 3.2%, 3.3%, and 3.1%, and other postretirement benefit obligation was 4.1%, 4.0% and 3.6% as of March 31, 2017, 2016, and 2015, respectively. The weighted average discount rate used to determine the net periodic benefit cost is the rate used to determine the benefit obligation at the end of the previous fiscal year.

As of March 31, 2017, an increase in the discount rate of 0.5%, assuming inflation remains unchanged, would result in a decrease of \$144 million in the pension and other postretirement obligations and in a pre-tax decrease of \$13 million in the net periodic benefit cost in the following year. A decrease in the discount rate of 0.5% as of March 31, 2017, assuming inflation remains unchanged, would result in an increase of \$162 million in the pension and other postretirement obligations and in a pre-tax increase of \$15 million in the net periodic benefit cost in the following year.

The long term expected return on plan assets is based upon historical experience, expected future performance as well as current and projected investment portfolio diversification. The weighted average expected return on plan assets was 5.4% for 2017, 5.6% for 2016, and 6.1% for 2015. The expected return on assets is a long-term assumption whose accuracy can only be measured over a long period based on past experience. A variation in the expected return on assets of 0.5% as of March 31, 2017 would result in a pre-tax variation of approximately \$6 million in the net periodic benefit cost in the following year.

Income Taxes

We account for income taxes using the asset and liability method. Under the asset and liability method, deferred tax assets and liabilities are recognized for the estimated future tax consequences attributable to differences between the financial statement carrying amounts of existing assets and liabilities and their respective tax bases. In addition, deferred tax assets are also recorded with respect to net operating losses and other tax attribute carryforwards. Deferred tax assets and liabilities are measured using enacted tax rates in effect for the year in which those temporary differences are expected to be recovered or settled. Valuation allowances are established when realization of the benefit of deferred tax assets is not deemed to be more likely than not. The effect on deferred tax assets and liabilities of a change in tax rates is recognized in income in the period that includes the enactment date.

We considered all available evidence, both positive and negative, in determining the appropriate amount of the valuation allowance against our deferred tax assets as of March 31, 2017. In evaluating the need for a valuation allowance, we consider all potential sources of taxable income, including income available in carryback periods, future reversals of taxable temporary differences, projections of taxable income, and income from tax planning strategies, as well as any other available and relevant information. Positive evidence includes factors such as a history of profitable operations, projections of future profitability within the carryforward period and potential income from prudent and feasible tax planning strategies. Negative evidence includes items such as cumulative losses, projections of future losses, and carryforward periods that are not long enough to allow for the utilization of the deferred tax asset based on existing projections of income. In certain jurisdictions, deferred tax assets related to loss carryforwards and other temporary differences exist without a valuation allowance where in our judgment the weight of the positive evidence more than offsets the negative evidence.

Upon changes in facts and circumstances, we may conclude that certain deferred tax assets for which no valuation allowance is currently recorded may not be realizable in future periods, resulting in a charge to income. Existing valuation allowances are re-examined under the same standards of positive and negative evidence. If it is determined that it is more likely than not that a deferred tax asset will be realized, the appropriate amount of the valuation allowance, if any, is released, in the period this determination is made.

As of March 31, 2017, the Company concluded that valuation allowances totaling \$680 million were required against its deferred tax assets comprised of the following:

- \$531 million of the valuation allowance relates to loss carryforwards in Canada and certain foreign jurisdictions, \$44 million relates to New York tax credit carryforwards, and \$46 million relates to tax credit carryforwards in Canada.
- \$59 million of the valuation allowance relates to other deferred tax assets originating from temporary differences in Canada and certain foreign jurisdictions.

In determining these amounts, the Company considered the reversal of existing temporary differences as a source of taxable income. The ultimate realization of the remaining deferred tax assets is contingent on the Company's ability to generate future taxable income within the carryforward period and within the period in which the temporary differences become deductible. Due to the history of negative earnings in these jurisdictions and future projections of losses, the Company believes it is more likely than not the deferred tax assets will not be realized prior to expiration.

Through March 31, 2017, the Company recognized deferred tax assets related to loss carryforwards and other temporary items of approximately \$552 million. The Company determined that existing taxable temporary differences will reverse within the same period and jurisdiction, and are of the same character as the deductible temporary items generating sufficient taxable income to support realization of \$361 million of these deferred tax assets. Realization of the remaining \$191 million of deferred tax assets is dependent on our ability to earn pretax income aggregating approximately \$695 million in those jurisdictions to realize those deferred tax assets. The realization of our deferred tax assets is not dependent on tax planning strategies.

By their nature, tax laws are often subject to interpretation. Further complicating matters is that in those cases where a tax position is open to interpretation, differences of opinion can result in differing conclusions as to the amount of tax benefits to be recognized under ASC 740, *Income Taxes*. We utilize a two-step approach for evaluating tax positions. Recognition (Step 1) occurs when we conclude that a tax position, based solely on its technical merits, is more likely than not to be sustained upon examination. Measurement (Step 2) is only addressed if Step 1 has been satisfied. Under Step 2, we measure the tax benefit as the largest amount of benefit, determined on a cumulative probability basis that is more likely than not to be realized upon ultimate settlement. Consequently, the level of evidence and documentation necessary to support a position prior to being given recognition and measurement within the financial statements is a matter of judgment that depends on all available evidence.

Assessment of Loss Contingencies

We have legal and other contingencies, including environmental liabilities, which could result in significant losses upon the ultimate resolution of such contingencies. Environmental liabilities that are not legal asset retirement obligations are accrued on an undiscounted basis when it is probable that a liability exists for past events.

We have provided for losses in situations where we have concluded that it is probable that a loss has been or will be incurred and the amount of the loss is reasonably estimable. A significant amount of judgment is involved in determining whether a loss is probable and reasonably estimable due to the uncertainty involved in determining the likelihood of future events and estimating the financial statement impact of such events. If further developments or resolution of a contingent matter are not consistent with our assumptions and judgments, we may need to recognize a significant charge in a future period related to an existing contingency.

RECENTLY ISSUED ACCOUNTING STANDARDS

See Note 1 — Business and Summary of Significant Accounting Policies to our accompanying audited consolidated financial statements for a full description of recent accounting pronouncements including the respective expected dates of adoption and expected effects on results of operations and financial condition.

NON-GAAP FINANCIAL MEASURES

Total "Segment income" presents the sum of the results of our four operating segments on a consolidated basis. We believe that total "Segment income" is an operating performance measure that measures operating results unaffected by differences in capital structures, capital investment cycles and ages of related assets among otherwise comparable companies. In reviewing our corporate operating results, we also believe it is important to review the aggregate consolidated performance of all of our segments on the same basis we review the performance of each of our regions and to draw comparisons between periods based on the same measure of consolidated performance.

Management believes investors' understanding of our performance is enhanced by including this non-GAAP financial measure as a reasonable basis for comparing our ongoing results of operations. Many investors are interested in understanding the performance of our business by comparing our results from ongoing operations from one period to the next and would ordinarily add back items that are not part of normal day-to-day operations of our business. By providing total "Segment income," together with reconciliations, we believe we are enhancing investors' understanding of our business and our results of operations, as well as assisting investors in evaluating how well we are executing strategic initiatives.

However, total "Segment income" is not a measurement of financial performance under U.S. GAAP, and our total "Segment income" may not be comparable to similarly titled measures of other companies. Total "Segment income" has important limitations as an analytical tool and should not be considered in isolation or as a substitute for analysis of our results as reported under U.S. GAAP. For example, total "Segment income":

- does not reflect the company's cash expenditures or requirements for capital expenditures or capital commitments;
- does not reflect changes in, or cash requirements for, the company's working capital needs; and
- does not reflect any costs related to the current or future replacement of assets being depreciated and amortized.

We also use total "Segment income":

- as a measure of operating performance to assist us in comparing our operating performance on a consistent basis because it removes the impact of items not directly resulting from our core operations;
- for planning purposes, including the preparation of our internal annual operating budgets and financial projections;
- to evaluate the performance and effectiveness of our operational strategies; and
- as a basis to calculate incentive compensation payments for our key employees.

Total "Segment income" is equivalent to our Adjusted EBITDA, which we refer to in our earnings announcements and other external presentations to analysts and investors.

"Free cash flow" consists of: (a) net cash provided by (used in) operating activities; (b) plus net cash provided by (used in) investing activities and (c) less proceeds from sales of assets, net of transaction fees and hedging. Management believes "Free cash flow" is relevant to investors as it provides a measure of the cash generated internally that is available for debt service and other value creation opportunities. However, "Free cash flow" is not a measurement of financial performance or liquidity under U.S. GAAP and does not necessarily represent cash available for discretionary activities, as certain debt service obligations must be funded out of "Free cash flow." In addition, the Company's method of calculating "Free cash flow" may not be consistent with that of other companies.

Item 7A. Quantitative and Qualitative Disclosures About Market Risk

We are exposed to certain market risks as part of our ongoing business operations, including risks from changes in commodity prices (primarily LME aluminum prices and natural gas), local market premiums, electricity rates, foreign currency exchange rates and interest rates that could impact our results of operations and financial condition. We manage our exposure to these and other market risks through regular operating and financing activities and derivative financial instruments. We use derivative financial instruments as risk management tools only, and not for speculative purposes.

By their nature, all derivative financial instruments involve risk, including the credit risk of non-performance by counterparties. All derivative contracts are executed with counterparties that, in our judgment, are creditworthy. Our maximum potential loss may exceed the amount recognized in the accompanying March 31, 2017 consolidated balance sheet.

The decision of whether and when to execute derivative instruments, along with the duration of the instrument, can vary from period to period depending on market conditions and the relative costs of the instruments. The duration is linked to the timing of the underlying exposure, with the connection between the two being regularly monitored.

The market risks we are exposed to as part of our ongoing business operations are materially consistent with our risk exposures in the prior year, as we have not entered into any new material hedging programs.

Commodity Price Risks

We have commodity price risk with respect to purchases of certain raw materials including aluminum, electricity, natural gas and transport fuel.

Aluminum

A significant amount of our business is conducted under a conversion model, which allows us to pass through increases or decreases in the price of aluminum to our customers. Nearly all of our flat-rolled products have a price structure with three components: (i) a base aluminum price quoted off the LME; (ii) a local market premium; and (iii) a "conversion premium" to produce the rolled product which reflects, among other factors, the competitive market conditions for that product. Base aluminum prices are typically driven by macroeconomic factors and global supply and demand of aluminum. The local market premiums tend to vary based on the supply and demand for metal in a particular region and associated transportation costs.

Increases or decreases in the average price of aluminum based on the LME directly impact "Net sales," "Cost of goods sold (exclusive of depreciation and amortization)" and working capital. The timing of these impacts varies based on contractual arrangements with customers and metal suppliers in each region. These timing impacts are referred to as metal price lag. Metal price lag exists due to: (i) certain customer contracts containing fixed forward price commitments which result in exposure to changes in metal prices for the period of time between when our sales price fixes and the sale actually occurs, and (ii) the period of time between the pricing of our purchases of metal, holding and processing the metal, and the pricing of the sale of finished inventory to our customers.

We use derivative instruments to preserve our conversion margins and manage the timing differences associated with metal price lag related to base aluminum price. We use over-the-counter derivatives indexed to the London Metals Exchange (LME) (referred to as our "aluminum derivative contracts") to reduce our exposure to fluctuating metal prices associated with the period of time between the pricing of our purchases of inventory and the pricing of the sale of that inventory to our customers. We also purchase forward LME aluminum contracts simultaneous with our sales contracts with customers that contain fixed metal prices. These LME aluminum forward contracts directly hedge the economic risk of future metal price fluctuations to better match the purchase price of metal with the sales price of metal.

Sensitivities

The following table presents the estimated potential effect on the fair values of these derivative instruments as of March 31, 2017, given a 10% increase in prices (\$ in millions).

	Change in Price	Change in Fair Value
LME aluminum	10%	\$ (90)

Energy

We use several sources of energy in the manufacturing and delivery of our aluminum rolled products. For the year ended March 31, 2017, natural gas and electricity represented approximately 98% of our energy consumption by cost. We also use fuel oil and transport fuel. The majority of energy usage occurs at our casting centers and during the hot rolling of aluminum. Prior to the smelter facilities in South America ceasing operations, our smelter operations also required a significant amount of energy. Our cold rolling facilities require relatively less energy.

We purchase our natural gas and diesel fuel on the open market, subjecting us to market price fluctuations. We seek to stabilize our future exposure to natural gas and diesel fuel prices through the use of forward purchase contracts.

A portion of our electricity requirements are purchased pursuant to long-term contracts in the local regions in which we operate. A number of our facilities are located in regions with regulated prices, which affords relatively stable costs. In North America, we have entered into an electricity swap to fix a portion of the cost of our electricity requirements.

Fluctuating energy costs worldwide, due to the changes in supply and demand, and international and geopolitical events, expose us to earnings volatility as changes in such costs cannot be immediately recovered under existing contracts and sales agreements, and may only be mitigated in future periods under future pricing arrangements.

Sensitivities

The following table presents the estimated potential effect on the fair values of these derivative instruments as of March 31, 2017, given a 10% decline in spot prices for energy contracts (\$ in millions).

	Change in Price	Change in Fair Value
Electricity	(10)%	\$ (5)
Natural Gas	(10)%	(2)
Diesel Fuel	(10)%	\$ (2)

Foreign Currency Exchange Risks

Exchange rate movements, particularly the Euro, the Swiss franc, the Brazilian real and the Korean won against the U.S. dollar, have an impact on our operating results. In Europe, where we have predominantly local currency selling prices and operating costs, we benefit as the Euro strengthens, but are adversely affected as the Euro weakens. In January 2015, the Swiss National Bank discontinued its policy to support a minimum exchange rate between the Euro and the Swiss franc. Following this announcement, the Swiss franc rapidly appreciated in value. This adversely impacted our Swiss operations, where operating costs are incurred primarily in the Swiss franc, and a large portion of revenues are denominated in the Euro. In South Korea, where we have local currency operating costs and U.S. dollar denominated selling prices for exports, we benefit as the won weakens but are adversely affected as the won strengthens. In Brazil, where we have predominately U.S. dollar selling prices and local currency manufacturing costs, we benefit as the real weakens, but are adversely affected as the real strengthens.

It is our policy to minimize exposures from non-functional currency denominated transactions within each of our operating segments. We use foreign exchange forward contracts, options and cross-currency swaps to manage exposure arising from recorded assets and liabilities, firm commitments, and forecasted cash flows denominated in currencies other than the functional currency of certain operations, which include forecasted net sales, forecasted purchase commitments, capital expenditures and net investment in foreign subsidiaries. Our most significant non-U.S. dollar functional currency operations have the Euro and the Korean won as their functional currencies, respectively. Our Brazilian operations are U.S. dollar functional.

We also face translation risks related to the changes in foreign currency exchange rates which are generally not hedged. Amounts invested in these foreign operations are translated into U.S. dollars at the exchange rates in effect at the balance sheet date. Any resulting translation adjustments are recorded as a component of "Accumulated other comprehensive income/loss" in the Shareholder's equity/deficit section of our consolidated balance sheets. Net sales and expenses at these non-U.S. dollar functional currency entities are translated into varying amounts of U.S. dollars depending upon whether the U.S. dollar weakens or strengthens against other currencies. Therefore, changes in exchange rates may either positively or negatively affect our net sales and expenses as expressed in U.S. dollars.

Any negative impact of currency movements on the currency contracts we have entered into to hedge foreign currency commitments to purchase or sell goods and services would be offset by an approximately equal and opposite favorable exchange impact on the commitments being hedged. For a discussion of accounting policies and other information relating to currency contracts, see Note 1 — Business and Summary of Significant Accounting Policies and Note 15 — Financial Instruments and Commodity Contracts to our accompanying consolidated financial statements.

Sensitivities

The following table presents the estimated potential effect on the fair values of these derivative instruments as of March 31, 2017, given a 10% change in rates (\$ in millions).

	Change in Exchange Rate	Change in Fair Value
Currency measured against the U.S. dollar		
Brazilian real	(10)%	\$ (22)
Euro	10 %	(45)
Korean won	(10)%	(34)
Canadian dollar	(10)%	(4)
British pound	(10)%	(18)
Swiss franc	(10)%	(38)
Chinese yuan	10 %	(8)

Interest Rate Risks

We use interest rate swaps to manage our exposure to changes in benchmark interest rates which impact our variable-rate debt.

In January 2017, we refinanced our Term Loan Facility. Our interest rate paid is a spread of 1.85% plus LIBOR (1.15%). As of March 31, 2017, the effective interest rate was 3.00%. As of March 31, 2017, a 10 basis point increase or decrease in LIBOR interest rates would have had less than \$1 million impact on our annual pre-tax income.

From time to time, we have used interest rate swaps to manage our debt cost. As of March 31, 2017, there were no USD LIBOR based interest rate swaps outstanding.

In Korea, we periodically enter into interest rate swaps to fix the interest rate on various floating rate debt in order to manage our exposure to changes in the 3M-CD interest rate. See Note 15 — Financial Instruments and Commodity Contracts for further information on the amounts outstanding as of March 31, 2017.

Sensitivities

The following table presents the estimated potential effect on the fair values of these derivative instruments as of March 31, 2017, given a 100 bps decrease in the benchmark interest rate (\$ in millions).

	Change in Rate	Change in Fair Value
Interest Rate Contracts		
Asia – KRW-CD-3200	(100) bps	\$ (1)

Item 8. Financial Statements and Supplementary Data

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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 Rule 13a-15(f) under the Exchange Act, as amended. The Company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of the Company's financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. Our internal control over financial reporting includes those policies and procedures that:

- Pertain to the maintenance of records that in reasonable detail accurately and fairly reflect the transactions and dispositions of the assets of the Company;
- 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
- 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 Company's consolidated 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 has assessed the effectiveness of the Company's internal control over financial reporting as of March 31, 2017. In making this assessment, management used the criteria established by the Committee of Sponsoring Organizations of the Treadway Commission (COSO) in "*Internal Control — Integrated Framework (2013)*." Based on its assessment, management has concluded that, as of March 31, 2017, the Company's internal control over financial reporting was effective based on those criteria.

The effectiveness of the Company's internal control over financial reporting as of March 31, 2017 has been audited by PricewaterhouseCoopers LLP, an independent registered public accounting firm, as stated in their report which appears herein.

/s/ Steven Fisher
Steven Fisher
President and Chief Executive Officer
May 10, 2017

/s/ Devinder Ahuja
Devinder Ahuja
Senior Vice President and Chief Financial Officer
May 10, 2017

Report of Independent Registered Public Accounting Firm

To the Board of Directors and Shareholder of Novelis Inc.

In our opinion, the accompanying consolidated balance sheets and the related consolidated statements of operations, comprehensive income (loss), shareholder's deficit and cash flows present fairly, in all material respects, the financial position of Novelis Inc. and its subsidiaries as of March 31, 2017 and 2016, and the results of their operations and their cash flows for each of the three years in the period ended March 31, 2017 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 March 31, 2017, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO). The Company's management is responsible for these 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 these financial statements and on the Company's internal control over financial reporting based on our integrated audits. We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States) and in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audits to obtain reasonable assurance about whether the financial statements are free of material misstatement and whether effective internal control over financial reporting was maintained in all material respects. Our audits of the financial statements included examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. 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.

As discussed in Note 1 to the consolidated financial statements, the Company changed the manner in which it classifies debt issuance costs as of March 31, 2017.

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.

/s/PricewaterhouseCoopers LLP

Atlanta, Georgia
May 10, 2017

Novelis Inc.
CONSOLIDATED STATEMENTS OF OPERATIONS
(In millions)

	Year Ended March 31,		
	2017	2016	2015
Net sales	\$ 9,591	\$ 9,872	\$ 11,147
Cost of goods sold (exclusive of depreciation and amortization)	8,016	8,727	9,793
Selling, general and administrative expenses	421	407	427
Depreciation and amortization	360	353	352
Interest expense and amortization of debt issuance costs	294	327	326
Research and development expenses	58	54	50
Gain on assets held for sale	(2)	—	(22)
Loss on extinguishment of debt	134	13	—
Restructuring and impairment, net	10	48	37
Equity in net loss of non-consolidated affiliates	8	3	5
Other expense (income), net	95	(68)	17
	<u>9,394</u>	<u>9,864</u>	<u>10,985</u>
Income before income taxes	197	8	162
Income tax provision	151	46	14
Net income (loss)	46	(38)	148
Net income attributable to noncontrolling interests	1	—	—
Net income (loss) attributable to our common shareholder	<u>\$ 45</u>	<u>\$ (38)</u>	<u>\$ 148</u>

See accompanying notes to the consolidated financial statements.

Novelis Inc.
CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME (LOSS)
(In millions)

	Year Ended March 31,		
	2017	2016	2015
Net income (loss)	\$ 46	\$ (38)	\$ 148
Other comprehensive (loss) income:			
Currency translation adjustment	(59)	17	(304)
Net change in fair value of effective portion of hedges, net	(57)	60	(44)
Net change in pension and other benefits, net	74	(33)	(209)
Other comprehensive (loss) income before income tax effect	(42)	44	(557)
Income tax benefit related to items of other comprehensive income (loss)	—	(6)	(72)
Other comprehensive (loss) income, net of tax	(42)	50	(485)
Comprehensive income (loss)	\$ 4	\$ 12	\$ (337)
Less: Comprehensive income (loss) attributable to noncontrolling interest, net of tax	4	(11)	(15)
Comprehensive income (loss) attributable to our common shareholder	\$ —	\$ 23	\$ (322)

See accompanying notes to the consolidated financial statements.

Novelis Inc.
CONSOLIDATED BALANCE SHEETS

(In millions, except number of shares)

	March 31,	
	2017	2016
ASSETS		
Current assets		
Cash and cash equivalents	\$ 594	\$ 556
Accounts receivable, net		
— third parties (net of uncollectible accounts of \$6 as of March 31, 2017 and \$3 as of March 31, 2016)	1,067	956
— related parties	60	59
Inventories	1,333	1,180
Prepaid expenses and other current assets	111	127
Fair value of derivative instruments	113	88
Assets held for sale	3	5
Total current assets	3,281	2,971
Property, plant and equipment, net	3,357	3,506
Goodwill	607	607
Intangible assets, net	457	523
Investment in and advances to non-consolidated affiliate	451	488
Deferred income tax assets	82	87
Other long-term assets		
— third parties	94	82
— related parties	15	16
Total assets	\$ 8,344	\$ 8,280
LIABILITIES AND SHAREHOLDER'S DEFICIT		
Current liabilities		
Current portion of long-term debt	\$ 121	\$ 47
Short-term borrowings	294	579
Accounts payable		
— third parties	1,722	1,506
— related parties	51	48
Fair value of derivative instruments	151	85
Accrued expenses and other current liabilities	554	569
Total current liabilities	2,893	2,834
Long-term debt, net of current portion	4,437	4,421
Deferred income tax liabilities	94	89
Accrued postretirement benefits	799	820
Other long-term liabilities	198	175
Total liabilities	8,421	8,339
Commitments and contingencies		
Shareholder's deficit		
Common stock, no par value; unlimited number of shares authorized; 1,000 shares issued and outstanding as of March 31, 2017 and 2016	—	—
Additional paid-in capital	1,404	1,404
Accumulated deficit	(918)	(963)
Accumulated other comprehensive loss	(545)	(500)
Total deficit of our common shareholder	(59)	(59)
Noncontrolling interests	(18)	—
Total deficit	(77)	(59)
Total liabilities and deficit	\$ 8,344	\$ 8,280

See accompanying notes to the consolidated financial statements.

Novelis Inc.
CONSOLIDATED STATEMENTS OF CASH FLOWS
(In millions)

	Year Ended March 31,		
	2017	2016	2015
OPERATING ACTIVITIES			
Net income (loss)	\$ 46	\$ (38)	\$ 148
Adjustments to determine net cash provided by operating activities:			
Depreciation and amortization	360	353	352
(Gain) loss on unrealized derivatives and other realized derivatives in investing activities, net	(15)	(27)	39
Gain on assets held for sale	(2)	—	(22)
Loss on sale of business	27,000,000	27	—
Loss on sale of assets	6	4	5
Impairment charges	2	25	7
Loss on extinguishment of debt	134	13	—
Deferred income taxes	4	(93)	(88)
Amortization of fair value adjustments, net	7	11	10
Equity in net loss of non-consolidated affiliates	8	3	5
Loss (gain) on foreign exchange remeasurement of debt	2	(2)	(5)
Amortization of debt issuance costs and carrying value adjustments	22	19	25
Other, net	3	—	1
Changes in assets and liabilities including assets and liabilities held for sale (net of effects from divestitures):			
Accounts receivable	(154)	336	(54)
Inventories	(193)	268	(390)
Accounts payable	253	(327)	578
Other current assets	9	(12)	(27)
Other current liabilities	10	7	66
Other noncurrent assets	(30)	20	7
Other noncurrent liabilities	76	(19)	(53)
Net cash provided by operating activities	575	541	604
INVESTING ACTIVITIES			
Capital expenditures	(224)	(370)	(518)
Proceeds from sales of assets, third party, net of transaction fees and hedging	4	3	117
Outflows from the sale of business, net of transaction fees	(2)	—	—
Proceeds (outflows) from investment in and advances to non-consolidated affiliates, net	2	(2)	(20)
Proceeds (outflows) from settlement of other undesignated derivative instruments, net	8	(9)	5
Net cash used in investing activities	(212)	(378)	(416)
FINANCING ACTIVITIES			
Proceeds from issuance of long-term and short-term borrowings	4,572	174	362
Principal payments of long-term and short-term borrowings	(4,477)	(216)	(324)
Revolving credit facilities and other, net	(229)	(187)	160
Return of capital to our common shareholder	—	—	(250)
Dividends, noncontrolling interest	—	(1)	(1)
Debt issuance costs	(191)	(15)	(3)
Net cash used in financing activities	(325)	(245)	(56)
Net increase (decrease) in cash and cash equivalents	38	(82)	132
Effect of exchange rate changes on cash	—	10	(13)
Cash and cash equivalents — beginning of period	556	628	509
Cash and cash equivalents — end of period	\$ 594	\$ 556	\$ 628

See accompanying notes to the consolidated financial statements.

Novelis Inc.
CONSOLIDATED STATEMENTS OF SHAREHOLDER'S DEFICIT
(In millions, except number of shares)

Deficit of our Common Shareholder								
Common Stock								
	Shares	Amount	Additional Paid-in Capital	Retained Earnings/ (Accumulated Deficit)	Accumulated Other Comprehensive Income (Loss) (AOCI)	Non- Controlling Interests	Total Deficit	
Balance as of March 31, 2014	1,000	\$ —	\$ 1,404	\$ (1,073)	\$ (91)	\$ 28	\$	268
Net income attributable to our common shareholder	—	—	—	148	—	—	—	148
Currency translation adjustment, net of tax provision of \$— included in AOCI	—	—	—	—	(302)	(2)	—	(304)
Change in fair value of effective portion of hedges, net of tax benefit of \$1 included in AOCI	—	—	—	—	(43)	—	—	(43)
Change in pension and other benefits, net of tax benefit of \$71 included in AOCI	—	—	—	—	(125)	(13)	—	(138)
Noncontrolling interests cash dividends declared	—	—	—	—	—	(1)	—	(1)
Balance as of March 31, 2015	1,000	—	1,404	(925)	(561)	12	—	(70)
Net income attributable to our common shareholder	—	—	—	(38)	—	—	—	(38)
Currency translation adjustment, net of tax provision of \$— included in AOCI	—	—	—	—	17	—	—	17
Change in fair value of effective portion of cash flow hedges, net of tax provision of \$8 million included in AOCI	—	—	—	—	52	—	—	52
Change in pension and other benefits, net of tax benefit of \$14 million included in AOCI	—	—	—	—	(8)	(11)	—	(19)
Noncontrolling interests cash dividends declared	—	—	—	—	—	(1)	—	(1)
Balance as of March 31, 2016	1,000	—	1,404	(963)	(500)	—	—	(59)
Net loss attributable to our common shareholder	—	—	—	45	—	—	—	45
Net income attributable to noncontrolling interests	—	—	—	—	—	1	—	1
Currency translation adjustment, net of tax provision of \$— included in AOCI	—	—	—	—	(60)	1	—	(59)
Change in fair value of effective portion of cash flow hedges, net of tax provision of \$22 million included in AOCI	—	—	—	—	(35)	—	—	(35)
Change in pension and other benefits, net of tax benefit of \$22 million included in AOCI	—	—	—	—	50	2	—	52
Noncontrolling interest related to the sale of a business	—	—	—	—	—	(22)	—	(22)
Balance as of March 31, 2017	1,000	\$ —	\$ 1,404	\$ (918)	\$ (545)	\$ (18)	\$	(77)

See accompanying notes to the consolidated financial statements.

1. BUSINESS AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

References herein to “Novelis,” the “Company,” “we,” “our,” or “us” refer to Novelis Inc. and its subsidiaries unless the context specifically indicates otherwise. References herein to “Hindalco” refer to Hindalco Industries Limited. Hindalco acquired Novelis in May 2007. All of the common shares of Novelis are owned directly by AV Metals Inc. and indirectly by Hindalco Industries Limited.

Organization and Description of Business

We produce aluminum sheet and light gauge products for use in the packaging market, which includes beverage and food can and foil products, as well as for use in the automotive, transportation, electronics, architectural and industrial product markets. We have recycling operations in many of our plants to recycle post-consumer aluminum, such as used-beverage cans and post-industrial aluminum, such as class scrap. As of March 31, 2017, we had manufacturing operations in ten countries on four continents: North America, South America, Asia and Europe, through 24 operating facilities, including recycling operations in eleven of these plants.

Consolidation Policy

Our consolidated financial statements include the assets, liabilities, revenues and expenses of all wholly-owned subsidiaries, majority-owned subsidiaries over which we exercise control and entities in which we have a controlling financial interest or are deemed to be the primary beneficiary. We eliminate all significant intercompany accounts and transactions from our consolidated financial statements.

We use the equity method to account for our investments in entities that we do not control, but where we have the ability to exercise significant influence over operating and financial policies. Consolidated “Net (loss) income attributable to our common shareholder” includes our share of net income (loss) of these entities. The difference between consolidation and the equity method impacts certain of our financial ratios because of the presentation of the detailed line items reported in the consolidated financial statements for consolidated entities, compared to a two-line presentation of “Investment in and advances to non-consolidated affiliates” and “Equity in net loss of non-consolidated affiliates.”

Use of Estimates and Assumptions

The preparation of our consolidated financial statements in conformity with accounting principles generally accepted in the United States of America (U.S. GAAP) requires us to make estimates and assumptions. These estimates and assumptions affect the reported amounts of assets and liabilities and the disclosures of contingent assets and liabilities as of the date of the financial statements, and the reported amounts of revenues and expenses during the reporting periods. The principal areas of judgment relate to (1) the fair value of derivative financial instruments; (2) impairment of goodwill; (3) impairment of long lived assets and other intangible assets; (4) impairment and assessment of consolidation of equity investments; (5) actuarial assumptions related to pension and other postretirement benefit plans; (6) tax uncertainties and valuation allowances; and (7) assessment of loss contingencies, including environmental and litigation liabilities. Future events and their effects cannot be predicted with certainty, and accordingly, our accounting estimates require the exercise of judgment. The accounting estimates used in the preparation of our consolidated financial statements may change as new events occur, as more experience is acquired, as additional information is obtained and as our operating environment changes. We evaluate and update our assumptions and estimates on an ongoing basis and may employ outside experts to assist in our evaluations. Actual results could differ from the estimates we have used.

Risks and Uncertainties

We are exposed to a number of risks in the normal course of our operations that could potentially affect our financial position, results of operations, and cash flows.

Laws and regulations

We operate in an industry that is subject to a broad range of environmental, health and safety laws and regulations in the jurisdictions in which we operate. These laws and regulations impose increasingly stringent environmental, health and safety protection standards and permitting requirements regarding, among other things, air emissions, wastewater storage, treatment and discharges, the use and handling of hazardous or toxic materials, waste disposal practices, the remediation of environmental contamination, post-mining reclamation and working conditions for our employees. Some environmental laws, such as the U.S. Comprehensive Environmental Response, Compensation, and Liability Act, also known as CERCLA or Superfund, and comparable state laws, impose joint and several liability for the cost of environmental remediation, natural resource damages, third party claims, and other expenses, without regard to the fault or the legality of the original conduct.

The costs of complying with these laws and regulations, including participation in assessments and remediation of contaminated sites and installation of pollution control facilities, have been, and in the future could be, significant. In addition, these laws and regulations may also result in substantial environmental liabilities associated with divested assets, third party locations and past activities. In certain instances, these costs and liabilities, as well as related action to be taken by us, could be accelerated or increased if we were to close, divest of or change the principal use of certain facilities with respect to which we may have environmental liabilities or remediation obligations. Currently, we are involved in a number of compliance efforts, remediation activities and legal proceedings concerning environmental matters, including certain activities and proceedings arising under U.S. Superfund and comparable laws in other jurisdictions where we have operations.

We have established liabilities for environmental remediation where appropriate. However, the cost of addressing environmental matters (including the timing of any charges related thereto) cannot be predicted with certainty, and these liabilities may not ultimately be adequate, especially in light of potential changes in environmental conditions, changing interpretations of laws and regulations by regulators and courts, the discovery of previously unknown environmental conditions, the risk of governmental orders to carry out additional compliance on certain sites not initially included in remediation in progress, our potential liability to remediate sites for which provisions have not been previously established and the adoption of more stringent environmental laws. Such future developments could result in increased environmental costs and liabilities and could require significant capital expenditures, any of which could have a material adverse effect on our financial position or results of operations or cash flows. Furthermore, the failure to comply with our obligations under the environmental laws and regulations could subject us to administrative, civil or criminal penalties, obligations to pay damages or other costs, and injunctions or other orders, including orders to cease operations. In addition, the presence of environmental contamination at our properties could adversely affect our ability to sell a property, receive full value for a property or use a property as collateral for a loan.

Some of our current and potential operations are located or could be located in or near communities that may regard such operations as having a detrimental effect on their social and economic circumstances. Environmental laws typically provide for participation in permitting decisions, site remediation decisions and other matters. Concern about environmental justice issues may affect our operations. Should such community objections be presented to government officials, the consequences of such a development may have a material adverse impact upon the profitability or, in extreme cases, the viability of an operation. In addition, such developments may adversely affect our ability to expand or enter into new operations in such location or elsewhere and may also have an effect on the cost of our environmental remediation projects.

We use a variety of hazardous materials and chemicals in our rolling processes and in connection with maintenance work on our manufacturing facilities. Because of the nature of these substances or related residues, we may be liable for certain costs, including, among others, costs for health-related claims or removal or re-treatment of such substances. Certain of our current and former facilities incorporated asbestos-containing materials, a hazardous substance that has been the subject of health-related claims for occupation exposure. In addition, although we have developed environmental, health and safety programs for our employees, including measures to reduce employee exposure to hazardous substances, and conduct regular assessments at our facilities, we are currently, and in the future may be, involved in claims and litigation filed on behalf of persons alleging injury predominantly as a result of occupational exposure to substances at our current or former facilities. It is not possible to predict the ultimate outcome of these claims and lawsuits due to the unpredictable nature of personal injury litigation. If these claims and lawsuits, individually or in the aggregate, were finally resolved against us, our financial position, results of operations and cash flows could be adversely affected.

Materials and labor

In the aluminum rolled products industry, our raw materials are subject to continuous price volatility. We may not be able to pass on the entire cost of the increases to our customers or offset fully the effects of higher raw material costs through productivity improvements, which may cause our profitability to decline. In addition, there is a potential time lag between changes in prices under our purchase contracts and the point when we can implement a corresponding change under our sales contracts with our customers. As a result, we could be exposed to fluctuations in raw materials prices which could have a material adverse effect on our financial position, results of operations and cash flows. Significant price increases may result in our customers substituting other materials, such as plastic or glass, for aluminum or switching to another aluminum rolled products producer, which could have a material adverse effect on our financial position, results of operations and cash flows.

We consume substantial amounts of energy in our rolling operations and our cast house operations. The factors that affect our energy costs and supply reliability tend to be specific to each of our facilities. A number of factors could materially adversely affect our energy position including, but not limited to: (a) increases in the cost of natural gas; (b) increases in the cost of supplied electricity or fuel oil related to transportation; (c) interruptions in energy supply due to equipment failure or other causes and (d) the inability to extend energy supply contracts upon expiration on economical terms. A significant increase in energy costs or disruption of energy supplies or supply arrangements could have a material adverse effect on our financial position, results of operations and cash flows.

A substantial portion of our employees are represented by labor unions under a large number of collective bargaining agreements with varying durations and expiration dates. We may not be able to satisfactorily renegotiate our collective bargaining agreements when they expire. In addition, existing collective bargaining agreements may not prevent a strike or work stoppage at our facilities in the future, and any such work stoppage could have a material adverse effect on our financial position, results of operations and cash flows.

Geographic markets

We are, and will continue to be, subject to financial, political, economic and business risks in connection with our global operations. We have made investments and carry on production activities in various emerging markets, including China, Brazil and South Korea, and we market our products in these countries, as well as certain other countries in Asia, Africa, and the Middle East. While we anticipate higher growth or attractive production opportunities from these emerging markets, they also present a higher degree of risk than more developed markets. In addition to the business risks inherent in developing and servicing new markets, economic conditions may be more volatile, legal and regulatory systems may be less developed and predictable, and the possibility of various types of adverse governmental action may be more pronounced. In addition, inflation, fluctuations in currency and interest rates, competitive factors, civil unrest and labor problems could affect our revenues, expenses and results of operations. Our operations could also be adversely affected by acts of war, terrorism or the threat of any of these events as well as government actions such as controls on imports, exports and prices, tariffs, new forms of taxation, changes in fiscal regimes and increased government regulation in the countries in which we operate or service customers. Unexpected or uncontrollable events or circumstances in any of these markets could have a material adverse effect on our financial position, results of operations and cash flows.

Other risks and uncertainties

In addition, refer to Note 17 — Fair Value Measurements and Note 20 — Commitments and Contingencies for a discussion of financial instruments and commitments and contingencies.

Revenue Recognition

We recognize sales when the revenue is realized or realizable, and has been earned. We record sales when a firm sales agreement is in place, delivery has occurred and collectability of the fixed or determinable sales price is reasonably assured.

We recognize product revenue, net of trade discounts, allowances, and estimated billing adjustments, in the reporting period in which the products are shipped and the title and risk of ownership pass to the customer. We sell most of our products under contracts based on a “conversion premium,” which is subject to periodic adjustments based on market factors. As a result, the aluminum price risk is largely absorbed by the customer. In situations where we offer customers fixed prices for future delivery of our products, we enter into derivative instruments for all or a portion of the cost of metal inputs to protect our profit on the conversion of the product.

Shipping and handling amounts we bill to our customers are included in “Net sales” and the related shipping and handling costs we incur are included in “Cost of goods sold (exclusive of depreciation and amortization).”

Our customers can receive or earn certain incentives including, but not limited to, contract signing bonuses, cash discounts, volume based incentive programs, and support for infrastructure programs. The incentives are recorded as reductions to "Net sales" and are recognized over the minimum contractual period in which the customer is obligated to make purchases from Novelis. For incentives that must be earned, management must make estimates related to customer performance and sales volume to determine the total amounts earned and to be recorded as reductions to "Net sales." In making these estimates, management considers historical results. The actual amounts may differ from these estimates.

On occasion, and in an attempt to better manage inventory levels, we sell inventory to third parties and have agreed to repurchase the same or similar inventory back from the third parties over a future period, based on market prices at the time of repurchase. For transactions in which the Company sells inventory and agrees to repurchase at a later date, we record the initial sale of the inventory on a net basis in our consolidated statement of operations through "Cost of goods sold (exclusive of depreciation and amortization)." Upon repurchase, the Company accounts for the inventory at the reacquisition price which becomes an input to our moving average inventory cost basis.

Cost of Goods Sold (Exclusive of Depreciation and Amortization)

"Cost of goods sold (exclusive of depreciation and amortization)" includes all costs associated with inventories, including the procurement of materials, the conversion of such materials into finished products, and the costs of warehousing and distributing finished goods to customers. Material procurement costs include inbound freight charges as well as purchasing, receiving, inspection and storage costs. Conversion costs include the costs of direct production inputs such as labor and energy, as well as allocated overheads from indirect production centers and plant administrative support areas. Warehousing and distribution costs include inside and outside storage costs, outbound freight charges and the costs of internal transfers.

Selling, General and Administrative Expenses

"Selling, general and administrative expenses" include selling, marketing and advertising expenses; salaries, travel and office expenses of administrative employees and contractors; legal and professional fees; software license fees; bad debt expenses; and factoring expenses.

Research and Development

We incur costs in connection with research and development programs that are expected to contribute to future earnings, and charge such costs against income as incurred. Research and development costs consist primarily of salaries and administrative costs.

Restructuring Activities

Restructuring charges, which are recorded within "Restructuring and impairment, net," include employee severance and benefit costs, impairments of assets, and other costs associated with exit activities. We apply the provisions of ASC 420, *Exit or Disposal Cost Obligations* (ASC 420). Severance costs accounted for under ASC 420 are recognized when management with the proper level of authority has committed to a restructuring plan and communicated those actions to employees. Impairment losses are based upon the estimated fair value less costs to sell, with fair value estimated based on existing market prices for similar assets. Other exit costs include environmental remediation costs and contract termination costs, primarily related to equipment and facility lease obligations. At each reporting date, we evaluate the accruals for restructuring costs to ensure the accruals are still appropriate. See Note 2 — Restructuring and Impairment for further discussion.

Cash and Cash Equivalents

"Cash and cash equivalents" includes investments that are highly liquid and have maturities of three months or less when purchased. The carrying values of cash and cash equivalents approximate their fair value due to the short-term nature of these instruments.

We maintain amounts on deposit with various financial institutions, which may, at times, exceed federally insured limits. However, management periodically evaluates the credit-worthiness of those institutions, and we have not experienced any losses on such deposits.

Accounts Receivable

Our accounts receivable are geographically dispersed. We do not obtain collateral relating to our accounts receivable. We do not believe there are any significant concentrations of revenues from any particular customer or group of customers that would subject us to any significant credit risks in the collection of our accounts receivable. We report accounts receivable at the estimated net realizable amount we expect to collect from our customers.

Additions to the allowance for doubtful accounts are made by means of the provision for doubtful accounts. We write-off uncollectible accounts receivable against the allowance for doubtful accounts after exhausting collection efforts. For each of the periods presented, we performed an analysis of our historical cash collection patterns and considered the impact of any known material events in determining the allowance for doubtful accounts. See Note 3 — Accounts Receivable for further discussion.

Derivative Instruments

We hold derivatives for risk management purposes and not for trading. We use derivatives to mitigate uncertainty and volatility caused by underlying exposures to aluminum prices, foreign exchange rates, interest rates, and energy prices. The fair values of all derivative instruments are recognized as assets or liabilities at the balance sheet date and are reported gross.

We may be exposed to losses in the future if the counterparties to our derivative contracts fail to perform. We are satisfied that the risk of such non-performance is remote due to our monitoring of credit exposures. Additionally, we enter into master netting agreements with contractual provisions that allow for netting of counterparty positions in case of default, and we do not face credit contingent provisions that would result in the posting of collateral.

For derivatives designated as cash flow hedges or net investment hedges, we assess hedge effectiveness by formally evaluating the high correlation of the expected future cash flows of the hedged item and the derivative hedging instrument. The effective portion of gain or loss on the derivative is included in other comprehensive income (OCI) and reclassified to earnings in the period in which earnings are impacted by the hedged items or in the period that the transaction becomes probable of not occurring. Gains or losses representing reclassifications of OCI to earnings are recognized in the line item most reflective of the underlying risk exposure. We exclude the time value component of foreign currency and aluminum price risk hedges when measuring and assessing ineffectiveness to align our accounting policy with risk management objectives when it is necessary. If at any time during the life of a cash flow hedge relationship we determine that the relationship is no longer effective, the derivative will no longer be designated as a cash flow hedge and future gains or losses on the derivative will be recognized in "Other (income) expense, net."

For derivatives designated as fair value hedges, we assess hedge effectiveness by formally evaluating the high correlation of changes in the fair value of the hedged item and the derivative hedging instrument. The changes in the fair values of the underlying hedged items are reported in "Prepaid expenses and other current assets," "Other long-term assets", "Accrued expenses and other current liabilities," and "Other long-term liabilities" in the consolidated balance sheets. Changes in the fair values of these derivatives and underlying hedged items generally offset and the effective portion is recorded in "Net sales" consistent with the underlying hedged item and the net ineffectiveness is recorded in "Other (income) expense, net."

If no hedging relationship is designated, gains or losses are recognized in "Other (income) expense, net" in our current period earnings.

Consistent with the cash flows from the underlying risk exposure, we classify cash settlement amounts associated with designated derivatives as part of either operating or investing activities in the consolidated statements of cash flows. If no hedging relationship is designated, we classify cash settlement amounts as part of investing activities in the consolidated statement of cash flows.

The majority of our derivative contracts are valued using industry-standard models that use observable market inputs as their basis, such as time value, forward interest rates, volatility factors, and current (spot) and forward market prices for foreign exchange rates. See Note 15 — Financial Instruments and Commodity Contracts and Note 17 — Fair Value Measurements for additional discussion related to derivative instruments.

Inventories

We carry our inventories at the lower of their cost or net realizable value, reduced for obsolete and excess inventory. We use the average cost method to determine cost. Included in inventories are stores inventories, which are carried at average cost. See Note 4 — Inventories for further discussion.

Property, Plant and Equipment

We record land, buildings, leasehold improvements and machinery and equipment at cost. We record assets under capital lease obligations at the lower of their fair value or the present value of the aggregate future minimum lease payments as of the beginning of the lease term. We generally depreciate our assets using the straight-line method over the shorter of the estimated useful life of the assets or the lease term, excluding any lease renewals, unless the lease renewals are reasonably assured. See Note 6 — Property, Plant and Equipment for further discussion. We assign useful lives to and depreciate major components of our property, plant and equipment.

The ranges of estimated useful lives are as follows:

	Years
Buildings	30 to 40
Leasehold improvements	7 to 20
Machinery and equipment	2 to 25
Furniture, fixtures and equipment	3 to 10
Equipment under capital lease obligations	5 to 15

As noted above, our machinery and equipment have useful lives of 2 to 25 years. Most of our large scale machinery, including hot mills, cold mills, continuous casting mills, furnaces and finishing mills have useful lives of 15 to 25 years. Supporting machinery and equipment, including automation and work rolls, have useful lives of 2 to 15 years.

Maintenance and repairs of property and equipment are expensed as incurred. We capitalize replacements and improvements that increase the estimated useful life of an asset, and we capitalize interest on major construction and development projects while in progress.

We retain fully depreciated assets in property and accumulated depreciation accounts until we remove them from service. In the case of sale, retirement or disposal, the asset cost and related accumulated depreciation balances are removed from the respective accounts, and the resulting net amount, after consideration of any proceeds, is included as a gain or loss in "Other (income) expense, net" or "(Gain) loss on assets held for sale" in our consolidated statements of operations.

We account for operating leases under the provisions of ASC 840, *Leases*. These pronouncements require us to recognize escalating rents, including any rent holidays, on a straight-line basis over the term of the lease for those lease agreements where we receive the right to control the use of the entire leased property at the beginning of the lease term.

Goodwill

We test for impairment at least annually as of the last day of February of each fiscal year, unless a triggering event occurs that would require an interim impairment assessment. We do not aggregate components of operating segments to arrive at our reporting units and, as such, our reporting units are the same as our operating segments.

In performing our goodwill impairment test, we have the option to first assess qualitative factors to determine whether the existence of events or circumstances leads to a determination that it is more likely than not that the estimated fair value of a reporting unit is less than its carrying amount. If we perform a qualitative assessment and determine that an impairment is more likely than not, then we perform the two-step quantitative impairment test, otherwise no further analysis is required. We also may elect not to perform the qualitative assessment and, instead, proceed directly to the two-step quantitative impairment test. The ultimate outcome of the goodwill impairment assessment will be the same whether we choose to perform the qualitative assessment or proceed directly to the two-step quantitative impairment test.

For the years ended March 31, 2017, 2016 and 2015 we elected to perform the two-step quantitative impairment test. No goodwill impairment was identified in any of the years. See Note 7 — Goodwill and Intangible Assets for further discussion.

We use the present value of estimated future cash flows to establish the estimated fair value of our reporting units as of the testing date. This approach includes many assumptions related to future growth rates, discount factors and tax rates, among other considerations. Changes in economic and operating conditions impacting these assumptions could result in goodwill impairment in future periods. When available and as appropriate, we use the market approach to corroborate the estimated fair value. If the carrying amount of a reporting unit's goodwill exceeds its estimated fair value, the second step of the impairment test is performed in order to determine the amount of impairment loss, if any. The second step compares the implied fair value of the reporting unit goodwill with the carrying amount of that goodwill. If the carrying amount of the reporting unit's goodwill exceeds its implied fair value we would recognize an impairment charge in an amount equal to that excess in our consolidated statements of operations.

When a business within a reporting unit is disposed of, goodwill is allocated to the gain or loss on disposition using the relative fair value methodology.

Long-Lived Assets and Other Intangible Assets

We amortize the cost of intangible assets over their respective estimated useful lives to their estimated residual value. See Note 7 — Goodwill and Intangible Assets for further discussion.

We assess the recoverability of long-lived assets (excluding goodwill) and finite-lived intangible assets, whenever events or changes in circumstances indicate that we may not be able to recover the asset's carrying amount. We measure the recoverability of assets to be held and used by a comparison of the carrying amount of the asset (groups) to the expected, undiscounted future net cash flows to be generated by that asset (groups), or, for identifiable intangible assets, by determining whether the amortization of the intangible asset balance over its remaining life can be recovered through undiscounted future cash flows. The amount of impairment of identifiable intangible assets is based on the present value of estimated future cash flows. We measure the amount of impairment of other long-lived assets and intangible assets (excluding goodwill) as the amount by which the carrying value of the asset exceeds the fair value of the asset, which is generally determined as the present value of estimated future cash flows or as the appraised value. Impairments of long-lived assets and intangible assets are included in "Restructuring and impairment, net" in the consolidated statement of operations. See Note 2 - Restructuring and Impairment for further discussions.

Assets and Liabilities Held for Sale

We classify long-lived assets (disposal groups) to be sold as held for sale in the period in which all of the following criteria are met: management, having the authority to approve the action, commits to a plan to sell the asset (disposal group); the asset (disposal group) is available for immediate sale in its present condition subject only to terms that are usual and customary for sales of such assets (disposal groups); an active program to locate a buyer and other actions required to complete the plan to sell the asset (disposal group) have been initiated; the sale of the asset (disposal group) is probable, and transfer of the asset (disposal group) is expected to qualify for recognition as a completed sale within one year, except if events or circumstances beyond our control extend the period of time required to sell the asset (disposal group) beyond one year; the asset (disposal group) is being actively marketed for sale at a price that is reasonable in relation to its current fair value; and actions required to complete the plan indicate that it is unlikely that significant changes to the plan will be made or that the plan will be withdrawn.

We initially measure a long-lived asset (disposal group) that is classified as held for sale at the lower of its carrying value or fair value less any costs to sell. Any loss resulting from this measurement is recognized in the period in which the held for sale criteria are met. Conversely, gains are not recognized on the sale of a long-lived asset (disposal group) until the date of sale. We assess the fair value of a long-lived asset (disposal group) less any costs to sell each reporting period it remains classified as held for sale and report any reduction in fair value as an adjustment to the carrying value of the asset (disposal group). Upon being classified as held for sale we cease depreciation. We continue to depreciate long-lived assets to be disposed of other than by sale.

Upon determining that a long-lived asset (disposal group) meets the criteria to be classified as held for sale, we report the assets and liabilities of the disposal group, if material, in the line items "Assets held for sale" and "Liabilities held for sale," respectively, in our consolidated balance sheets. See Note 5 — Assets Held for Sale for further discussion.

Investment in and Advances to Non-Consolidated Affiliates

We assess the potential for other-than-temporary impairment of our equity method investments when impairment indicators are identified. We consider all available information, including the recoverability of the investment, the earnings and near-term prospects of the affiliate, factors related to the industry, conditions of the affiliate, and our ability, if any, to influence the management of the affiliate. We assess fair value based on valuation methodologies, as appropriate, including the present value of estimated future cash flows, estimates of sales proceeds, and external appraisals. If an investment is considered to be impaired and the decline in value is other than temporary, we record an appropriate write-down. See Note 9 — Investment in and Advances to Non-Consolidated Affiliates for further discussion.

Financing Costs

We amortize financing costs and premiums, and accrete discounts, over the remaining life of the related debt using the effective interest amortization method, unless the impact of utilizing the straight-line method results in an immaterial difference. The expense is included in “Interest expense and amortization of debt issuance costs” in our consolidated statements of operations. We record discounts and unamortized financing costs as a direct deduction from, or premiums as a direct addition to, the face amount of the financing.

Fair Value of Financial Instruments

ASC 820, *Fair Value Measurements and Disclosures* (ASC 820), defines fair value, establishes a framework for measuring fair value, and expands disclosures about fair value measurements. ASC 820 also applies to measurements under other accounting pronouncements, such as ASC 825, *Financial Instruments* (ASC 825) that require or permit fair value measurements. ASC 825 requires disclosures of the fair value of financial instruments. Our financial instruments include: cash and cash equivalents; certificates of deposit; accounts receivable; accounts payable; foreign currency, energy and interest rate derivative instruments; cross-currency swaps; metal option and forward contracts; share-based compensation; related party notes receivable and payable; letters of credit; short-term borrowings and long-term debt.

The carrying amounts of cash and cash equivalents, certificates of deposit, accounts receivable, accounts payable and current related party notes receivable and payable approximate their fair value because of the short-term maturity and highly liquid nature of these instruments. The fair value of our letters of credit is deemed to be the amount of payment guaranteed on our behalf by third party financial institutions. We determine the fair value of our short-term borrowings and long-term debt based on various factors including maturity schedules, call features and current market rates. We also use quoted market prices, when available, or the present value of estimated future cash flows to determine fair value of our share-based compensation liabilities, short-term borrowings and long-term debt. When quoted market prices are not available for various types of financial instruments (such as currency, energy and interest rate derivative instruments, swaps, options and forward contracts), we use standard pricing models with market-based inputs, which take into account the present value of estimated future cash flows. See Note 17 — Fair Value Measurements for further discussion.

Pensions and Postretirement Benefits

Our pension obligations relate to funded defined benefit pension plans in the U.S., Canada, Switzerland and the U.K., unfunded pension plans in the U.S., Canada, and Germany, and unfunded lump sum indemnities in France, Malaysia and Italy; and partially funded lump sum indemnities in South Korea. Our other postretirement obligations include unfunded health care and life insurance benefits provided to retired employees in Canada, the U.S. and Brazil.

We account for our pensions and other postretirement benefits in accordance with ASC 715, *Compensation — Retirement Benefits* (ASC 715). We recognize the funded status of our benefit plans as a net asset or liability, with an offsetting adjustment to accumulated other comprehensive income in shareholder’s (deficit) equity. The funded status is calculated as the difference between the fair value of plan assets and the benefit obligation. For the years ended March 31, 2017 and 2016, we used March 31 as the measurement date.

We use standard actuarial methods and assumptions to account for our pension and other postretirement benefit plans. Pension and postretirement benefit obligations are actuarially calculated using management's best estimates of the rate used to discount the future estimated liability, the long-term rate of return on plan assets, and several assumptions related to the employee workforce (compensation increases, health care cost trend rates, expected service period, retirement age, and mortality). Pension and postretirement benefit expense includes the actuarially computed cost of benefits earned during the current service period, the interest cost on accrued obligations, the expected return on plan assets based on fair market value and the straight-line amortization of net actuarial gains and losses and adjustments due to plan amendments, curtailments, and settlements. Net actuarial gains and losses are amortized over periods of 15 years or less, which represent the group's average future service life of the employees or the group's average life expectancy. See Note 13 — Postretirement Benefit Plans for further discussion.

Noncontrolling Interests in Consolidated Affiliates

These financial statements reflect the application of ASC 810, *Consolidations* (ASC 810), which establishes accounting and reporting standards that require: (i) the ownership interest in subsidiaries held by parties other than the parent to be clearly identified and presented in the consolidated balance sheet within shareholder's (deficit) equity, but separate from the parent's (deficit) equity; (ii) the amount of consolidated net income attributable to the parent and the noncontrolling interest to be clearly identified and presented on the face of the consolidated statement of operations and (iii) changes in a parent's ownership interest while the parent retains its controlling financial interest in its subsidiary to be accounted for consistently.

Our consolidated financial statements include all assets, liabilities, revenues and expenses of less-than-100%-owned affiliates that we control or for which we are the primary beneficiary. We record a noncontrolling interest for the allocable portion of income or loss and comprehensive income or loss to which the noncontrolling interest holders are entitled based upon their ownership share of the affiliate. Distributions made to the holders of noncontrolling interests are charged to the respective noncontrolling interest balance.

Losses attributable to the noncontrolling interest in an affiliate may exceed our interest in the affiliate's equity. The excess, and any further losses attributable to the noncontrolling interest, shall be attributed to those interests. The noncontrolling interest shall continue to be attributed its share of losses even if that attribution results in a deficit noncontrolling interest balance. As of March 31, 2017 and 2016, we have no such losses.

Environmental Liabilities

We record accruals for environmental matters when it is probable that a liability has been incurred and the amount of the liability can be reasonably estimated, based on current law and existing technologies. We adjust these accruals periodically as assessment and remediation efforts progress or as additional technical or legal information becomes available. Accruals for environmental liabilities are stated at undiscounted amounts. Environmental liabilities are included in our consolidated balance sheets in "Accrued expenses and other current liabilities" and "Other long-term liabilities," depending on their short- or long-term nature. Any receivables for related insurance or other third party recoveries for environmental liabilities are recorded when it is probable that a recovery will be realized and are included in our consolidated balance sheets in "Prepaid expenses and other current assets."

Costs related to environmental matters are charged to expense. Estimated future incremental operations, maintenance and management costs directly related to remediation are accrued in the period in which such costs are determined to be probable and estimable. See Note 20 — Commitments and Contingencies for further discussion.

Litigation Contingencies

We accrue for loss contingencies associated with outstanding litigation, claims and assessments for which management has determined it is probable that a loss contingency exists and the amount of loss can be reasonably estimated. We expense professional fees associated with litigation claims and assessments as incurred. See Note 20 — Commitments and Contingencies for further discussion.

Income Taxes

We account for income taxes using the asset and liability method. This approach recognizes the amount of income taxes payable or refundable for the current year, as well as deferred tax assets and liabilities for the future tax consequence of events recognized in the consolidated financial statements and income tax returns. Deferred income tax assets and liabilities are adjusted to recognize the effects of changes in tax laws or enacted tax rates. Under ASC 740 *Income Taxes*, (ASC 740) a valuation allowance is required when it is more likely than not that some portion of the deferred tax assets will not be realized. Realization is dependent on generating sufficient taxable income through various sources.

We record tax benefits related to uncertain tax positions taken or expected to be taken on a tax return when such benefits meet a more than likely than not threshold. Otherwise, these tax benefits are recorded when a tax position has been effectively settled, the statute of limitation has expired or the appropriate taxing authority has completed their examination. Interest and penalties related to uncertain tax positions are recognized as part of the provision for income taxes and are accrued beginning in the period that such interest and penalties would be applicable under relevant tax law until such time that the related tax benefits are recognized. See Note 19 — Income Taxes for further discussion.

Share-Based Compensation

In accordance with ASC 718, *Compensation — Stock Compensation* (ASC 718), we recognize compensation expense for a share-based award over an employee's requisite service period based on the award's grant date fair value, subject to adjustment. Our share-based awards are settled in cash and are accounted for as liability based awards. As such, liabilities for awards under these plans are required to be measured at fair value at each reporting date until the date of settlement. See Note 12 — Share-Based Compensation for further discussion.

Foreign Currency Translation

The assets and liabilities of foreign operations, whose functional currency is other than the U.S. dollar (located in Europe and Asia), are translated to U.S. dollars at the period end exchange rates and revenues and expenses are translated at average exchange rates for the period. Differences arising from this translation are included in the currency translation adjustment (CTA) component of AOCI and Noncontrolling Interest. If there is a planned or completed sale or liquidation of our ownership in a foreign operation, the relevant CTA is recognized in our consolidated statement of operations.

For all operations, the monetary items denominated in currencies other than the functional currency are remeasured at period-end exchange rates and transaction gains and losses are included in "Other (income) expense, net" in our consolidated statements of operations. Non-monetary items are remeasured at historical rates.

Recently Adopted Accounting Standards

Effective for the first quarter of fiscal 2017, we early adopted FASB ASU 2016-05, *Effect of Derivative Contract Novations on Existing Hedge Accounting Relationships*, which addresses a lack of guidance in existing US GAAP related to the impact of derivative contract novations on existing hedge accounting relationships under Accounting Standards Codification Topic 815, *Derivatives and Hedging* (ASC 815). The new guidance clarifies that a change in one of the parties (a novation) to a derivative contract that is part of an existing hedge accounting relationship under ASC 815 does not, in and of itself, require a de-designation of that hedge accounting relationship. The impact of the adoption will prospectively allow hedge accounting treatment to continue on existing hedges when a novation event occurs. There was no impact upon adoption.

Effective for the first quarter of fiscal 2017, we adopted the FASB ASU 2015-11, *Inventory (Topic 330): Simplifying the Measurement of Inventory*, which removes the requirement to measure inventory at the lower of cost or market whereas market could be replacement cost, net realizable value, or net realizable value less an approximately normal profit margin, and requires an entity to measure inventory at the lower of cost or net realizable value. There was no impact upon adoption.

Effective for fiscal year 2017, we adopted FASB ASU 2015-07, *Fair Value Measurement (Topic 820): Disclosures for Investments in Certain Entities That Calculate Net Asset Value per Share (or Its Equivalent)*, which remove the requirement to categorize within the fair value hierarchy all investments for which fair value is measured using the net asset value per share practical expedient. We applied the amendments retrospectively to all periods presented in our postretirement benefit plans footnote disclosure on Form 10-K for the year ended March 31, 2017.

Effective for the first quarter of fiscal 2017, we adopted FASB ASU 2015-03, *Interest - Imputation of Interest (Subtopic 835-30): Simplifying the Presentation of Debt Issuance Costs*, which requires the debt issuance costs related to a recognized debt liability be presented in the balance sheet as a direct deduction from the carrying amount of that debt liability, consistent with debt discounts. The recognition and measurement guidance for debt issuance costs are not affected by the amendments in this update. In August 2015, the FASB issued ASU 2015-15, a clarifying amendment, allowing for debt issuance costs related to lines of credit being presented as an asset and subsequently amortizing the deferred debt issuance costs ratably over the term of the line of credit arrangement, regardless of whether there are any outstanding borrowings on the line of credit arrangement. The impact of the adoption was a decrease in "Other long-term assets" and "Long-term debt, net of current portion" in the consolidated balance sheets as of March 31, 2016 of \$30 million. We made the policy election to continue to present debt issuance costs related to lines of credit as an asset.

Effective for the first quarter fiscal 2017, we adopted FASB ASU 2015-02, *Consolidations (Topic 810): Amendments to the Consolidations Analysis*. The amendment (i) modifies the evaluation of whether limited partnerships and similar legal entities are variable interest entities or voting interest entities, (ii) eliminates the presumption that a general partner should consolidate a limited partnership, (iii) affects the consolidation analysis of reporting entities that are involved with variable interest entities, particularly those that have fee arrangements and related party relationships, and (iv) provides a scope exception from consolidation guidance for reporting entities with interests in legal entities that are required to comply with or operate in accordance with requirements that are similar to those in Rule 2a-7 of the Investment Company Act of 1940 for registered money market funds. There was no impact upon adoption.

Recently Issued Accounting Standards

In March 2017, the FASB issued ASU 2017-07, *Improving the Presentation of Net Periodic Pension Cost and Net Periodic Postretirement Benefit Cost*. This update was issued primarily to improve the presentation of net periodic pension cost and net periodic postretirement benefit cost. The new guidance requires entities to (1) disaggregate the current-service-cost component from the other components of net benefit cost (the "other components") and present it with other current compensation costs for related employees in the results of operations and (2) present the other components elsewhere in the results of operations and outside of income from operations if that subtotal is presented. In addition, the new guidance requires entities to disclose the results of operations line items that contain the other components if they are not presented on appropriately described separate lines. The guidance is effective for public business entities for interim and annual periods beginning after December 15, 2017. Early adoption is permitted. Adoption of this standard is not expected to have an impact on our consolidated results of operations.

In February 2017, the FASB issued ASU 2017-06, *Plan Accounting: Defined Benefit Pension Plans (Topic 960), Defined Contribution Pension Plans (Topic 962), Health and Welfare Benefit Plans (Topic 965), Employee Benefit Plan Master Trust Reporting ("ASU 2017-06")*. This update primarily impacted the reporting by an employee benefit plan (a plan) for its interest in a master trust. The amendments in this update require all plans to disclose (1) their master trust's other asset and liability balances and (2) the dollar amount of the plan's interest in each of those balances. The amendments in this update are effective for fiscal years beginning after December 15, 2018. Early adoption is permitted. Adoption of this standard is not expected to have an impact on our consolidated financial position or results of operations.

In February 2017, the FASB issued ASU 2017-05, *Other Income-Gains and Losses from the Derecognition of Non-financial Assets (Subtopic 610-20): Clarifying the Scope of Asset Derecognition Guidance and Accounting for Partial Sales of Non-financial Assets*. The amendments in this update include (i) clarification that non-financial assets within the scope of ASC 610-20 may include non-financial assets transferred within a legal entity to a counterparty; (ii) clarification that an entity should allocate consideration to each distinct asset by applying the guidance in ASC 606 on allocating the transaction price to performance obligations; and (iii) a requirement for entities to derecognize a distinct non-financial asset or distinct in substance non-financial asset in a partial sale transaction when it does not have (or ceases to have) a controlling financial interest in the legal entity that holds the asset in accordance with ASC 810, and transfers control of the asset in accordance with ASC 606. The guidance is effective for annual periods beginning after December 15, 2017, and interim periods within those annual periods. Early adoption is permitted. Adoption of this standard is expected to have an immaterial impact on our consolidated financial position and results of operations.

In January 2017, the FASB issued ASU 2017-04, *Intangibles-Goodwill and Other (Topic 350): Simplifying the Test for Goodwill Impairment, accounting guidance*, which removes Step 2 from the goodwill impairment test. As amended, the goodwill impairment test will consist of one step comparing the fair value of a reporting unit with its carrying amount. Under the simplified model, a goodwill impairment is calculated as the difference between the carrying amount of the reporting unit and its fair value, but not to exceed the carrying amount of goodwill allocated to that reporting unit. Early adoption is permitted. The guidance is effective for public business entities for interim and annual periods beginning after its annual or interim goodwill impairment tests in fiscal years beginning after December 15, 2019. We are currently evaluating the impact of this standard and we do not expect the adoption of this standard will have an impact on our consolidated financial position and results of operations.

In January 2017, the FASB issued ASU 2017-01, *Clarifying the Definition of a Business (Topic 805)*, which provides guidance on evaluating whether transactions should be accounted for as acquisitions (or disposals) of assets or businesses. The definition of a business affects many areas of accounting including acquisitions, disposals, goodwill, and consolidation. The new guidance amends ASC 805 to provide a more robust framework to use in determining when a set of assets and activities is a business. In addition, the amendments provide more consistency in applying the guidance, reduce the costs of application, and make the definition of a business more operable. The guidance is effective for annual periods beginning after December

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15, 2017, and interim periods within those annual periods. Early adoption is permitted. Adoption of this standard is not expected to have a current impact on our consolidated financial statements.

In November 2016, the FASB issued ASU 2016-18, *Statement of Cash Flows (Topic 230) - Statement of Cash Flows (Topic 230): Restricted Cash*. The amendments in this update apply to all entities that have restricted cash or restricted cash equivalents and are required to present a statement of cash flows under Topic 230. The amendments in this Update require that a statement of cash flows explain the change during the period in the total of cash, cash equivalents, and amounts generally described as restricted cash or restricted cash equivalents. The guidance is effective for annual periods beginning after December 15, 2017, and interim periods within those annual periods. Early adoption is permitted. We are currently evaluating the impact of this standard and we believe that the adoption of this standard will have an immaterial impact on our statement of cash flow.

In October 2016, the FASB issued ASU 2016-16, *Accounting for Income Taxes: Intra-Entity Asset Transfers of Assets Other than Inventory*. The new guidance eliminates the exception for all intra-entity sales of assets other than inventory. The guidance will require the tax effects of intercompany transactions to be recognized currently and will likely impact reporting entities' effective tax rates. The guidance is effective for annual periods beginning after December 15, 2017, and interim periods within those annual periods. Early adoption is permitted. We are currently evaluating the impact of this standard on our consolidated financial position and results of operations.

In August 2016, the FASB issued ASU 2016-15, *Statement of Cash Flows (Topic 230) - Classification of Certain Cash Receipts and Cash Payments*. The new guidance applies to all entities that are required to present a statement of cash flows under Topic 230 and addresses specific cash flow items to provide clarification and reduce the diversity in presentation of these items. The guidance is effective for annual periods beginning after December 15, 2017 and interim periods within that year. Early adoption is permitted. Adoption of this standard is not expected to have any impact on our consolidated financial position and results of operations as our current policies are aligned with this standard.

In February 2016, the FASB issued ASU 2016-02, *Leases (Topic 842)*, which when effective will require organizations that lease assets (e.g., through "leases") to recognize assets and liabilities for the rights and obligations created by the leases on balance sheet. A lessee will be required to recognize assets and liabilities for leases with terms that exceed twelve months. The standard will also require disclosures to help investors and financial statement users better understand the amount, timing and uncertainty of cash flows arising from leases. The disclosures include qualitative and quantitative requirements, providing additional information about the amounts recorded in the financial statements. The guidance is effective for annual periods beginning after December 15, 2018, and interim periods within those annual periods. Early adoption is permitted. We are currently evaluating the impact of this standard on our consolidated financial position and results of operations.

In May 2014, the FASB issued ASU 2014-09, *Revenue from Contracts with Customers (Topic 606)*, which, when effective, will supersede the guidance in former ASC 605, *Revenue Recognition*. The new guidance requires entities to recognize revenue based on the transfer of promised goods or services to customers in an amount that reflects the consideration to which the entity expects to be entitled in exchange for these goods or services. The guidance is effective for annual periods beginning after December 15, 2016 and interim periods within that year. Early adoption is not permitted. In August 2015, the FASB issued ASU 2015-14 *Revenue from Contracts with Customers (Topic 606): Deferral of Effective Date*, which provides an optional one-year deferral of the effective date. Subsequent to these amendments, further clarifying amendments have been issued. We are currently evaluating the impact of the standard on our consolidated financial position and results of operations. We have begun assessing our contracts and drafting policies to implement the new revenue standards and will be implementing this standard during the first quarter of FY 2019. We have not yet determined the impact of adopting the standard on our consolidated financial statements, nor have we determined whether we will utilize the full retrospective or modified retrospective approach.

2. RESTRUCTURING AND IMPAIRMENT

“Restructuring and impairment, net” for the year ended March 31, 2017 was \$10 million, which included impairment charges unrelated to restructuring actions of \$2 million on certain fixed assets in North America, South America, and Asia. “Restructuring and impairment, net” for the year ended March 31, 2016 was \$48 million, which included impairment charges unrelated to restructuring actions of \$3 million on certain fixed assets in North America, South America and Asia. “Restructuring and impairment, net” for the year ended March 31, 2015 was \$37 million, which included impairment charges unrelated to restructuring actions of \$2 million on certain non-core assets in North America.

The following table summarizes our restructuring liability activity and other impairment charges (in millions).

	Total restructuring liabilities	Other restructuring charges (A)	Total restructuring charges	Other impairments (B)	Total restructuring and impairments, net
Balance as of March 31, 2014	\$ 47				
Fiscal 2015 Activity:					
Expenses	30	\$ 5	\$ 35	\$ 2	\$ 37
Cash payments	(32)				
Foreign currency translation and other (C)	(13)				
Balance as of March 31, 2015	32				
Fiscal 2016 Activity:					
-Provisions	23				
-Reversal of expense	(2)				
Expenses	21	\$ 24	\$ 45	\$ 3	\$ 48
Cash payments	(22)				
Foreign currency translation and other (C)	(4)				
Balance as of March 31, 2016	27				
Fiscal 2017 Activity:					
Expenses	8	\$ —	\$ 8	\$ 2	\$ 10
Cash payments	(13)				
Foreign currency translation and other (C)	2				
Balance as of March 31, 2017	\$ 24				

(A) Other restructuring charges include period expenses that were not recorded through the restructuring liability and impairments related to a restructuring activity.

(B) Other impairment charges not related to a restructuring activity.

(C) This primarily relates to the remeasurement of Brazilian real denominated restructuring liabilities.

As of March 31, 2017, \$16 million of restructuring liabilities was classified as short-term and was included in "Accrued expenses and other current liabilities" and \$8 million was classified as long-term and was included in "Other long-term liabilities" on our consolidated balance sheet. Additionally, restructuring payments and the remaining liability for the Asia segment for the year ended March 31, 2017 was \$1 million which relates primarily to staff rationalization activities to better align operations to current needs.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

North America

The following table summarizes our restructuring activity for the North America segment by plan (in millions).

	Year Ended March 31,			Prior to April 1, 2014
	2017	2016	2015	
<i>Restructuring charges - North America</i>				
Saguenay Plant Closure:				
Severance	\$ —	\$ —	\$ —	\$ 5
Fixed asset impairment (A)	—	—	—	28
Other exit related costs	1	—	1	1
Period expenses (A)	—	1	—	4
Total restructuring charges - North America	\$ 1	\$ 1	\$ 1	\$ 38
<i>Restructuring payments - North America</i>				
Severance	\$ —	\$ —	\$ (2)	
Other	—	(1)	(1)	
Total restructuring payments - North America	\$ —	\$ (1)	\$ (3)	

(A) These charges were not recorded through the restructuring liability.

In fiscal 2012, we closed our Saguenay Works facility in Canada and relocated our North America research and development operations to a new global research and technology facility in Kennesaw, Georgia. As of March 31, 2017, the outstanding restructuring liability for the North America segment was \$1 million, which related to environmental charges.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Europe

The following table summarizes our restructuring activity for the Europe segment by plan (in millions).

	Year Ended March 31,			Prior to April 1, 2014
	2017	2016	2015	
<i>Restructuring charges - Europe</i>				
<i>Business optimization</i>				
Severance	\$ —	\$ —	\$ 3	\$ 42
Pension settlement loss (A)	—	—	—	1
<i>Corporate restructuring program</i>				
Severance	2	4	—	—
Total restructuring charges - Europe	\$ 2	\$ 4	\$ 3	\$ 43
<i>Restructuring payments - Europe</i>				
Severance	\$ (4)	\$ (6)	\$ (12)	
Other	—	—	—	
Total restructuring payments - Europe	\$ (4)	\$ (6)	\$ (12)	

(A) These charges were not recorded through the restructuring liability.

The Company implemented a series of restructuring actions at the global headquarters office and in the Europe region which include staff rationalization activities and the shutdown of facilities to optimize our business in Europe.

As of March 31, 2017, the outstanding restructuring liability for the Europe segment was \$2 million, which relates to severance charges.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

South America

The following table summarizes our restructuring activity for the South America segment by plan (in millions).

	Year Ended March 31,			Prior to April 1, 2014
	2017	2016	2015	
<i>Restructuring charges - South America</i>				
<i>Ouro Preto closures</i>				
Severance	\$ 1	\$ 2	\$ 14	\$ 5
Asset impairments (A)	—	—	5	1
Environmental (reversal) charges	—	(1)	6	16
Contract termination and other exit related costs	2	2	5	6
<i>Other South America restructuring programs</i>				
Severance	2	—	—	—
<i>Other past restructuring programs</i>				
Severance	—	—	—	7
Asset impairments (A)	—	—	—	7
Contract termination and other exit related costs	—	—	1	6
Total restructuring charges - South America	\$ 5	\$ 3	\$ 31	\$ 48
<i>Restructuring payments - South America</i>				
Severance	\$ (2)	\$ (2)	\$ (12)	
Other	(5)	(3)	(4)	
Total restructuring payments - South America	\$ (7)	\$ (5)	\$ (16)	

(A) These charges were not recorded through the restructuring liability.

We ceased operations at the smelter in Ouro Preto, Brazil, in December 2014. This decision was made in an effort to further align our global sustainability strategy, and exit non-core operations. Certain charges associated with this closure are reflected within the "Ouro Preto closures" section above, along with our closure of a pot line in Ouro Preto, Brazil, in fiscal 2013.

In fiscal 2017, the Company implemented additional restructuring actions in South America which include staff rationalization activities to optimize our business in South America.

As of March 31, 2017, the outstanding restructuring liability for the South America segment was \$19 million and relates to \$12 million of environmental charges, and \$7 million of contract termination and other exit related costs.

For additional information on environmental charges see Note 20 — Commitments and Contingencies.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Corporate

The following table summarizes our restructuring activity for the Corporate segment by plan (in millions).

	Year Ended March 31			Prior to April 1, 2014
	2017	2016	2015	
<i>Restructuring charges - Corporate</i>				
Severance	\$ —	\$ 12	\$ —	\$ —
Asset impairments (A)	—	21	—	—
Period expenses (A)	—	2	—	—
Total restructuring charges - Corporate	—	35	—	—
<i>Restructuring payments - Corporate</i>				
Severance	(1)	(10)	—	—
Total restructuring payments - Corporate	\$ (1)	\$ (10)	\$ —	—

(A) These charges were not recorded through the restructuring liability and related to the partial impairment of certain capitalized software intangible assets that will no longer be developed.

In fiscal 2016, the Company implemented a series of restructuring actions at the global headquarters office and in the Europe region to better align the organizational structure and corporate staffing levels with strategic priorities. As part of this plan, the Company impaired certain capitalized software assets. As of March 31, 2017, the restructuring liability for the corporate office was \$1 million and related to severance charges.

3. ACCOUNTS RECEIVABLE

“Accounts receivable, net” consists of the following (in millions).

	March 31,	
	2017	2016
Trade accounts receivable	\$ 971	\$ 884
Other accounts receivable	102	75
Accounts receivable — third parties	1,073	959
Allowance for doubtful accounts — third parties	(6)	(3)
Accounts receivable, net — third parties	\$ 1,067	\$ 956
Accounts receivable, net — related parties	\$ 60	\$ 59

Allowance for Doubtful Accounts

As of March 31, 2017 and 2016, our allowance for doubtful accounts represented approximately 0.6% and 0.3%, respectively, of gross accounts receivable.

Activity in the allowance for doubtful accounts is as follows (in millions).

	Balance at Beginning of Period	Additions Charged to Expense	Accounts Recovered/ (Written- Off)	Foreign Exchange and Other	Balance at End of Period
Year Ended March 31, 2017	\$ 3	\$ 3	\$ —	\$ —	\$ 6
Year Ended March 31, 2016	\$ 3	\$ —	\$ —	\$ —	\$ 3
Year Ended March 31, 2015	\$ 4	\$ —	\$ —	\$ (1)	\$ 3

Factoring of Trade Receivables

We factor and forfeit trade receivables (collectively, we refer to these as "factoring" programs) based on local cash needs, as well as attempting to balance the timing of cash flows of trade payables and receivables, fund strategic investments, and fund other business needs. Factored invoices are not included in our consolidated balance sheets when we do not retain a financial or legal interest. If a financial or legal interest is retained, we classify these factorings as secured borrowings.

The following tables summarize amounts relating to our factoring activities (in millions).

	Year Ended March 31,		
	2017	2016	2015
Aggregated receivables factored	\$ 5,149	\$ 3,314	\$ 1,796
Factoring expense	\$ 16	\$ 19	\$ 10
	March 31,		
	2017	2016	
Factored receivables outstanding	\$ 679	\$ 626	

4. INVENTORIES

“Inventories” consists of the following (in millions).

	March 31,	
	2017	2016
Finished goods	\$ 389	\$ 295
Work in process	576	416
Raw materials	213	322
Supplies	155	147
Inventories	<u>\$ 1,333</u>	<u>\$ 1,180</u>

5. ASSETS HELD FOR SALE

We are focused on capturing the global growth we see in our product markets of beverage can, automotive and specialty products. We continually analyze our product portfolio to ensure we are focused on growing in attractive market segments. The following transactions relate to exiting certain non-core operations to focus on our growth strategy in the premium product markets.

We made the decision to sell two hydroelectric power generation facilities in South America with a net book value of \$4 million as of March 31, 2016, which were classified as "Assets held for sale" in our consolidated balance sheet. During the year ended March 31, 2017, we recorded a \$1 million gain from our sale of one hydroelectric power generation facility. The remaining hydroelectric power generation assets have a net book value of \$3 million as of March 31, 2017 and continue to be reflected as "Assets held for sale" pending the resolution of certain operating license issues. Additionally, during the fourth quarter of fiscal 2016, an impairment of \$1 million was recorded due to the expiration of a license related to a portion of the hydroelectric power generation facilities.

In March 2016, we made a decision to sell properties in Ouro Preto, Brazil related to the closure of the Ouro Preto smelter facility in South America with a net book value of \$1 million as of March 31, 2016, which were classified as "Assets held for sale" in our consolidated balance sheet. "Gain on assets held for sale" during the year ended March 31, 2017 includes a \$1 million gain from the sale of these assets.

During the year ended March 31, 2015, "Gain on assets held for sale" includes a \$23 million gain from our sale of the joint venture of Consorcio Candonga, \$7 million from the sale of our consumer foil operations in North America and \$6 million for a property and mining rights sale in South America. These gains were partially offset during the twelve months ended March 31, 2015 by an estimated loss of \$14 million related to the sale of certain hydroelectric assets that was completed in the fourth quarter of fiscal 2015.

6. PROPERTY, PLANT AND EQUIPMENT

“Property, plant and equipment, net” consists of the following (in millions).

	March 31,	
	2017	2016
Land and property rights	\$ 173	\$ 179
Buildings	1,309	1,325
Machinery and equipment	4,312	4,265
	5,794	5,769
Accumulated depreciation and amortization	(2,575)	(2,398)
	3,219	3,371
Construction in progress	138	135
Property, plant and equipment, net	\$ 3,357	\$ 3,506

As of March 31, 2017 and 2016, there were \$1 billion of fully depreciated assets included in our consolidated balance sheets.

For the years ended March 31, 2017, 2016 and 2015, we capitalized \$2 million, \$14 million and \$20 million of interest related to construction of property, plant and equipment and intangibles under development, respectively. Depreciation expense related to property, plant, and equipment, net is shown in the table below (in millions).

	Year Ended March 31,		
	2017	2016	2015
Depreciation expense related to property, plant and equipment, net	\$ 299	\$ 294	\$ 294

Asset impairments

Impairment charges are recorded in "Restructuring and impairment, net." See Note 2 — Restructuring and impairment for additional information.

Leases

We lease certain land, buildings and equipment under non-cancelable operating leases expiring at various dates, and we lease assets in Sierre, Switzerland, including a fifteen-year capital lease through December 2019 from Constellium. Operating leases generally have five to ten-year terms, with one or more renewal options, with terms to be negotiated at the time of renewal. Various facility leases include provisions for rent escalation to recognize increased operating costs or require us to pay certain maintenance and utility costs. During fiscal 2014 through 2016 we entered into various capital lease arrangements to upgrade and expand our information technology infrastructure.

The following table summarizes rent expense included in our consolidated statements of operations (in millions):

	Year Ended March 31,		
	2017	2016	2015
Rent expense	\$ 24	\$ 22	\$ 22

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Future minimum lease payments as of March 31, 2017, for our operating and capital leases having an initial or remaining non-cancelable lease term in excess of one year are as follows (in millions).

Year Ending March 31,	Operating leases	Capital lease obligations
2018	\$ 30	\$ 9
2019	21	7
2020	18	5
2021	15	—
2022	11	—
Thereafter	33	—
Total minimum lease payments	<u>\$ 128</u>	<u>\$ 21</u>
Less: interest portion on capital lease		2
Principal obligation on capital leases		<u>\$ 19</u>

Assets and related accumulated amortization under capital lease obligations as of March 31, 2017 and 2016 are as follows (in millions).

	March 31,	
	2017	2016
Assets under capital lease obligations:		
Buildings	\$ 11	\$ 11
Machinery and equipment	73	77
CWIP	2	—
	<u>86</u>	<u>88</u>
Accumulated amortization	(70)	(70)
	<u>\$ 16</u>	<u>\$ 18</u>

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

7. GOODWILL AND INTANGIBLE ASSETS

There were no changes to the gross carrying amount or accumulated impairment of goodwill during the years ended March 31, 2017 and 2016. The following table summarizes “Goodwill” (in millions) for the years ended March 31, 2017 and 2016.

	March 31, 2017			March 31, 2016		
	Gross Carrying Amount	Accumulated Impairment	Net Carrying Value	Gross Carrying Amount	Accumulated Impairment	Net Carrying Value
North America	\$ 1,145	\$ (860)	\$ 285	\$ 1,145	\$ (860)	\$ 285
Europe	511	(330)	181	511	(330)	181
South America	291	(150)	141	291	(150)	141
	\$ 1,947	\$ (1,340)	\$ 607	\$ 1,947	\$ (1,340)	\$ 607

The components of “Intangible assets, net” are as follows (in millions).

	March 31, 2017			March 31, 2016			
	Weighted Average Life	Gross Carrying Amount	Accumulated Amortization	Net Carrying Amount	Gross Carrying Amount	Accumulated Amortization	Net Carrying Amount
Tradenames	20 years	\$ 142	\$ (70)	\$ 72	\$ 142	\$ (63)	\$ 79
Technology and software	10.4 years	369	(209)	160	365	(179)	186
Customer-related intangible assets	20 years	443	(218)	225	449	(199)	250
Favorable energy supply contract	9.5 years	—	—	—	124	(116)	8
	16.3 years	\$ 954	\$ (497)	\$ 457	\$ 1,080	\$ (557)	\$ 523

In the year ended March 31, 2016, we recorded impairment charges related to certain capitalized software. In the year of March 31, 2017, there were no such impairments recorded. For additional information refer to Note 2 — Restructuring and impairment.

Our favorable energy supply contract is amortized over its estimated useful life using a method that reflects the pattern in which the economic benefits are expected to be consumed. The contract was fully amortized and matured in January 2017. All other intangible assets are amortized using the straight-line method.

Amortization expense related to “Intangible assets, net” is as follows (in millions).

	Year Ended March 31,		
	2017	2016	2015
Total amortization expense related to intangible assets	\$ 69	\$ 71	\$ 70
Less: Amortization expense related to intangible assets included in “Cost of goods sold (exclusive of depreciation and amortization)” (A)	(8)	(12)	(12)
Amortization expense related to intangible assets included in “Depreciation and amortization”	\$ 61	\$ 59	\$ 58

(A) Relates to amortization of favorable energy supply contract.

Estimated total amortization expense related to “Intangible assets, net” for each of the five succeeding fiscal years is as follows (in millions). Actual amounts may differ from these estimates due to such factors as customer turnover, raw material consumption patterns, impairments, additional intangible asset acquisitions and other events.

Fiscal Year Ending March 31,	
2018	\$ 65
2019	65
2020	65
2021	65
2022	46

8. CONSOLIDATION

Variable Interest Entities (VIE)

The entity that has a controlling financial interest in a VIE is referred to as the primary beneficiary and consolidates the VIE. An entity is deemed to have a controlling financial interest and is the primary beneficiary of a VIE if it has both the power to direct the activities of the VIE that most significantly impact the VIE's economic performance and an obligation to absorb losses or the right to receive benefits that could potentially be significant to the VIE.

We have a joint interest in Logan Aluminum Inc. (Logan) with Tri-Arrows Aluminum Inc. (Tri-Arrows). Logan processes metal received from Novelis and Tri-Arrows and charges the respective partner a fee to cover expenses. Logan is thinly capitalized and relies on the regular reimbursement of costs and expenses by Novelis and Tri-Arrows to fund its operations. This reimbursement is considered a variable interest as it constitutes a form of financing of the activities of Logan. Other than these contractually required reimbursements, we do not provide other material support to Logan. Logan's creditors do not have recourse to our general credit.

We have the ability to make decisions regarding Logan's production operations. We also have the ability to take the majority share of production and associated costs. These facts qualify us as Logan's primary beneficiary and this entity is consolidated for all periods presented. All significant intercompany transactions and balances have been eliminated.

The following table summarizes the carrying value and classification of assets and liabilities owned by the Logan joint venture and consolidated in our consolidated balance sheets (in millions). There are significant other assets used in the operations of Logan that are not part of the joint venture, as they are directly owned and consolidated by Novelis or Tri-Arrows.

	March 31,	
	2017	2016
Assets		
Current assets		
Cash and cash equivalents	\$ 2	\$ 3
Accounts receivable	29	33
Inventories	62	61
Prepaid expenses and other current assets	2	2
Total current assets	95	99
Property, plant and equipment, net	25	21
Goodwill	12	12
Deferred income taxes	89	84
Other long-term assets	30	8
Total assets	\$ 251	\$ 224
Liabilities		
Current liabilities		
Accounts payable	\$ 32	\$ 30
Accrued expenses and other current liabilities	21	15
Total current liabilities	53	45
Accrued postretirement benefits	224	214
Other long-term liabilities	3	3
Total liabilities	\$ 280	\$ 262

9. INVESTMENT IN AND ADVANCES TO NON-CONSOLIDATED AFFILIATES AND RELATED PARTY TRANSACTIONS

Investments in and Advances to Non-Consolidated Affiliates

The following table summarizes the ownership structure and our ownership percentage of the non-consolidated affiliate in which we have an investment as of March 31, 2017 and 2016, and which we account for using the equity method. We do not control our non-consolidated affiliate, but have the ability to exercise significant influence over the operating and financial policies. We have no material investments that we account for using the cost method.

Affiliate Name	Ownership Structure	Ownership Percentage
Aluminium Norf GmbH (Alunorf)	Corporation	50%

The following table summarizes the assets, liabilities and equity of our equity method affiliate in the aggregate as of March 31, 2017 and 2016 (in millions).

	March 31,	
	2017	2016
Assets:		
Current assets	\$ 143	\$ 148
Non-current assets	355	394
Total assets	\$ 498	\$ 542
Liabilities:		
Current liabilities	\$ 53	\$ 55
Non-current liabilities	283	337
Total liabilities	336	392
Equity:		
Total equity	162	150
Total liabilities and equity	\$ 498	\$ 542

As of March 31, 2017, the investment in Alunorf exceeded our proportionate share of the net assets of Alunorf by \$370 million. The difference is primarily related to the unamortized fair value adjustments that are included in our investment balance as a result of the acquisition of Novelis by Hindalco in 2007.

The following table summarizes the results of operations of our equity method affiliates in the aggregate for the years ending March 31, 2017, 2016 and 2015; and the nature and amounts of significant transactions that we had with our non-consolidated affiliates (in millions). The amounts in the table below are disclosed at 100% of the operating results of these affiliates.

	Year Ended March 31,		
	2017	2016	2015
Net sales	\$ 447	\$ 464	\$ 524
Costs and expenses related to net sales	463	463	527
(Benefit) provision for taxes on income	(5)	2	—
Net loss	\$ (11)	\$ (1)	\$ (3)
Purchase of tolling services from Alunorf	\$ 224	\$ 232	\$ 261

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Included in the accompanying consolidated financial statements are transactions and balances arising from business we conduct with Alunorf, which we classify as related party transactions and balances. The following table describes the period-end account balances that we had with Norf, shown as related party balances in the accompanying consolidated balance sheets (in millions). We had no other material related party balances with non-consolidated affiliates.

	March 31,	
	2017	2016
Accounts receivable-related parties	\$ 60	\$ 59
Other long-term assets-related parties	\$ 15	\$ 16
Accounts payable-related parties	\$ 51	\$ 48

We earned less than \$1 million of interest income on a loan due from Alunorf during each of the years presented in "Other long-term assets-related parties" in the table above. We believe collection of the full receivable from Alunorf is probable; thus no allowance for loan loss was provided for this loan as of March 31, 2017 and 2016.

We have guaranteed the indebtedness for a credit facility and loan on behalf of Alunorf. The guarantee is limited to 50% of the outstanding debt, not to exceed 6 million euros. As of March 31, 2017, there were no amounts outstanding under our guarantee with Alunorf. We have also guaranteed the payment of early retirement benefits on behalf of Alunorf. As of March 31, 2017, this guarantee totaled \$2 million.

Transactions with Hindalco and AV Metals Inc.

We occasionally have related party transactions with our indirect parent company, Hindalco. During the years ended March 31, 2017, 2016 and 2015 we recorded "Net sales" of less than \$1 million, less than \$1 million and \$1 million, respectively, between Novelis and our indirect parent related primarily to sales of equipment and other services. As of March 31, 2017 and 2016 there were less than \$1 million of "Accounts receivable, net - related parties" outstanding related to transactions with Hindalco.

During the year ended March 31, 2017, Novelis purchased \$3 million in raw materials from Hindalco that were fully paid for during the quarter ended December 31, 2016. During the year ended March 31, 2016, Novelis purchased \$5 million in raw materials from Hindalco that were fully paid for during the quarter ended December 31, 2015. We also loaned \$3 million to a subsidiary of our parent, which was repaid during the quarter ended March 31, 2017.

In March 2014, we declared a return of capital to our direct shareholder, AV Metals Inc., in the amount of \$250 million, which we subsequently paid on April 30, 2014.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

10. ACCRUED EXPENSES AND OTHER CURRENT LIABILITIES

“Accrued expenses and other current liabilities” consists of the following (in millions).

	<u>March 31,</u>	
	<u>2017</u>	<u>2016</u>
Accrued compensation and benefits	\$ 191	\$ 174
Accrued interest payable	60	66
Accrued income taxes	28	13
Other current liabilities	275	316
Accrued expenses and other current liabilities — third parties	<u>\$ 554</u>	<u>\$ 569</u>

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

11. DEBT

Debt consists of the following (in millions).

	March 31, 2017				March 31, 2016			
	Interest Rates (A)	Principal	Unamortized Carrying Value Adjustments	Carrying Value	Principal	Unamortized Carrying Value Adjustments	Carrying Value	
Third party debt:								
Short term borrowings	2.92%	\$ 294	\$ —	\$ 294	\$ 579	\$ —	\$ 579	
Novelis Inc.								
Floating rate Term Loan Facility, due June 2022	3.00%	1,796	(53) (B)	1,743	1,787	(25) (B)	1,762	
8.375% Senior Notes, due December 2017	8.375%	—	—	—	1,100	(6)	1,094	
8.75% Senior Notes, due December 2020	8.75%	—	—	—	1,400	(15)	1,385	
Capital lease obligations, due through July 2017	3.64%	2	—	2	5	—	5	
Novelis Corporation								
5.875% Senior Notes, due September 2026	5.875%	1,500	(23) (B)	1,477	—	—	—	
6.25% Senior Notes, due August 2024	6.25%	1,150	(19) (B)	1,131	—	—	—	
Novelis Korea Limited								
Bank loans, due through September 2020 (KRW 205 billion)	2.62%	184	—	184	195	—	195	
Novelis Switzerland S.A.								
Capital lease obligation, due through December 2019 (Swiss francs (CHF) 17 million)	7.50%	17	(1) (B)	16	23	(1) (B)	22	
Novelis do Brasil Ltda.								
BNDES loans, due through April 2021 (BRL 14 million)	5.90%	4	—	4	5	(1) (B)	4	
Other								
Other debt, due through December 2020	5.01%	1	—	1	1	—	1	
Total debt		4,948	(96)	4,852	5,095	(48)	5,047	
Less: Short term borrowings		(294)	—	(294)	(579)	—	(579)	
Current portion of long-term debt		(121)	—	(121)	(47)	—	(47)	
Long-term debt, net of current portion:		<u>\$ 4,533</u>	<u>\$ (96)</u>	<u>\$ 4,437</u>	<u>\$ 4,469</u>	<u>\$ (48)</u>	<u>\$ 4,421</u>	

(A) Interest rates are the stated rates of interest on the debt instrument (not the effective interest rate) as of March 31, 2017, and therefore, exclude the effects of related interest rate swaps and accretion/amortization of fair value adjustments as a result of purchase accounting in connection with Hindalco's purchase of Novelis and accretion/amortization of debt issuance costs related to refinancing transactions and additional borrowings. We present stated rates of interest because they reflect the rate at which cash will be paid for future debt service.

(B) Amounts include unamortized debt issuance costs and debt discounts.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Principal repayment requirements for our total debt over the next five years and thereafter using exchange rates as of March 31, 2017 for our debt denominated in foreign currencies) are as follows (in millions).

As of March 31, 2017	Amount
Short-term borrowings and Current portion of long term debt due within one year	\$ 415
2 years	103
3 years	36
4 years	21
5 years	18
Thereafter	4,355
Total	\$ 4,948

Senior Secured Credit Facilities

As of March 31, 2017, the senior secured credit facilities consisted of (i) a \$1.8 billion five-year secured term loan credit facility (Term Loan Facility) and (ii) a \$1.0 billion five-year asset based loan facility (ABL Revolver). As of March 31, 2017, \$18 million of the Term Loan Facility is due within one year.

In June 2015, we entered into a \$200 million secured lien revolving loan facility (the Subordinated Lien Revolver) with a maturity date of September 10, 2016. In June 2016, we amended the Subordinated Lien Revolver to downsize the facility to \$150 million and extend the maturity date to October 30, 2016. The Subordinated Lien Revolver was subsequently extinguished in July 2016.

In January 2017, we entered into a new Term Loan Facility. The Agreement provided Novelis with \$1.8 billion, and the proceeds were used to extinguish the existing Term Loan agreement originally maturing on June 2, 2022. We incurred lender fees and debt issuance costs of \$56 million on the new Term Loan Facility which were capitalized and will be amortized as an increase to "Interest expense and amortization of debt issuance costs" over the term of this instrument, of which we paid \$52 million. Additionally, we recorded "Loss on extinguishment of debt" of \$22 million in the fourth quarter of fiscal 2017 related to this financing transaction.

The Term Loan Facility matures on June 2, 2022, subject to 0.25% quarterly amortization payments. The loans under the Term Loan Facility accrue interest at LIBOR plus 1.85%. The Term Loan Facility also requires customary mandatory prepayments with excess cash flow, asset sale and condemnation proceeds and proceeds of prohibited indebtedness, all subject to customary exceptions. The Term Loan may be prepaid, in full or in part, at any time at the Company's election without penalty or premium; provided that any optional prepayment in connection with a repricing amendment or refinancing through the issuance of lower priced debt made within six-months after the earlier of (i) completion of the initial syndication of the Term Loan and (ii) April 13, 2017, will be subject to a 1.00% prepayment premium. The Term Loan Facility allows for additional term loans to be issued in an amount not to exceed \$300 million (or its equivalent in other currencies) plus an unlimited amount if, after giving effect to such incurrence on a pro forma basis, the senior secured net leverage ratio does not exceed 3.00 to 1.00. The lenders under the Term Loan Facility have not committed to provide any such additional term loans.

In October 2014, we amended and extended our ABL Revolver by entering into a \$1.2 billion, five-year, senior secured ABL Revolver bearing an interest rate of LIBOR plus a spread of 1.50% to 2.00% plus a prime spread of 0.50% to 1.00% based on excess availability. In fiscal 2017, we elected to reduce the capacity of the ABL Revolver to \$1.0 billion. The ABL Revolver has a provision that allows the facility to be increased by an additional \$500 million. The ABL Revolver has various customary covenants including maintaining a minimum fixed charge coverage ratio of 1.25 to 1 if excess availability is less than the greater of (1) \$110 million and (2) 12.5% of the lesser of (a) the maximum size of the ABL Revolver and (b) the borrowing base. The fixed charge coverage ratio will be equal to the ratio of (1) (a) ABL Revolver defined Earnings Before Interest, Taxes, Depreciation and Amortization ("EBITDA") less (b) maintenance capital expenditures less (c) cash taxes; to (2) (a) interest expense plus (b) scheduled principal payments plus (c) dividends to the Company's direct holding company to pay certain taxes, operating expenses and management fees and repurchases of equity interests from employees, officers and directors. The ABL Revolver matures on October 6, 2019; provided that, in the event that any of the Notes, the Term Loan Facility, or certain other indebtedness are outstanding (and not refinanced with a maturity date later than April 6, 2020) 90 days prior to their respective maturity dates, then the ABL Revolver will mature 90 days prior to the maturity date for the Notes, the Term Loan Facility or such other indebtedness, as applicable; unless excess availability under the ABL Revolver is at least (i) 25% of the lesser of (x) the total ABL Revolver commitment and (y) the then applicable borrowing base and (ii) 20% of the lesser of (x) the total ABL Revolver commitment and (y) the then applicable borrowing base, and a minimum fixed charged ratio test of at least 1.25 to 1 is met.

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The senior secured credit facilities contain various affirmative covenants, including covenants with respect to our financial statements, litigation and other reporting requirements, insurance, payment of taxes, employee benefits and (subject to certain limitations) causing new subsidiaries to pledge collateral and guaranty our obligations. The senior secured credit facilities also include various customary negative covenants and events of default, including limitations on our ability to (1) make certain restricted payments, (2) incur additional indebtedness, (3) sell certain assets, (4) enter into sale and leaseback transactions, (5) make investments, loans and advances, (6) pay dividends or returns of capital and distributions beyond certain amounts, (7) engage in mergers, amalgamations or consolidations, (8) engage in certain transactions with affiliates, and (9) prepay certain indebtedness. The Term Loan Credit Agreement also contains a financial maintenance covenant, prohibiting the Company's senior secured net leverage ratio as of the last day of each fiscal quarter period and measured on a rolling four quarter basis from exceeding 3.50 to 1.00, subject to customary equity cure rights. The senior secured credit facilities include a cross-default provision under which lenders could accelerate repayment of the loans if a payment or non-payment default arises under any other indebtedness with an aggregate principal amount of more than \$100 million (or, in the case of the Term Loan Facility, under the ABL Revolver regardless of the amount outstanding). Substantially all of our assets are pledged as collateral under the senior secured credit facilities.

Short-Term Borrowings

As of March 31, 2017, our short-term borrowings were \$294 million consisting of \$184 million of short-term loans under our ABL Revolver, \$50 million in Novelis Brazil loans, and \$59 million in Novelis China loans (CNY 405 million) and \$1 million of other short term borrowings.

As of March 31, 2017, \$20 million of the ABL Revolver was utilized for letters of credit, and we had \$448 million in remaining availability under the ABL Revolver.

In fiscal years 2016 and 2017, Novelis Korea entered into various short-term facilities, including revolving loan facilities and committed credit lines. As of March 31, 2017, we had \$211 million (KRW 236 billion) in remaining availability under these facilities.

In fiscal year 2016, Novelis Middle East and Africa entered into various short-term facilities, including revolving loan facilities and committed credit lines. As of March 31, 2017, we had \$40 million in remaining availability under these facilities.

In December 2014, Novelis China entered into a committed facility. As of March 31, 2017, we had \$2 million (CNY 11 million) in remaining availability under this facility.

Senior Notes

On August 29, 2016, Novelis Corporation, an indirect wholly owned subsidiary of Novelis Inc., issued \$1.15 billion in aggregate principal amount of 6.25% Senior Notes Due 2024 (the 2024 Notes). The 2024 Notes are guaranteed, jointly and severally, on a senior unsecured basis, by Novelis Inc. and certain of its subsidiaries.

Additionally, on September 14, 2016, Novelis Corporation issued \$1.5 billion in aggregate principal amount of 5.875% Senior Notes Due 2026 (the 2026 Notes, and together with the 2024 Notes, the Notes). The 2026 Notes are guaranteed, jointly and severally, on a senior unsecured basis, by Novelis Inc. and certain of its subsidiaries.

The proceeds from the issuance of the 2024 Notes and the 2026 Notes were used to extinguish our 8.375% 2017 Senior Notes and our 8.75% 2020 Senior Notes, respectively. In addition, we paid combined tender offer premiums and issuance costs of \$139 million associated with the refinancing transactions, including fees paid to lenders, arrangers, and outside professionals such as attorneys and rating agencies. We recorded a "Loss on extinguishment of debt" of \$112 million in the second quarter of fiscal 2017 related to refinancing transactions. We incurred debt issuance costs of \$45 million on the Notes which were capitalized and will be amortized as an increase to "Interest expense and amortization of debt issuance costs" over the term of these instruments.

The Notes contain customary covenants and events of default that will limit our ability and, in certain instances, the ability of certain of our subsidiaries to (1) incur additional debt and provide additional guarantees, (2) pay dividends or return capital beyond certain amounts and make other restricted payments, (3) create or permit certain liens, (4) make certain asset sales, (5) use the proceeds from the sales of assets and subsidiary stock, (6) create or permit restrictions on the ability of certain of the Company's subsidiaries to pay dividends or make other distributions to the Company, (7) engage in certain transactions with affiliates, (8) enter into sale and leaseback transactions, (9) designate subsidiaries as unrestricted subsidiaries and (10) consolidate, merge or transfer all or substantially all of our assets and the assets of certain of our subsidiaries. During any future period in which either Standard & Poor's Ratings Group, Inc. or Moody's Investors Service, Inc. have assigned an investment grade credit rating to the Notes and no default or event of default under the indenture has occurred and is

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

continuing, most of the covenants will be suspended. The Notes include a cross-acceleration event of default triggered if (1) any other indebtedness with an aggregate principal amount of more than \$100 million is (1) accelerated prior to its maturity or (2) not repaid at its maturity. As of March 31, 2017, we were in compliance with the covenants in the Notes. The Notes also contain customary call protection provisions for our bond holders that extend through August 2022 for the 2024 Notes and through September 2024 for the 2026 Notes.

Korean Bank Loans

As of March 31, 2017, Novelis Korea had \$93 million (KRW 103 billion) of outstanding long-term loans with various banks due within one year. All loans have variable interest rates with base rates tied to Korea's 91-day CD rate plus an applicable spread ranging from 0.91% to 1.58%.

Brazil BNDES Loans

Novelis Brazil entered into loan agreements with Brazil's National Bank for Economic and Social Development (the BNDES loans) related to the plant expansion in Pindamonhangaba, Brazil (Pinda). As of March 31, 2017, there are \$2 million of BNDES loans due within one year.

Other Long-term Debt

In December 2004, we entered into a fifteen-year capital lease obligation with Alcan for assets in Sierre, Switzerland, which has an interest rate of 7.5% and fixed quarterly payments of CHF 1.7 million, (USD \$1.7 million).

During fiscal 2013 and 2014, Novelis Inc. entered into various five-year capital lease arrangements to upgrade and expand our information technology infrastructure.

As of March 31, 2017, we had \$1 million of other debt, including certain capital lease obligations, with due dates through December 2020.

Interest Rate Swaps

We use interest rate swaps to manage our exposure to changes in benchmark interest rates which impact our variable-rate debt. See Note 15 — Financial Instruments and Commodity Contracts for further information about these interest rate swaps.

12. SHARE-BASED COMPENSATION

The Company's board of directors has authorized long term incentive plans (LTIPs), under which Hindalco stock appreciation rights (Hindalco SARs), Novelis stock appreciation rights (Novelis SARs), phantom restricted stock units (RSUs), and Novelis Performance Units (Novelis PUs) are granted to certain executive officers and key employees.

The Hindalco SARs vest at the rate of 25% or 33% per year, subject to the achievement of an annual performance target, and expire 7 years from their original grant date. The performance criterion for vesting of the Hindalco SARs is based on the actual overall Novelis operating EBITDA compared to the target established and approved each fiscal year. The minimum threshold for vesting each year is 75% of each annual target operating EBITDA. Given that the performance criterion is based on an earnings target in a future period for each fiscal year, the grant date of the awards for accounting purposes is generally not established until the performance criterion has been defined.

Each Hindalco SAR is to be settled in cash based on the difference between the market value of one Hindalco share on the date of grant and the market value on the date of exercise. Each Novelis SAR is to be settled in cash based on the difference between the fair value of one Novelis phantom share on the original date of grant and the fair value of a phantom share on the date of the exercise. The amount of cash paid to settle Hindalco SARs and Novelis SARs is limited to two and a half or three times the target payout, depending on the plan year. The Hindalco SARs and Novelis SARs do not transfer any shareholder rights in Hindalco or Novelis to a participant. The Hindalco SARs and Novelis SARs are classified as liability awards and are remeasured at fair value each reporting period until the SARs are settled.

In May 2016, the Company's board of directors approved the issuance of Novelis PUs which have a fixed \$100 value per unit and will vest in full three years from the grant date, subject to specific performance criteria compared to the established target. The Company made a voluntary offer to the participants with outstanding Novelis SARs granted for fiscal years 2012 through 2016 to exchange their Novelis SARs for an equivalently valued number of Novelis PUs. The voluntary exchange resulted in 1,054,662 Novelis SARs being modified into PUs which are not based on Novelis' nor Hindalco's fair values and are accounted for outside the scope of ASC 718, *Compensation - Stock Compensation*. This exchange was accounted for as a modification. There were 108,549 of Novelis SARs that remain outstanding as of March 31, 2017.

The RSUs are based on Hindalco's stock price. The RSUs vest either in full three years from the grant date or 33% per year over three years, subject to continued employment with the Company, but are not subject to performance criteria. Each RSU is to be settled in cash equal to the market value of one Hindalco share. The payout on the RSUs is limited to three times the market value of one Hindalco share measured on the original date of grant. The RSUs are classified as liability awards and expensed over the requisite service period (three years) based on the Hindalco stock price as of each balance sheet date.

On May 13, 2013, the Company's board of directors amended the long-term incentive plans for fiscal years 2010 - 2013 (FY 2010 Plan), fiscal years 2011- 2014 (FY 2011 Plan), fiscal years 2012 - 2015 (FY 2012 Plan) and fiscal years 2013 - 2016 (FY 2013 Plan). The amendment gave each participant the option to cancel a portion of their outstanding Hindalco SARs for a lump-sum cash payment and/or the issuance of new Novelis SARs. The remaining Hindalco SARs and the new Novelis SARs continue to vest according to the terms and conditions of the original grant.

Total compensation expense related to Hindalco SARs, Novelis SARs, and RSUs under the plans for the respective periods is presented in the table below (in millions). These amounts are included in "Selling, general and administrative expenses" in our consolidated statements of operations. As the performance criteria for fiscal years 2018, 2019 and 2020 have not yet been established, measurement periods for Hindalco SARs and Novelis SARs relating to those periods have not yet commenced. As a result, only compensation expense for vested and current year Hindalco SARs and Novelis SARs has been recorded.

	Year Ended March 31,		
	2017	2016	2015
Total compensation expense (income)	\$ 21	\$ (2)	\$ 9

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

The table below shows the RSUs activity for the year ended March 31, 2017.

	Number of RSUs	Grant Date Fair Value (in Indian Rupees)	Aggregate Intrinsic Value (USD in millions)
RSUs outstanding as of March 31, 2016	4,582,725	124.52	\$ 7
Granted	5,382,251	92.20	—
Exercised	(1,374,877)	108.37	2
Forfeited/Cancelled	(877,115)	117.18	—
RSUs outstanding as of March 31, 2017	<u>7,712,984</u>	105.68	\$ 23

The table below shows Hindalco SARs activity for the year ended March 31, 2017.

	Number of Hindalco SARs	Weighted Average Exercise Price (in Indian Rupees)	Weighted Average Remaining Contractual Term (In years)	Aggregate Intrinsic Value (USD in millions)
SARs outstanding as of March 31, 2016	21,493,712	125.65	4.4	\$ —
Granted	3,687,728	92.52	6.1	—
Exercised	(7,175,896)	118.92	—	7
Forfeited/Cancelled	(2,844,311)	117.00	—	—
SARs outstanding as of March 31, 2017	<u>15,161,233</u>	122.16	4.4	18
SARs exercisable as of March 31, 2017	4,422,990	139.54	2.8	\$ 4

The table below shows the Novelis SARs activity for the year ended March 31, 2017.

	Number of Novelis SARs	Weighted Average Exercise Price (in USD)	Weighted Average Remaining Contractual Term (In years)	Aggregate Intrinsic Value (USD in millions)
SARs outstanding as of March 31, 2016	1,341,883	\$ 80.00	5.1	\$ —
Exercised	(12,739)	64.40	—	—
Forfeited/Cancelled	(1,220,595)	79.85	—	—
SARs outstanding as of March 31, 2017	<u>108,549</u>	83.57	3.5	—
SARs exercisable as of March 31, 2017	65,185	\$ 86.89	2.8	\$ —

The fair value of each invested Hindalco SAR was estimated using the following assumptions:

	Year ended March 31,		
	2017	2016	2015
Risk-free interest rate	5.82% - 6.99%	7.23% - 7.68%	7.75% - 7.79%
Dividend yield	0.51%	1.14%	0.78%
Volatility	35% - 44%	43% - 44%	39% - 46%

The fair value of each invested Novelis SAR was estimated using the following assumptions:

	Year ended March 31,		
	2017	2016	2015
Risk-free interest rate	0.78% - 1.95%	0.89% - 1.39%	0.96% - 1.59%
Dividend yield	—%	—%	—%
Volatility	25% - 28%	38% - 41%	27% - 34%

The fair value of each invested Hindalco SAR was based on the difference between the fair value of a long call and a short call option. The fair value of each of these call options was determined using the Monte Carlo Simulation model. We used historical stock price volatility data of Hindalco on the National Stock Exchange of India to determine expected volatility assumptions. The risk-free interest rate is based on Indian treasury yields interpolated for a time period corresponding to the

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

remaining contractual life. The forfeiture rate is estimated based on actual historical forfeitures. The dividend yield is estimated to be the annual dividend of the Hindalco stock over the remaining contractual lives of the Hindalco SARs. The value of each vested Hindalco SAR is remeasured at fair value each reporting period based on the excess of the current stock price over the exercise price, not to exceed the maximum payout as defined by the plans. The fair value of the Hindalco SARs is being recognized over the requisite performance and service period of each tranche, subject to the achievement of any performance criteria.

The fair value of each unvested Novelis SAR was based on the difference between the fair value of a long call and a short call option. The fair value of each of these call options was determined using the Monte Carlo Simulation model. We used the historical volatility of comparable companies to determine expected volatility assumptions. The risk-free interest rate is based on U.S. treasury yields for a time period corresponding to the remaining contractual life. The forfeiture rate is estimated based on actual historical forfeitures of Hindalco SARs. The value of each vested Novelis SAR is remeasured at fair value each reporting period based on the percentage increase in the current Novelis phantom stock price over the exercise price, not to exceed the maximum payout as defined by the plans. The fair value of the Novelis SARs is being recognized over the requisite performance and service period of each tranche, subject to the achievement of any performance criteria.

The cash payments made to settle SAR liabilities were \$7 million, \$2 million, and \$8 million, in the years ended March 31, 2017, 2016, and 2015, respectively. Total cash payments made to settle Hindalco RSUs were \$2 million, \$5 million, and \$3 million in the years ended March 31, 2017, 2016 and 2015, respectively. Unrecognized compensation expense related to the non-vested Hindalco SARs (assuming all future performance criteria are met) was \$8 million which is expected to be recognized over a weighted average period of 1.5 years. Unrecognized compensation expense related to the non-vested Novelis SARs (assuming all future performance criteria are met) was less than \$1 million, which is expected to be recognized over a weighted average period of 1.4 years. Unrecognized compensation expense related to the RSUs was \$11 million, which will be recognized over the remaining weighted average vesting period of 1 year.

13. POSTRETIREMENT BENEFIT PLANS

Our pension obligations relate to: (1) funded defined benefit pension plans in the U.S., Canada, Switzerland, and the U.K.; (2) unfunded defined benefit pension plans in Germany; (3) unfunded lump sum indemnities payable upon retirement to employees in France and Italy; and (4) partially funded lump sum indemnities in South Korea. Our other postretirement obligations (Other Benefits, as shown in certain tables below) include unfunded health care and life insurance benefits provided to retired employees in the U.S., Canada, and Brazil. We have combined our domestic (i.e. Canadian Plans) and foreign (i.e. All other Plans other than Canadian Plans) postretirement benefit plan disclosures because our domestic benefit obligation is not significant as compared to our total benefit obligation, as our foreign benefit obligation is 95% of the total benefit obligation, and the assumptions used to value domestic and foreign plans were not significantly different.

During fiscal year 2015 and as a result of the sale of our North America foil operations, \$11 million of benefits were transferred out of the pension plan along with a corresponding amount of plan assets resulting in settlement accounting. Various other pension plans recognized settlements totaling \$3 million as a result of restructuring initiatives and other factors. The settlements resulted in an insignificant impact to the statement of operations.

In October 2014, the Society of Actuaries published an updated mortality table and mortality improvement scale for U.S. plans. We recognized an increase of \$33 million to our benefit obligation and net actuarial loss as a result of updating mortality assumptions applicable to our U.S. plans. These deferred costs will be amortized on a straight-line basis to net periodic benefit costs in future years.

In June 2014, the Company amended its U.S. non-union retiree medical plan to extend retirees' option to participate in a Retiree Health Access Exchange (RHA). For calendar years 2014 through 2017, the Company will subsidize a portion of the retiree medical premium rates of the RHA. The Company will not provide a subsidy beginning in calendar year 2018. The amendment to the plan resulted in a plan remeasurement and recognition of prior service costs of approximately \$11 million which is being amortized on a straight-line basis through December 31, 2017, subject to an annual remeasurement adjustment.

In August 2013, the Company amended its U.S. non-union retiree medical plan. Beginning January 2014, the health care benefits provided by the Company to retirees' was discontinued and replaced with the retirees' option to participate in a new Retiree Health Access Exchange. For calendar year 2014 and 2015, the Company will subsidize a portion of the retiree medical premium rates of the RHA. The amendment resulted in the Company no longer providing a subsidy beginning in calendar year 2016. The amendments to the plan resulted in a plan remeasurement and recognition of a negative plan amendment, which reduced our obligation by \$97 million as of August 31, 2013. The negative plan amendment, net of unrecognized actuarial losses resulted in a credit balance of \$70 million recorded in AOCI as of August 31, 2013. The \$70 million is being amortized, on a straight-line basis, as a reduction to net periodic benefit cost from September 1, 2013 through December 31, 2015, subject to an annual remeasurement adjustment.

Employer Contributions to Plans

For pension plans, our policy is to fund an amount required to provide for contractual benefits attributed to service to-date, and amortize unfunded actuarial liabilities typically over periods of 15 years or less. We also participate in savings plans in Canada and the U.S., as well as defined contribution pension plans in the U.S., U.K., Canada, Germany, Italy, Switzerland and Brazil. We contributed the following amounts (in millions) to all plans.

	Year Ended March 31,		
	2017	2016	2015
Funded pension plans	\$ 26	\$ 28	\$ 28
Unfunded pension plans	15	12	13
Savings and defined contribution pension plans	25	24	18
Total contributions	\$ 66	\$ 64	\$ 59

During fiscal year 2018, we expect to contribute \$29 million to our funded pension plans, \$16 million to our unfunded pension plans and \$25 million to our savings and defined contribution pension plans.

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Benefit Obligations, Fair Value of Plan Assets, Funded Status and Amounts Recognized in Financial Statements

The following tables present the change in benefit obligation, change in fair value of plan assets and the funded status for pension and other benefits (in millions).

	Pension Benefits		Other Benefits	
	Year Ended March 31,		Year Ended March 31,	
	2017	2016	2017	2016
Benefit obligation at beginning of period	\$ 1,868	\$ 1,863	\$ 151	\$ 139
Service cost	45	47	6	5
Interest cost	59	59	6	5
Members' contributions	4	5	—	—
Benefits paid	(74)	(65)	(8)	(10)
Amendments	2	—	—	—
Curtailments, settlements and special termination benefits	(4)	(1)	—	—
Actuarial losses (gains)	35	(43)	(3)	11
Other	(4)	(1)	—	—
Currency (gains) losses	(66)	4	1	1
Benefit obligation at end of period	<u>\$ 1,865</u>	<u>\$ 1,868</u>	<u>\$ 153</u>	<u>\$ 151</u>
Benefit obligation of funded plans	\$ 1,594	\$ 1,578	\$ —	\$ —
Benefit obligation of unfunded plans	271	290	153	151
Benefit obligation at end of period	<u>\$ 1,865</u>	<u>\$ 1,868</u>	<u>\$ 153</u>	<u>\$ 151</u>

	Pension Benefits	
	Year Ended March 31,	
	2017	2016
Change in fair value of plan assets		
Fair value of plan assets at beginning of period	\$ 1,177	\$ 1,233
Actual return on plan assets	106	(21)
Members' contributions	4	5
Benefits paid	(74)	(65)
Company contributions	37	39
Settlements	(4)	(1)
Other	(3)	(1)
Currency	(43)	(12)
Fair value of plan assets at end of period	<u>\$ 1,200</u>	<u>\$ 1,177</u>

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

	March 31,			
	2017		2016	
	Pension Benefits	Other Benefits	Pension Benefits	Other Benefits
Funded status				
Funded status at end of period:				
Assets less the benefit obligation of funded plans	\$ (394)	\$ —	\$ (401)	\$ —
Benefit obligation of unfunded plans	(271)	(153)	(290)	(151)
	<u>\$ (665)</u>	<u>\$ (153)</u>	<u>\$ (691)</u>	<u>\$ (151)</u>
As included in our consolidated balance sheets within Total assets / (Total liabilities)				
Other non- current assets	\$ 2	\$ —	\$ —	\$ —
Accrued expenses and other current liabilities	(12)	(10)	(13)	(9)
Accrued postretirement benefits	(655)	(143)	(678)	(142)
	<u>\$ (665)</u>	<u>\$ (153)</u>	<u>\$ (691)</u>	<u>\$ (151)</u>

The postretirement amounts recognized in “Accumulated other comprehensive loss,” before tax effects, are presented in the table below (in millions), and includes the impact related to our equity method investments. Amounts are amortized to net periodic benefit cost over the group’s average future service life of the employees or the group’s average life expectancy.

	March 31,			
	2017		2016	
	Pension Benefits	Other Benefits	Pension Benefits	Other Benefits
Net actuarial losses	\$ (375)	\$ (16)	\$ (444)	\$ (22)
Prior service credit	4	7	9	6
Total postretirement amounts recognized in Accumulated other comprehensive (loss) income	<u>\$ (371)</u>	<u>\$ (9)</u>	<u>\$ (435)</u>	<u>\$ (16)</u>

The estimated amounts that will be amortized from “Accumulated other comprehensive loss” into net periodic benefit costs in fiscal year 2018 (exclusive of equity method investments) are \$34 million for pension benefit costs related to net actuarial losses of \$35 million partially offset by prior service credits of less than \$1 million, and \$2 million for other postretirement benefits, related to amortization of prior service costs of less than \$1 million and net actuarial losses of \$1 million.

The postretirement changes recognized in “Accumulated other comprehensive loss,” before tax effects, are presented in the table below (in millions), and include the impact related to our equity method investments.

	March 31,			
	2017		2016	
	Pension Benefits	Other Benefits	Pension Benefits	Other Benefits
Beginning balance in Accumulated other comprehensive (loss) income	\$ (435)	\$ (16)	\$ (439)	\$ 18
Curtailments, settlements, and special termination benefits	1	—	—	—
Net actuarial gain (loss)	11	2	(25)	(11)
Prior service cost	(2)	—	—	—
Amortization of:				
Prior service credits	(2)	1	(2)	(27)
Actuarial losses (gains)	43	4	41	4
Effect of currency exchange	13	—	(10)	—
Total postretirement amounts recognized in Accumulated other comprehensive (loss) income	<u>\$ (371)</u>	<u>\$ (9)</u>	<u>\$ (435)</u>	<u>\$ (16)</u>

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Pension Plan Obligations

The projected benefit obligation, accumulated benefit obligation and fair value of plan assets are presented in the table below (in millions).

	March 31,	
	2017	2016
The projected benefit obligation and accumulated benefit obligation for all defined benefit pension plans:		
Projected benefit obligation	\$ 1,865	\$ 1,868
Accumulated benefit obligation	\$ 1,711	\$ 1,692
Pension plans with projected benefit obligations in excess of plan assets:		
Projected benefit obligation	\$ 1,769	\$ 1,868
Fair value of plan assets	\$ 1,103	\$ 1,177
Pension plans with accumulated benefit obligations in excess of plan assets:		
Accumulated benefit obligation	\$ 1,581	\$ 1,567
Fair value of plan assets	\$ 1,049	\$ 1,039
Pension plans with projected benefit obligations less than plan assets:		
Projected benefit obligation	\$ 96	\$ —
Fair value of plan assets	\$ 97	\$ —

Future Benefit Payments

Expected benefit payments to be made during the next ten fiscal years are listed in the table below (in millions).

	Pension Benefits	Other Benefits
2018	\$ 67	\$ 6
2019	71	6
2020	76	7
2021	79	8
2022	84	9
2023 through 2027	481	52
Total	\$ 858	\$ 88

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Components of Net Periodic Benefit Cost

The components of net periodic benefit cost for the respective periods are listed in the table below (in millions).

	Pension Benefits			Other Benefits		
	Year Ended March 31,			Year Ended March 31,		
	2017	2016	2015	2017	2016	2015
Net periodic benefit costs						
Service cost	\$ 45	\$ 47	\$ 43	\$ 6	\$ 5	\$ 5
Interest cost	59	59	66	6	5	5
Expected return on assets	(61)	(67)	(69)	—	—	—
Amortization — losses	40	37	22	4	4	5
Amortization — prior service credit	(2)	(2)	(2)	2	(27)	(37)
Curtailment, settlement, and special termination losses (gains)	1	—	1	—	—	(1)
Net periodic benefit cost (income)	\$ 82	\$ 74	\$ 61	\$ 18	\$ (13)	\$ (23)
Proportionate share of non-consolidated affiliates' pension costs	8	9	7	—	—	—
Total net periodic benefit costs (income) recognized	\$ 90	\$ 83	\$ 68	\$ 18	\$ (13)	\$ (23)

Actuarial Assumptions and Sensitivity Analysis

The weighted average assumptions used to determine benefit obligations and net periodic benefit costs for the respective periods are listed in the table below.

	Pension Benefits			Other Benefits		
	Year Ended March 31,			Year Ended March 31,		
	2017	2016	2015	2017	2016	2015
Weighted average assumptions used to determine benefit obligations						
Discount rate	3.2%	3.3%	3.1%	4.1%	4.0%	3.6%
Average compensation growth	3.1%	3.1%	3.1%	3.5%	3.5%	3.5%
Weighted average assumptions used to determine net periodic benefit cost						
Discount rate	3.3%	3.1%	4.0%	4.0%	3.6%	4.1%
Average compensation growth	3.1%	3.1%	3.1%	3.5%	3.5%	3.5%
Expected return on plan assets	5.4%	5.6%	6.1%	—%	—%	—%

In selecting the appropriate discount rate for each plan, for pension and other postretirement plans in Canada, the U.S., U.K., and other Euro zone countries, we used spot rate yield curves and individual bond matching models. For other countries we used published long-term high quality corporate bond indices with adjustments made to the index rates based on the duration of the plans' obligation.

In estimating the expected return on assets of a pension plan, consideration is given primarily to its target allocation, the current yield on long-term bonds in the country where the plan is established, and the historical risk premium of equity or real estate over long-term bond yields in each relevant country. The approach is consistent with the principle that assets with higher risk provide a greater return over the long-term. The expected long-term rate of return on plan assets is 5.0% in fiscal 2018.

We provide unfunded health care and life insurance benefits to our retired employees in Canada, the U.S. and Brazil, for which we paid \$8 million, \$10 million, and \$10 million in fiscal 2017, 2016 and 2015, respectively. The assumed health care cost trend used for measurement purposes is 7.0% for fiscal 2018, decreasing gradually to 5% in 2026 and remaining at that level thereafter.

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A change of one percentage point in the assumed health care cost trend rates would have the following effects on our other benefits (in millions).

Sensitivity Analysis	1% Increase	1% Decrease
Effect on service and interest costs	\$ 2	\$ (2)
Effect on benefit obligation	\$ 15	\$ (13)

In addition, we provide post-employment benefits, including disability, early retirement and continuation of benefits (medical, dental, and life insurance) to our former or inactive employees, which are accounted for on the accrual basis in accordance with ASC No. 712, *Compensation — Retirement Benefits*. "Other long-term liabilities" and "Accrued expenses and other current liabilities" on our consolidated balance sheets include \$9 million and \$4 million, respectively, as of March 31, 2017, for these benefits. Comparatively, "Other long-term liabilities" and "Accrued expenses and other current liabilities" on our consolidated balance sheets include \$12 million and \$5 million, respectively, as of March 31, 2016.

Investment Policy and Asset Allocation

The Company's overall investment strategy is to achieve a mix of approximately 50% of investments for long-term growth (equities, real estate) and 50% for near-term benefit payments (debt securities, other) with a wide diversification of asset categories, investment styles, fund strategies and fund managers. Since most of the defined benefit plans are closed to new entrants, we expect this strategy to gradually shift more investments toward near-term benefit payments.

Each of our funded pension plans is governed by an Investment Fiduciary, who establishes an investment policy appropriate for the pension plan. The Investment Fiduciary is responsible for selecting the asset allocation for each plan, monitoring investment managers, monitoring returns versus benchmarks and monitoring compliance with the investment policy. The targeted allocation ranges by asset class, and the actual allocation percentages for each class are listed in the table below.

Asset Category	Target Allocation Ranges	Allocation in Aggregate as of March 31,	
		2017	2016
Equity	15-55%	32%	32%
Fixed income	45-77%	49%	62%
Real estate	0-15%	3%	2%
Other	0-16%	17%	5%

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NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Fair Value of Plan Assets

The following pension plan assets are measured and recognized at fair value on a recurring basis (in millions). Please see Note 17— Fair value measurements for a description of the fair value hierarchy. The U.S. and Canadian pension plan assets are invested exclusively in commingled funds and classified in Level 2, and the U.K., Switzerland, and South Korea pension plan assets are invested in both direct investments (Levels 1 and 2) and commingled funds (Level 2).

Pension Plan Assets

	March 31, 2017				March 31, 2016			
	Fair Value Measurements Using				Fair Value Measurements Using			
	Level 1	Level 2	Level 3	Total	Level 1	Level 2	Level 3	Total
Equity	—	—	—	—	—	—	—	—
Fixed income	136	54	—	190	131	44	—	175
Real estate	—	—	—	—	—	—	—	—
Cash and cash equivalents	8	—	—	8	9	—	—	9
Other	—	—	—	—	—	—	—	—
Investments measured at net asset value (A)	—	—	—	1,002	—	—	—	993
Total	\$ 144	\$ 54	\$ —	\$ 1,200	\$ 140	\$ 44	\$ —	\$ 1,177

(A) Certain investments that are measured at fair value using the net asset value per share (or its equivalent) practical expedient have not been categorized in the fair value hierarchy. The fair value amounts presented in this table are intended to permit reconciliation of the fair value hierarchy to the amounts presented in the statement of financial position.

14. CURRENCY (GAINS) LOSSES

The following currency (gains) losses are included in "Other expense (income), net" in the accompanying consolidated statements of operations (in millions).

	Year Ended March 31,		
	2017	2016	2015
Loss (gain) on remeasurement of monetary assets and liabilities, net	\$ 30	\$ (55)	\$ 14
Loss released from accumulated other comprehensive loss	—	1	3
(Gain) loss recognized on balance sheet remeasurement currency exchange contracts, net	(35)	52	10
Currency (gains) losses, net	<u>\$ (5)</u>	<u>\$ (2)</u>	<u>\$ 27</u>

The following currency losses are included in "Accumulated other comprehensive loss, net of tax" and "Noncontrolling interests" in the accompanying consolidated balance sheets (in millions).

	Year Ended March 31,		
	2017	2016	2015
Cumulative currency translation adjustment — beginning of period	\$ (197)	\$ (214)	\$ 90
Effect of changes in exchange rates	(75)	17	(304)
Sale of investment in foreign entities (A)	16	—	—
Cumulative currency translation adjustment — end of period	<u>\$ (256)</u>	<u>\$ (197)</u>	<u>\$ (214)</u>

(A) We reclassified \$16 million of cumulative currency losses from AOCI to "Other expense (income), net" in the twelve months ended March 31, 2017. Refer to Note 18 — Other expense (income), net for further details.

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NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

15. FINANCIAL INSTRUMENTS AND COMMODITY CONTRACTS

The following tables summarize the gross fair values of our financial instruments and commodity contracts as of March 31, 2017 and 2016 (in millions):

	March 31, 2017				
	Assets		Liabilities		Net Fair Value
	Current	Noncurrent(A)	Current	Noncurrent(A)	Assets/(Liabilities)
Derivatives designated as hedging instruments:					
<i>Cash flow hedges</i>					
Aluminum contracts	\$ —	\$ —	\$ (69)	\$ —	\$ (69)
Currency exchange contracts	26	1	(1)	(3)	23
Energy contracts	1	—	—	(9)	(8)
Total derivatives designated as hedging instruments	27	1	(70)	(12)	(54)
Derivatives not designated as hedging instruments					
Aluminum contracts	57	1	(68)	(1)	(11)
Currency exchange contracts	29	—	(13)	—	16
Total derivatives not designated as hedging instruments	86	1	(81)	(1)	5
Total derivative fair value	\$ 113	\$ 2	\$ (151)	\$ (13)	\$ (49)

	March 31, 2016				
	Assets		Liabilities		Net Fair Value
	Current	Noncurrent(A)	Current	Noncurrent(A)	Assets/(Liabilities)
Derivatives designated as hedging instruments:					
<i>Cash flow hedges</i>					
Aluminum contracts	\$ 10	\$ —	\$ (2)	\$ —	\$ 8
Currency exchange contracts	15	5	(3)	(5)	12
Energy contracts	—	—	(4)	—	(4)
Interest rate swaps	—	—	—	(1)	(1)
<i>Net Investment hedges</i>					
Currency exchange contracts	—	—	(1)	—	(1)
Total derivatives designated as hedging instruments	25	5	(10)	(6)	14
Derivatives not designated as hedging instruments					
Aluminum contracts	24	—	(26)	—	(2)
Currency exchange contracts	39	—	(39)	(1)	(1)
Energy contracts	—	1	(10)	—	(9)
Total derivatives not designated as hedging instruments	63	1	(75)	(1)	(12)
Total derivative fair value	\$ 88	\$ 6	\$ (85)	\$ (7)	\$ 2

(A) The noncurrent portions of derivative assets and liabilities are included in “Other long-term assets-third parties” and in “Other long-term liabilities”, respectively, in the accompanying consolidated balance sheets.

Aluminum

We use derivative instruments to preserve our conversion margins and manage the timing differences associated with metal price lag. We use over-the-counter derivatives indexed to the London Metals Exchange (LME) (referred to as our "aluminum derivative forward contracts") to reduce our exposure to fluctuating metal prices associated with the period of time between the pricing of our purchases of inventory and the pricing of the sale of that inventory to our customers, which is known as "metal price lag." We also purchase forward LME aluminum contracts simultaneously with our sales contracts with customers that contain fixed metal prices. These LME aluminum forward contracts directly hedge the economic risk of future metal price fluctuations to better match the selling price of the metal with the purchase price of the metal. The volatility in local market premiums also results in metal price lag.

Price risk exposure arises from commitments to sell aluminum in future periods at fixed prices. We identify and designate certain LME aluminum forward contracts as fair value hedges of the metal price risk associated with fixed price sales commitments that qualify as firm commitments. We did not have any outstanding aluminum forward purchase contracts designated as fair value hedges as of March 31, 2017. We had less than 1 kt of outstanding aluminum forward purchase contracts designated as fair value hedges as of March 31, 2016. One kilotonne (kt) is 1,000 metric tonnes.

The following table summarizes the amount of gain (loss) recognized on fair value hedges of metal price risk (in millions):

	Amount of Gain (Loss) Recognized on Changes in Fair Value	
	Year Ended March 31,	
	2017	2016
Fair value hedges of metal price risk		
Derivative contracts	\$ —	\$ (2)
Designated hedged items	—	2
Net ineffectiveness (A)	\$ —	\$ —

(A) Effective portion is recorded in "Net sales" and net ineffectiveness in "Other expense (income), net". There was no amount excluded from the assessment of hedge effectiveness related to Fair Value Hedges.

Price risk arises due to fluctuating aluminum prices between the time the sales order is committed and the time the order is shipped. We identify and designate certain LME aluminum forward purchase contracts as cash flow hedges of the metal price risk associated with our future metal purchases that vary based on changes in the price of aluminum. We did not have any outstanding aluminum forward purchase contracts designated as cash flow hedges as of March 31, 2017. We had 1 kt of outstanding aluminum forward purchase contracts designated as cash flow hedges as of March 31, 2016.

Price risk exposure arises due to the timing lag between the LME based pricing of raw material aluminum purchases and the LME based pricing of finished product sales. We identify and designate certain LME aluminum forward sales contracts as cash flow hedges of the metal price risk associated with our future metal sales that vary based on changes in the price of aluminum. Generally, such exposures do not extend beyond two years in length. We had 391 kt and 301 kt of outstanding aluminum forward sales contracts designated as cash flow hedges as of March 31, 2017 and 2016, respectively.

The remaining aluminum derivative contracts are not designated as accounting hedges. As of March 31, 2017 and 2016, we had 89 kt and 76 kt, respectively, of outstanding aluminum sales contracts not designated as hedges. The average duration of undesignated contracts is less than one year.

The following table summarizes our notional amount (in kt).

Hedge type	March 31,	
	2017	2016
<i>Purchase (sale)</i>		
Cash flow purchases	—	1
Cash flow sales	(391)	(301)
Not designated	(89)	(76)
Total, net	(480)	(376)

Foreign Currency

We use foreign exchange forward contracts, cross-currency swaps and options to manage our exposure to changes in exchange rates. These exposures arise from recorded assets and liabilities, firm commitments and forecasted cash flows denominated in currencies other than the functional currency of certain operations.

We use foreign currency contracts to hedge expected future foreign currency transactions, which include capital expenditures. These contracts cover the same periods as known or expected exposures. We had total notional amounts of \$465 million and \$601 million in outstanding foreign currency forwards designated as cash flow hedges as of March 31, 2017 and 2016, respectively.

We use foreign currency contracts to hedge our foreign currency exposure to our net investment in foreign subsidiaries. We did not have any outstanding foreign currency forwards designated as net investment hedges as of March 31, 2017. We had \$36 million of outstanding foreign currency forwards designated as net investment hedges as of March 31, 2016.

As of March 31, 2017 and 2016, we had outstanding foreign currency exchange contracts with a total notional amount of \$683 million and \$636 million, respectively, to primarily hedge balance sheet remeasurement risk, which were not designated as hedges. Contracts representing the majority of this notional amount will mature during the first quarter of fiscal 2018 and offset the remeasurement impact.

Energy

We owned an interest in an electricity swap that matured January 5, 2017 which we formerly designated as a cash flow hedge of our exposure to fluctuating electricity prices. As of March 31, 2017, due to significant credit deterioration of our counterparty, we discontinued hedge accounting for this electricity swap. We did not have any outstanding notional megawatt hours remaining as of March 31, 2017. As of March 31, 2016, the fair value of this electricity swap was a liability of \$9 million.

On December 31, 2015, we entered into an agreement to extend the electricity swap contract for an additional five years, effective January 6, 2017 and maturing on January 5, 2022. As of March 31, 2017 and 2016, 1 million of notional megawatt hours was outstanding and the fair value of this swap was a liability of \$9 million and an asset of \$1 million, respectively. The electricity swap was designated as a cash flow hedge in the first quarter of fiscal year 2017.

We use natural gas forward purchase contracts to manage our exposure to fluctuating energy prices in North America. We had 6 million MMBTUs designated as cash flow hedges as of March 31, 2017, and the fair value was an asset of \$1 million. There were 5 million MMBTUs of natural gas forward purchase contracts designated as cash flow hedges as of March 31, 2016 and the fair value was a liability of \$4 million. As of March 31, 2017 and 2016, we had less than 1 million of MMBTUs of natural gas forward purchase contracts that were not designated as hedges. The fair value as of March 31, 2017 and 2016 was a liability of less than \$1 million and a liability of \$1 million, respectively, for the forward purchase contracts not designated as hedges. The average duration of undesignated contracts is less than one year in length. One MMBTU is the equivalent of one decatherm, or one million British Thermal Units.

We use diesel fuel forward purchase contracts to manage our exposure to fluctuating fuel prices in North America, which are not designated as hedges as of March 31, 2017. As of March 31, 2017 and 2016, we had 8 million gallons and 4 million gallons, respectively, of diesel fuel forward purchase contracts outstanding, and the fair value was a liability of less than \$1 million. The average duration of undesignated contracts is approximately one year in length.

Interest Rate

As of March 31, 2017, we swapped \$119 million (KRW 133 billion) floating rate loans to a weighted average fixed rate of 2.92%. All swaps expire concurrent with the maturity of the related loans. As of March 31, 2017 and 2016, \$119 million (KRW 133 billion) and \$115 million (KRW 133 billion), respectively, were designated as cash flow hedges.

Gain (Loss) Recognition

The following table summarizes the gains (losses) associated with the change in fair value of derivative instruments not designated as hedges and the ineffectiveness of designated derivatives recognized in "Other expense (income), net" (in millions). Gains (losses) recognized in other line items in the consolidated statement of operations are separately disclosed within this footnote.

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NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

	Year Ended March 31,		
	2017	2016	2015
Derivative instruments not designated as hedges			
Aluminum contracts	\$ (44)	\$ 47	\$ (31)
Currency exchange contracts	40	(60)	(5)
Energy contracts (A)	8	3	2
Gain (loss) recognized in "Other expense (income), net"	4	(10)	(34)
Derivative instruments designated as hedges			
(Loss) gain recognized in "Other expense (income), net" (B)	(25)	17	19
Total (loss) gain recognized in "Other expense (income), net"	\$ (21)	\$ 7	\$ (15)
Balance sheet remeasurement currency exchange contract gains (losses)	\$ 35	\$ (53)	\$ (13)
Realized (losses) gains, net (C)	(61)	64	(2)
Unrealized gains (losses) on other derivative instruments, net	5	(4)	—
Total (loss) gain recognized in "Other expense (income), net"	\$ (21)	\$ 7	\$ (15)

- (A) Includes amounts related to de-designated electricity swap, diesel fuel forward contracts and natural gas swaps not designated as hedges.
- (B) Amount includes: forward market premium/discount excluded from hedging relationship and ineffectiveness on designated aluminum and foreign currency capital expenditure contracts; releases to income from AOCI on balance sheet remeasurement contracts; and ineffectiveness of fair value hedges involving aluminum derivatives.
- (C) During the year ended March 31, 2017, the level of undesignated aluminum derivatives was higher due to the volatility in LME pricing. During the year ended March 31, 2016, the level of undesignated aluminum derivatives was higher due to the volatility in the local market premium component of our net selling prices, forward market premium/discount excluded from hedging relationship and ineffectiveness on designated aluminum and foreign currency capital expenditure contracts.

The following table summarizes the impact on AOCI and earnings of derivative instruments designated as cash flow and net investment hedges (in millions). Within the next twelve months, we expect to reclassify \$43 million of losses from AOCI to earnings, before taxes.

	Amount of Gain (Loss) Recognized in OCI (Effective Portion)			Amount of Gain (Loss) Recognized in "Other (Income) Expense, net" (Ineffective and Excluded Portion)		
	Year Ended March 31,			Year Ended March 31,		
	2017	2016	2015	2017	2016	2015
Cash flow hedging derivatives						
Aluminum contracts	\$ (137)	\$ 84	\$ (26)	\$ (27)	\$ 17	\$ 24
Currency exchange contracts	48	(7)	(44)	2	1	(2)
Energy contracts	(7)	(5)	(12)	(1)	(1)	—
Interest rate swaps	—	(1)	(1)	—	—	—
Total cash flow hedging derivatives	(96)	71	(83)	(26)	17	22
Net investment derivatives						
Currency exchange contracts	—	(2)	11	—	—	—
Total	\$ (96)	\$ 69	\$ (72)	\$ (26)	\$ 17	\$ 22

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Gain (Loss) Reclassification

	Amount of Gain (Loss) Reclassified from AOCI into Income/(Expense) (Effective Portion) Year Ended March 31,			Location of Gain (Loss) Reclassified from AOCI into Earnings
	2017	2016	2015	
Cash flow hedging derivatives				
Energy contracts (A)	\$ (4)	\$ (5)	\$ (5)	Other expense (income), net
Energy contracts (C)	(4)	(10)	—	Cost of goods sold (B)
Aluminum contracts	(55)	83	(40)	Cost of goods sold (B)
Aluminum contracts	(3)	—	—	Net sales
Currency exchange contracts	18	(44)	(14)	Cost of goods sold (B)
Currency exchange contracts	2	(4)	(1)	Selling, general and administrative expenses
Currency exchange contracts	7	(9)	18	Net sales
Currency exchange contracts	—	(1)	(3)	Other expense (income), net
Currency exchange contracts	—	—	7	Gain on assets held for sale, net
Currency exchange contracts	(1)	(1)	(1)	Depreciation and amortization
Interest rate swaps	—	(1)	—	Interest expense
Total	(40)	8	(39)	(Loss) income before income taxes
	12	(19)	8	Income tax benefit (provision)
	<u>\$ (28)</u>	<u>\$ (11)</u>	<u>\$ (31)</u>	Net loss

(A) Includes amounts related to de-designated electricity swap. AOCI related to this swap was amortized to income over the remaining term of the hedged item.

(B) "Cost of goods sold" is exclusive of depreciation and amortization.

(C) Includes amounts related to natural gas swaps.

16. ACCUMULATED OTHER COMPREHENSIVE LOSS

The following table summarizes the change in the components of accumulated other comprehensive loss net of tax and excluding "Noncontrolling interests", for the periods presented (in millions).

	(A) Currency Translation	(B) Cash Flow Hedges	(C) Postretirement Benefit Plans	Total
Balance as of March 31, 2014	\$ 89	\$ (20)	\$ (160)	\$ (91)
Other comprehensive income before reclassifications	(302)	(74)	(118)	(494)
Amounts reclassified from AOCI, net	—	31	(7)	24
Net current-period other comprehensive loss	(302)	(43)	(125)	(470)
Balance as of March 31, 2015	(213)	(63)	(285)	(561)
Other comprehensive loss (income) before reclassifications	17	41	(15)	43
Amounts reclassified from AOCI, net	—	11	7	18
Net current-period other comprehensive income (loss)	17	52	(8)	61
Balance as of March 31, 2016	(196)	(11)	(293)	(500)
Other comprehensive (loss) income before reclassifications	(76)	(63)	22	(117)
Amounts reclassified from AOCI, net	16	28	28	72
Net current-period other comprehensive (loss) income	(60)	(35)	50	(45)
Balance as of March 31, 2017	\$ (256)	\$ (46)	\$ (243)	\$ (545)

(A) The \$16 million in currency translation reclassified from AOCI relates to CTA that was written off as part of our sale of the Aluminum Company of Malaysia Berhad (ALCOM) business. Refer to Note 18 — Other (Income) Expense, Net for additional information.

(B) For additional information on our cash flow hedges see Note 15 — Financial Instruments and Commodity Contracts.

(C) For additional information on our postretirement benefit plans see Note 13 — Postretirement Benefit Plans.

17. FAIR VALUE MEASUREMENTS

We record certain assets and liabilities, primarily derivative instruments, on our consolidated balance sheets at fair value. We also disclose the fair values of certain financial instruments, including debt and loans receivable, which are not recorded at fair value. Our objective in measuring fair value is to estimate an exit price in an orderly transaction between market participants on the measurement date. We consider factors such as liquidity, bid/offer spreads and nonperformance risk, including our own nonperformance risk, in measuring fair value. We use observable market inputs wherever possible. To the extent observable market inputs are not available, our fair value measurements will reflect the assumptions we used. We grade the level of the inputs and assumptions used according to a three-tier hierarchy:

Level 1 — Unadjusted quoted prices in active markets for identical, unrestricted assets or liabilities we have the ability to access at the measurement date.

Level 2 — Inputs other than quoted prices included within Level 1 that are observable for the asset or liability, either directly or indirectly.

Level 3 — Unobservable inputs for which there is little or no market data, which require us to develop our own assumptions based on the best information available as what market participants would use in pricing the asset or liability.

The following section describes the valuation methodologies we used to measure our various financial instruments at fair value, including an indication of the level in the fair value hierarchy in which each instrument is generally classified.

Derivative Contracts

For certain derivative contracts with fair values based upon trades in liquid markets, such as aluminum, foreign exchange, natural gas and diesel fuel forward contracts and options, valuation model inputs can generally be verified and valuation techniques do not involve significant judgment. The fair values of such financial instruments are generally classified within Level 2 of the fair value hierarchy.

The majority of our derivative contracts are valued using industry-standard models with observable market inputs as their basis, such as time value, forward interest rates, volatility factors, and current (spot) and forward market prices. We generally classify these instruments within Level 2 of the valuation hierarchy. Such derivatives include interest rate swaps, cross-currency swaps, foreign currency contracts, aluminum derivative contracts, natural gas and diesel fuel forward contracts.

We classify derivative contracts that are valued based on models with significant unobservable market inputs as Level 3 of the valuation hierarchy. Our two electricity swaps, which are our only Level 3 derivative contracts, represent agreements to buy electricity at a fixed price at our Oswego, New York facility. Forward prices are not observable for this market, so we must make certain assumptions based on available information we believe to be relevant to market participants. We use observable forward prices for a geographically nearby market and adjust for 1) historical spreads between the cash prices of the two markets, and 2) historical spreads between retail and wholesale prices.

For the electricity swap that matured January 5, 2017, we did not have any outstanding notional megawatt hours remaining as of March 31, 2017.

For the electricity swap maturing January 5, 2022, the average forward price at March 31, 2017, estimated using the method described above, was \$40 per megawatt hour, which represented less than \$1 premium over forward prices in the nearby observable market. The actual rate from the most recent swap settlement was approximately \$37 per megawatt hour. Each \$1 per megawatt hour decline in price decreases the valuation of the electricity swap by \$1 million.

For Level 2 and 3 of the fair value hierarchy, where appropriate, valuations are adjusted for various factors such as liquidity, bid/offer spreads and credit considerations (nonperformance risk). We regularly monitor these factors along with significant market inputs and assumptions used in our fair value measurements and evaluate the level of the valuation input according to the fair value hierarchy. This may result in a transfer between levels in the hierarchy from period to period. As of March 31, 2017 and March 31, 2016, we did not have any Level 1 derivative contracts. No amounts were transferred between levels in the fair value hierarchy.

All of the Company's derivative instruments are carried at fair value in the statements of financial position prior to considering master netting agreements.

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The following table presents our derivative assets and liabilities which were measured and recognized at fair value on a recurring basis classified under the appropriate level of the fair value hierarchy as of March 31, 2017 and March 31, 2016 (in millions). The table below also discloses the net fair value of the derivative instruments after considering the impact of master netting agreements.

	March 31,			
	2017		2016	
	Assets	Liabilities	Assets	Liabilities
Level 2 instruments				
Aluminum contracts	\$ 58	\$ (138)	\$ 34	\$ (28)
Currency exchange contracts	56	(17)	59	(49)
Energy contracts	1	—	—	(5)
Interest rate swaps	—	—	—	(1)
Total level 2 instruments	<u>115</u>	<u>(155)</u>	<u>93</u>	<u>(83)</u>
Level 3 instruments				
Energy contracts	—	(9)	1	(9)
Total level 3 instruments	<u>—</u>	<u>(9)</u>	<u>1</u>	<u>(9)</u>
Total gross	<u>\$ 115</u>	<u>\$ (164)</u>	<u>\$ 94</u>	<u>\$ (92)</u>
Netting adjustment (A)	<u>\$ (46)</u>	<u>\$ 46</u>	<u>\$ (31)</u>	<u>\$ 31</u>
Total net	<u>\$ 69</u>	<u>\$ (118)</u>	<u>\$ 63</u>	<u>\$ (61)</u>

(A) Amounts represent the impact of legally enforceable master netting agreements that allow the Company to settle positive and negative positions with the same counterparties.

We recognized gains of \$5 million for the year ended March 31, 2017 related to Level 3 financial instrument that matured in January 2017. These gains were included in "Other expense (income), net."

The following table presents a reconciliation of fair value activity for Level 3 derivative contracts (in millions).

	Level 3 – Derivative Instruments (A)
Balance as of March 31, 2015	\$ (16)
Unrealized gain included in earnings (B)	9
Settlements	(1)
Balance as of March 31, 2016	\$ (8)
Unrealized/realized gain included in earnings (B)	11
Unrealized/realized (loss) included in AOCI (C)	(9)
Settlements	(3)
Balance as of March 31, 2017	<u>\$ (9)</u>

- (A) Represents net derivative liabilities.
 (B) Included in "Other expense (income), net"
 (C) Included in "Change in fair value of effective portion of cash flow hedges, net"

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Financial Instruments Not Recorded at Fair Value

The table below presents the estimated fair value of certain financial instruments not recorded at fair value on a recurring basis (in millions). The table excludes short-term financial assets and liabilities for which we believe carrying value approximates fair value. We value long-term receivables and long-term debt using Level 2 inputs. Valuations are based on either market and/or broker ask prices when available or on a standard credit adjusted discounted cash flow model using market observable inputs.

	March 31,			
	2017		2016	
	Carrying Value	Fair Value	Carrying Value	Fair Value
Assets				
Long-term receivables from related parties	\$ 15	\$ 14	\$ 16	\$ 17
Liabilities				
Total debt — third parties (excluding short term borrowings)	\$ 4,558	\$ 4,797	\$ 4,468	\$ 4,659

18. OTHER EXPENSE (INCOME)

“Other expense (income), net” is comprised of the following (in millions).

	Year Ended March 31,		
	2017	2016	2015
Foreign currency remeasurement (gain) loss, net (A)	\$ (5)	\$ (2)	\$ 27
(Gain) loss on change in fair value of other unrealized derivative instruments, net (B)	(5)	4	—
Loss (gain) on change in fair value of other realized derivative instruments, net (B)	61	(64)	2
Loss on sale of assets, net	6	4	5
Loss on sale of business (C)	27	—	—
Loss on Brazilian tax litigation, net (D)	5	5	7
Interest income	(11)	(13)	(7)
Gain on business interruption insurance recovery (E)	—	(10)	(19)
Other, net	17	8	2
Other expense (income), net	<u>\$ 95</u>	<u>\$ (68)</u>	<u>\$ 17</u>

(A) Includes “(Gain) loss recognized on balance sheet remeasurement currency exchange contracts, net.”

(B) See Note 15 — Financial Instruments and Commodity Contracts for further details.

(C) On September 30, 2016, we sold our 59.15% equity interest in Aluminum Company of Malaysia Berhad (ALCOM), a previously consolidated subsidiary, to Towerpack Sdn. Bhd. for \$12 million (MYR 48 million), which was recorded in "Accounts Receivable, net" as of September 30, 2016, and received in October 2016. The transaction includes our interest in the Bukit Raja, Malaysia facility, which processed aluminum within the construction/industrial and heavy and light gauge foil markets, and the wholly-owned entity Alcom Nikkei Specialty Coatings Sdn. Berhad. This sale is part of our continued strategy to exit certain non-core operations and align our growth strategy in the premium product markets. The sale resulted in a loss of \$27 million during the year ended March 31, 2017. As a result of this sale, we no longer own any interest in ALCOM.

(D) See Note 20 — Commitments and Contingencies – Brazil Tax and Legal Matters for further details.

(E) We experienced an outage at the hotmill in the Logan facility in North America due to an unexpected motor failure in fiscal 2015 and recognized gains of \$10 million and \$13 million during the years ended March 31, 2016 and March 31, 2015, respectively. Additionally, the fiscal year 2015 gain also includes an insurance settlement which resulted in a gain of \$6 million related to lost shipments and profits resulting from an electrical short circuit impacting a hot mill motor at one of our facilities in our Europe segment in fiscal 2015.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

19. INCOME TAXES

We are subject to Canadian and United States federal, state, and local income taxes as well as other foreign income taxes. The domestic (Canada) and foreign components of our "Income before income taxes" (and after removing our "Equity in net loss of non-consolidated affiliates") are as follows (in millions).

	Year Ended March 31,		
	2017	2016	2015
Domestic (Canada)	\$ (286)	\$ (313)	\$ (267)
Foreign (all other countries)	491	324	434
Pre-tax income before equity in net loss of non-consolidated affiliates	<u>\$ 205</u>	<u>\$ 11</u>	<u>\$ 167</u>

The components of the "Income tax provision" are as follows (in millions).

	Year Ended March 31,		
	2017	2016	2015
Current provision:			
Domestic (Canada)	\$ 8	\$ 5	\$ 4
Foreign (all other countries)	139	134	98
Total current	<u>147</u>	<u>139</u>	<u>102</u>
Deferred provision (benefit):			
Domestic (Canada)	—	—	—
Foreign (all other countries)	4	(93)	(88)
Total deferred	<u>4</u>	<u>(93)</u>	<u>(88)</u>
Income tax provision	<u>\$ 151</u>	<u>\$ 46</u>	<u>\$ 14</u>

The reconciliation of the Canadian statutory tax rates to our effective tax rates are shown below (in millions, except percentages).

	Year Ended March 31,		
	2017	2016	2015
Pre-tax income before equity in net loss on non-consolidated affiliates	\$ 205	\$ 11	\$ 167
Canadian Statutory tax rate	<u>25%</u>	<u>25%</u>	<u>25%</u>
Provision at the Canadian statutory rate	\$ 51	\$ 3	\$ 42
Increase (decrease) for taxes on income (loss) resulting from:			
Exchange translation items	9	16	(22)
Exchange remeasurement of deferred income taxes	8	(8)	(31)
Change in valuation allowances	67	104	95
Tax credits	(14)	(22)	(22)
Income items not subject to tax	(3)	—	2
State tax benefit, net	1	(10)	(7)
Dividends not subject to tax	(23)	(52)	(52)
Enacted tax rate changes	1	5	(1)
Tax rate differences on foreign earnings	36	4	7
Uncertain tax positions	6	7	10
Prior year adjustments	4	(2)	2
Income tax settlements	6	—	(6)
Other — net	2	1	(3)
Income tax provision	<u>\$ 151</u>	<u>\$ 46</u>	<u>\$ 14</u>
Effective tax rate	<u>73%</u>	<u>411%</u>	<u>8%</u>

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Our effective tax rate differs from the Canadian statutory rate primarily due to the following factors: (1) pre-tax foreign currency gains or losses with no tax effect and the tax effect of U.S. dollar denominated currency gains or losses with no pre-tax effect, which is shown above as exchange translation items; (2) the remeasurement of deferred income taxes due to foreign currency changes, which is shown above as exchange remeasurement of deferred income taxes; (3) changes in valuation allowances; and (4) differences between the Canadian statutory and foreign effective tax rates applied to entities in different jurisdictions shown above as tax rate differences on foreign earnings.

We continue to maintain valuation allowances in Canada and certain foreign jurisdictions primarily related to tax losses where we believe it is more likely than not that we will be unable to utilize those losses. The impact on our income tax provision of the change in these valuation allowances during the year ended March 31, 2017 was an increase of \$67 million.

We earn tax credits in a number of the jurisdictions in which we operate. Primarily comprised of foreign tax credits in the U.K. of \$7 million in the current year and empire zone credits in New York of \$4 million. The impact on our income tax provision of credits during the year ended March 31, 2017 was a benefit of \$14 million. However, legislation enacted in New York state on March 31, 2014 established a zero percent statutory income tax rate for manufacturers. As a result, the current year empire zone credits in New York are offset with a corresponding valuation allowance of \$4 million.

We receive the benefits of favorable tax holidays in various jurisdictions, which resulted in a \$3 million reduction to tax expense for the year ended March 31, 2017, and phase out as of December 31, 2020.

Deferred Income Taxes

Deferred income taxes recognize the net tax effects of temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the carrying amounts used for income tax purposes, and the impact of available net operating loss (NOL) and tax credit carryforwards. These items are stated at the enacted tax rates that are expected to be in effect when taxes are actually paid or recovered.

Our deferred income tax assets and deferred income tax liabilities are as follows (in millions).

	March 31,	
	2017	2016
Deferred income tax assets:		
Provisions not currently deductible for tax purposes	\$ 459	\$ 396
Tax losses/benefit carryforwards, net	724	741
Depreciation and amortization	45	41
Other assets	4	(1)
Total deferred income tax assets	1,232	1,177
Less: valuation allowance	(680)	(613)
Net deferred income tax assets	\$ 552	\$ 564
Deferred income tax liabilities:		
Depreciation and amortization	\$ 442	\$ 457
Inventory valuation reserves	84	64
Monetary exchange gains, net	14	15
Other liabilities	24	30
Total deferred income tax liabilities	\$ 564	\$ 566
Net deferred income tax liabilities	\$ 12	\$ 2

ASC 740 requires that we reduce our deferred income tax assets by a valuation allowance if, based on the weight of the available evidence, it is more likely than not that all or a portion of a deferred tax asset will not be realized. After consideration of all evidence, both positive and negative, management concluded that it is more likely than not that we will be unable to realize a portion of our deferred tax assets and that valuation allowances of \$680 million and \$613 million were necessary as of March 31, 2017 and 2016, respectively.

It is reasonably possible that our estimates of future taxable income may change within the next 12 months, resulting in a change to the valuation allowance in one or more jurisdictions.

As of March 31, 2017, we had net operating loss carryforwards of approximately \$614 million (tax effected) and tax credit carryforwards of \$110 million, which will be available to offset future taxable income and tax liabilities, respectively. The carryforwards will begin expiring in fiscal year 2018. As of March 31, 2017, valuation allowances of \$531 million, \$90 million and \$59 million had been recorded against net operating loss carryforwards, tax credit carryforwards and other deferred tax assets, respectively, where it appeared more likely than not that such benefits will not be realized. The net operating loss carryforwards are predominantly in Canada, the U.S., Italy, Germany, Switzerland, China and the U.K.

As of March 31, 2016, we had net operating loss carryforwards of approximately \$638 million (tax effected) and tax credit carryforwards of \$103 million, which will be available to offset future taxable income and tax liabilities, respectively. The carryforwards will begin expiring in fiscal 2017 with some amounts being carried forward indefinitely. As of March 31, 2016, valuation allowances of \$468 million, \$88 million and \$57 million had been recorded against net operating loss carryforwards, tax credit carryforwards and other deferred tax assets, respectively, where it appeared more likely than not that such benefits will not be realized. The net operating loss carryforwards are predominantly in Canada, the U.S., Italy, Germany, Switzerland, China and the U.K.

Although realization is not assured, management believes it is more likely than not that all the remaining net deferred tax assets will be realized. In the near term, the amount of deferred tax assets considered realizable could be reduced if we do not generate sufficient taxable income in certain jurisdictions.

As of March 31, 2017, we had cumulative earnings of approximately \$2.7 billion for which we had not provided Canadian income tax or withholding taxes because we consider them to be indefinitely reinvested. We acknowledge that we would need to accrue and pay taxes should we decide to repatriate cash and short term investments generated from earnings of our foreign subsidiaries that are considered indefinitely reinvested. Except for those jurisdictions where we have already distributed and paid taxes on the earnings, we have reinvested and expect to continue to reinvest undistributed earnings of foreign subsidiaries indefinitely. Cash and cash equivalents held by foreign subsidiaries that are indefinitely reinvested are used to cover expansion and short-term cash flow needs of such subsidiaries. The amounts considered indefinitely reinvested would be subject to possible Canadian taxation only if remitted as dividends. However, due to our full valuation allowance position of \$601 million in Canada, in excess of \$496 million of net operating loss carryforwards, exempt surpluses for Canadian tax purposes, \$46 million of tax credits and other deferred tax assets of \$59 million, a portion of the cumulative earnings would not be taxed if distributed. Due to the complex structure of our international holdings, and the various methods available for repatriation, quantification of the deferred tax liability, if any, associated with these undistributed earnings is not practicable.

Tax Uncertainties

As of March 31, 2017 and 2016, the total amount of unrecognized benefits that, if recognized, would affect the effective income tax rate in future periods based on anticipated settlement dates is \$36 million and \$34 million, respectively.

Tax authorities continue to examine certain other of our tax filings for fiscal years 2005 through 2014. As a result of further settlement of audits, judicial decisions, the filing of amended tax returns or the expiration of statutes of limitations, our reserves for unrecognized tax benefits, as well as reserves for interest and penalties, may decrease in the next 12 months by an amount up to approximately \$16 million. With few exceptions, tax returns for all jurisdictions for all tax years before 2005 are no longer subject to examination by taxing authorities.

Our policy is to record interest and penalties related to unrecognized tax benefits in the income tax provision (benefit). As of March 31, 2017, 2016 and 2015, we had \$5 million, \$4 million and \$5 million accrued, respectively, for interest and penalties. For the year ended March 31, 2017, we recognized \$1 million expense related to accrued interest and penalties. For the years ended March 31, 2016 and 2015 we recognized a tax expense and benefit of \$2 million and \$1 million, respectively, related to changes in accrued interest and penalties.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

A reconciliation of the beginning and ending amount of unrecognized tax benefits is as follows (in millions):

	Year Ended March 31,		
	2017	2016	2015
Beginning balance	\$ 34	\$ 37	\$ 39
Additions based on tax positions related to the current period	5	6	7
Additions based on tax positions of prior years	—	3	3
Reductions based on tax positions of prior years	—	(6)	(1)
Settlements	(1)	(10)	(3)
Foreign exchange	(2)	4	(8)
Ending Balance	<u>\$ 36</u>	<u>\$ 34</u>	<u>\$ 37</u>

Income Taxes Payable

Our consolidated balance sheets include income taxes payable (net) of \$46 million and \$42 million as of March 31, 2017 and 2016, respectively. Of these amounts, \$28 million and \$13 million are reflected in “Accrued expenses and other current liabilities” as of March 31, 2017 and 2016, respectively.

20. COMMITMENTS AND CONTINGENCIES

We are party to, and may in the future be involved in, or subject to, disputes, claims and proceedings arising in the ordinary course of our business, including some we assert against others, such as environmental, health and safety, product liability, employee, tax, personal injury and other matters. We have established a liability with respect to contingencies for which a loss is probable and estimable. While the ultimate resolution of and liability and costs related to these matters cannot be determined with certainty, we do not believe any of these pending actions, individually or in the aggregate, will materially impact our operations or materially affect our financial condition or liquidity.

For certain matters in which the Company is involved for which a loss is reasonably possible, we are unable to estimate a loss. For certain other matters for which a loss is reasonably possible and the loss is estimable, we have estimated the aggregated range of loss as \$0 to \$70 million. This estimated aggregate range of reasonably possible losses is based upon currently available information. The Company's estimates involve significant judgment, and therefore, the estimate will change from time to time and actual losses may differ from the current estimate. We review the status of, and estimated liability related to, pending claims and civil actions on a quarterly basis. The evaluation model includes all asserted and unasserted claims that can be reasonably identified including claims relating to our responsibility for compliance with environmental, health and safety laws and regulations in the jurisdictions in which we operate or formerly operated. The estimated costs in respect of such reported liabilities are not offset by amounts related to insurance or indemnification arrangements unless otherwise noted.

The following describes certain contingencies relating to our business, including those for which we assumed liability as a result of our spin-off from Alcan Inc.

Environmental Matters

We own and operate numerous manufacturing and other facilities in various countries around the world. Our operations are subject to environmental laws and regulations from various jurisdictions, which govern, among other things, air emissions, wastewater discharges, the handling, storage and disposal of hazardous substances and wastes, the remediation of contaminated sites, post-mining reclamation and restoration of natural resources, and employee health and safety. Future environmental regulations may impose stricter compliance requirements on the industries in which we operate. Additional equipment or process changes at some of our facilities may be needed to meet future requirements. The cost of meeting these requirements may be significant. Failure to comply with such laws and regulations could subject us to administrative, civil or criminal penalties, obligations to pay damages or other costs, and injunctions and other orders, including orders to cease operations.

We are involved in proceedings under the U.S. Comprehensive Environmental Response, Compensation, and Liability Act, also known as CERCLA or Superfund, or analogous state provisions regarding liability arising from the usage, storage, treatment or disposal of hazardous substances and wastes at a number of sites in the United States, as well as similar proceedings under the laws and regulations of the other jurisdictions in which we have operations, including Brazil and certain countries in the European Union. Many of these jurisdictions have laws that impose joint and several liability, without regard to fault or the legality of the original conduct, for the costs of environmental remediation, natural resource damages, third party claims, and other expenses. In addition, we are, from time to time, subject to environmental reviews and investigations by relevant governmental authorities. We are also involved in claims and litigation filed on behalf of persons alleging exposure to substances and other hazards at our current and former facilities.

We have established liabilities based on our estimates for the currently anticipated costs associated with these environmental matters. We estimated that the remaining undiscounted clean-up costs related to our environmental liabilities as of March 31, 2017 were approximately \$15 million, of which \$12 million was associated with restructuring actions and the remaining undiscounted clean-up costs were approximately \$3 million. Additionally, \$10 million of the environmental liability was included in "Other long-term liabilities," with the remaining \$5 million included in "Accrued expenses and other current liabilities" in our consolidated balance sheet as of March 31, 2017. As of March 31, 2016, \$7 million of the environmental liability was included in "Other long-term liabilities," with the remaining \$10 million included in "Accrued expenses and other current liabilities" in our consolidated balance sheet. Management has reviewed the environmental matters, including those for which we assumed liability as a result of our spin-off from Alcan Inc. As a result of management's review of these items, management has determined that the currently anticipated costs associated with these environmental matters will not, individually or in the aggregate, materially impact our operations or materially adversely affect our financial condition, results of operations or liquidity.

Brazil Tax and Legal Matters

Under a federal tax dispute settlement program established by the Brazilian government, we have settled several disputes with Brazil's tax authorities regarding various forms of manufacturing taxes and social security contributions. In most cases, we are paying the settlement amounts over a period of 180 months, although in some cases we are paying the settlement amounts over a shorter period. The assets and liabilities related to these settlements are presented in the table below (in millions).

	March 31,	
	2017	2016
Cash deposits (A)	\$ 3	\$ 2
Short-term settlement liability (B)	\$ 9	\$ 7
Long-term settlement liability (B)	59	57
Total settlement liability	<u>\$ 68</u>	<u>\$ 64</u>
Liability for other disputes and claims (C)	\$ 22	\$ 17

- (A) We have these cash deposits as a result of legal proceedings with Brazil's tax authorities. These deposits, which are included in "Other long-term assets — third parties" in our accompanying consolidated balance sheets, will be expended toward these legal proceedings.
- (B) The short-term and long-term settlement liabilities are included in "Accrued expenses and other current liabilities" and "Other long-term liabilities", respectively, in our accompanying consolidated balance sheets.
- (C) In addition to the disputes we have settled under the federal tax dispute settlement program, we are involved in several other unresolved tax and other legal claims in Brazil. The related liabilities are included in "Other long-term liabilities" in our accompanying consolidated balance sheets.

The interest cost recorded on these settlement liabilities, partially offset by interest earned on the cash deposits is included in the table below (in millions).

	Year Ended March 31,		
	2017	2016	2015
Loss on Brazilian tax litigation, net	\$ 5	\$ 5	\$ 7

Additionally, we have included in the range of reasonably possible losses disclosed above, any unresolved tax disputes or other contingencies for which a loss is reasonably possible and estimable.

Other Commitments

As of March 31, 2017 and 2016, we had sold certain inventories to third parties and have agreed to repurchase the same or similar inventory back from the third parties subsequent to the balance sheet dates. Our estimated outstanding repurchase obligations for this inventory as of March 31, 2017 is \$12 million and as of March 31, 2016 was \$22 million, based on market prices as of these dates. We sell and repurchase inventory with third parties in an attempt to better manage inventory levels and to better match the purchasing of inventory with the demand for our products. As of March 31, 2017 and 2016, there was no liability related to these repurchase obligations on our accompanying consolidated balance sheets.

21. SEGMENT, GEOGRAPHICAL AREA, MAJOR CUSTOMER AND MAJOR SUPPLIER INFORMATION

Segment Information

Due in part to the regional nature of supply and demand of aluminum rolled products and to best serve our customers, we manage our activities based on geographical areas and are organized under four operating segments: North America, Europe, Asia and South America. All of our segments manufacture aluminum sheet and light gauge products.

The following is a description of our operating segments:

North America. Headquartered in Atlanta, Georgia, this segment operates eight plants, including two fully dedicated recycling facilities and one facility with recycling operations, in two countries.

Europe. Headquartered in Künsnacht, Switzerland, this segment operates ten plants, including two fully dedicated recycling facilities and two facilities with recycling operations, in four countries.

Asia. Headquartered in Seoul, South Korea, this segment operates four plants, including three facilities with recycling operations, in three countries.

South America. Headquartered in Sao Paulo, Brazil, this segment comprises power generation operations, and operates two plants, including a facility with recycling operations, in Brazil. Our remaining smelting operations facilities ceased operations in December 2014. The majority of our power generation operations were sold during the fourth quarter of fiscal 2015.

Net sales and expenses are measured in accordance with the policies and procedures described in Note 1 — Business and Summary of Significant Accounting Policies.

We measure the profitability and financial performance of our operating segments based on “Segment income.” “Segment income” provides a measure of our underlying segment results that is in line with our approach to risk management. We define “Segment income” as earnings before (a) “depreciation and amortization”; (b) “interest expense and amortization of debt issuance costs”; (c) “interest income”; (d) unrealized gains (losses) on change in fair value of derivative instruments, net, except for foreign currency remeasurement hedging activities, which are included in segment income; (e) impairment of goodwill; (f) gain or loss on extinguishment of debt; (g) noncontrolling interests' share; (h) adjustments to reconcile our proportional share of “Segment income” from non-consolidated affiliates to income as determined on the equity method of accounting; (i) “restructuring and impairment, net”; (j) gains or losses on disposals of property, plant and equipment and businesses, net; (k) other costs, net; (l) litigation settlement, net of insurance recoveries; (m) sale transaction fees; (n) provision or benefit for taxes on income (loss) and (o) cumulative effect of accounting change, net of tax.

The tables below show selected segment financial information (in millions). The “Eliminations and Other” column in the table below includes eliminations and functions that are managed directly from our corporate office that have not been allocated to our operating segments, as well as the adjustments for proportional consolidation, and eliminations of intersegment “Net sales.” The financial information for our segments includes the results of our affiliates on a proportionately consolidated basis, which is consistent with the way we manage our business segments. In order to reconcile the financial information for the segments shown in the tables below to the relevant U.S. GAAP-based measures, we must adjust proportional consolidation of each line item. The “Eliminations and Other” in “Net sales – third party” includes the net sales attributable to our joint venture party, Tri-Arrows, for our Logan affiliate because we consolidate 100% of the Logan joint venture for U.S. GAAP, but we manage our Logan affiliate on a proportionately consolidated basis. See Note 8 — Consolidation and Note 9 — Investment in and Advances to Non-Consolidated Affiliates and Related Party Transactions for further information about these affiliates. Additionally, we eliminate intersegment sales and intersegment income for reporting on a consolidated basis.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

Selected Segment Financial Information

Selected Operating Results Year Ended March 31, 2017	North America	Europe	Asia	South America	Eliminations and Other	Total
Net sales - third party	\$ 3,226	\$ 2,930	\$ 1,771	\$ 1,448	\$ 216	\$ 9,591
Net sales - intersegment	2	38	20	62	(122)	—
Net sales	<u>\$ 3,228</u>	<u>\$ 2,968</u>	<u>\$ 1,791</u>	<u>\$ 1,510</u>	<u>\$ 94</u>	<u>\$ 9,591</u>

Depreciation and amortization	\$ 149	\$ 106	\$ 59	\$ 63	\$ (17)	\$ 360
Income tax provision	\$ 18	\$ 12	\$ 20	\$ 88	\$ 13	\$ 151
Capital expenditures	\$ 80	\$ 65	\$ 38	\$ 39	\$ 2	\$ 224

March 31, 2017

Investment in and advances to non-consolidated affiliates	\$ —	\$ 451	\$ —	\$ —	\$ —	\$ 451
Total assets	\$ 2,359	\$ 2,679	\$ 1,576	\$ 1,637	\$ 93	\$ 8,344

Selected Operating Results Year Ended March 31, 2016	North America	Europe	Asia	South America	Eliminations and Other	Total
Net sales - third party	\$ 3,262	\$ 3,055	\$ 1,879	\$ 1,482	\$ 194	\$ 9,872
Net sales - intersegment	4	168	113	93	(378)	—
Net sales	<u>\$ 3,266</u>	<u>\$ 3,223</u>	<u>\$ 1,992</u>	<u>\$ 1,575</u>	<u>\$ (184)</u>	<u>\$ 9,872</u>

Depreciation and amortization	\$ 143	\$ 106	\$ 61	\$ 61	\$ (18)	\$ 353
Income tax (benefit) provision	\$ (53)	\$ (11)	\$ 12	\$ 81	\$ 17	\$ 46
Capital expenditures	\$ 143	\$ 146	\$ 35	\$ 39	\$ 7	\$ 370

March 31, 2016

Investment in and advances to non-consolidated affiliates	\$ —	\$ 488	\$ —	\$ —	\$ —	\$ 488
Total assets	\$ 2,370	\$ 2,687	\$ 1,516	\$ 1,584	\$ 123	\$ 8,280

Selected Operating Results Year Ended March 31, 2015	North America	Europe	Asia	South America	Eliminations and Other	Total
Net sales - third party	\$ 3,465	\$ 3,609	\$ 2,139	\$ 1,749	\$ 185	\$ 11,147
Net sales - intersegment	18	174	201	101	(494)	—
Net sales	<u>\$ 3,483</u>	<u>\$ 3,783</u>	<u>\$ 2,340</u>	<u>\$ 1,850</u>	<u>\$ (309)</u>	<u>\$ 11,147</u>

Depreciation and amortization	\$ 137	\$ 103	\$ 71	\$ 63	\$ (22)	\$ 352
Income tax (benefit) provision	\$ (27)	\$ 12	\$ 16	\$ (1)	\$ 14	\$ 14
Capital expenditures	\$ 122	\$ 257	\$ 85	\$ 53	\$ 1	\$ 518

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

The following table shows the reconciliation from income from reportable segments to “Net income attributable to our common shareholder” (in millions).

	Year Ended March 31,		
	2017	2016	2015
North America	\$ 384	\$ 258	\$ 273
Europe	180	116	250
Asia	153	135	141
South America	340	282	240
Intersegment eliminations and other	(3)	—	(2)
Depreciation and amortization	(360)	(353)	(352)
Interest expense and amortization of debt issuance costs	(294)	(327)	(326)
Adjustment to eliminate proportional consolidation	(28)	(30)	(33)
Unrealized gains (losses) on change in fair value of derivative instruments, net	5	(4)	—
Realized gains (losses) on derivative instruments not included in segment income	5	(1)	(6)
Gain on assets held for sale	2	—	22
Loss on extinguishment of debt	(134)	(13)	—
Restructuring and impairment, net	(10)	(48)	(37)
Loss on sale of business	(27)	—	—
Loss on sale of fixed assets	(6)	(4)	(5)
Other costs, net	(10)	(3)	(3)
Income before income taxes	197	8	162
Income tax provision	151	46	14
Net income (loss)	46	(38)	148
Net income attributable to noncontrolling interests	1	—	—
Net income (loss) attributable to our common shareholder	\$ 45	\$ (38)	\$ 148

Geographical Area Information

We had 24 operating facilities in ten countries as of March 31, 2017. The tables below present “Net sales” and “Long-lived assets and other intangible assets” by geographical area (in millions). “Net sales” are attributed to geographical areas based on the origin of the sale. “Long-lived assets and other intangible assets” are attributed to geographical areas based on asset location and exclude investments in and advances to our non-consolidated affiliates and goodwill.

	Year Ended March 31,		
	2017	2016	2015
Net sales:			
United States	\$ 3,336	\$ 3,334	\$ 3,507
Asia and Other Pacific	1,771	1,879	2,139
Brazil	1,448	1,482	1,750
Canada	106	121	144
Germany	2,428	2,506	2,976
Other Europe	502	550	631
Total Net sales	\$ 9,591	\$ 9,872	\$ 11,147

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

	March 31,	
	2017	2016
Long-lived assets and other intangibles:		
United States	\$ 1,400	\$ 1,483
Asia and Other Pacific	756	784
Brazil	823	840
Canada	64	70
Germany	260	287
United Kingdom	39	43
Other Europe	472	522
Total long-lived assets	<u>\$ 3,814</u>	<u>\$ 4,029</u>

Information about Product Sales, Major Customers and Primary Supplier

Product Sales

The percentage of “Net sales” generated from beverage and food can products were 52%, 55%, and 56% in the years ended March 31, 2017, 2016, and 2015, respectively. The percentage of “Net sales” generated from automotive products increased to 23% in the year ended March 31, 2017, compared to 20% and 13% in the years ended March 31, 2016 and 2015, respectively.

Major Customers

The table below shows our net sales to the Affiliates of Ball Corporation (Ball) and Ford Motor Company (Ford), our two largest customers, as a percentage of total “Net sales.”

	Year Ended March 31,		
	2017	2016	2015
Ball (A)	27%	30%	28%
Ford	10%	4%	2%

(A) In February of 2015, Ball Corporation made an offer to acquire Rexam. On June 30, 2016, Ball completed the acquisition of Rexam and the divestiture of certain assets to the Ardagh Group. We have combined the sales for Ball and Rexam for presentation purposes. Prior period amounts disclosed above for Ball do not include the effects of the divestiture of the assets to the Ardagh Group.

Primary Supplier

Rio Tinto (RT) is our primary supplier of metal inputs, including prime and sheet ingot. The table below shows our purchases from RT as a percentage of our total combined metal purchases.

	Year Ended March 31,		
	2017	2016	2015
Purchases from RT as a percentage of total combined metal purchases	<u>10%</u>	<u>12%</u>	<u>15%</u>

22. SUPPLEMENTAL INFORMATION

Supplemental cash flow information is as follows (in millions).

	Year Ended March 31,		
	2017	2016	2015
Supplemental disclosures of cash flow information:			
Interest paid	\$ 288	\$ 308	\$ 303
Income taxes paid	\$ 128	\$ 123	\$ 131

As of March 31, 2017, we recorded \$42 million of outstanding accounts payable and accrued liabilities related to capital expenditures in which the cash outflows will occur subsequent to March 31, 2017. During the years ended March 31, 2017 and 2015, we incurred capital lease obligations of \$2 million and less than \$1 million. During the year ended March 31, 2016, we did not incur any new capital lease obligations.

Novelis Inc.
NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS - (Continued)

23. QUARTERLY RESULTS (UNAUDITED)

The tables below present select operating results (in millions) by period:

	(Unaudited) Quarter Ended			
	June 30, 2016	September 30, 2016	December 31, 2016	March 31, 2017
Net sales	\$ 2,296	\$ 2,361	\$ 2,313	\$ 2,621
Cost of goods sold (exclusive of depreciation and amortization)	1,930	1,980	1,924	2,182
Selling, general and administrative expenses	92	108	103	118
Depreciation and amortization	89	90	88	93
Interest expense and amortization of debt issuance costs	83	81	67	63
Research and development expenses	13	14	14	17
Gain on assets held for sale, net	(1)	(1)	—	—
Loss on extinguishment of debt	—	112	—	22
Restructuring and impairment, net	2	1	1	6
Equity in net loss of non-consolidated affiliates	—	—	8	—
Other expense (income), net	28	38	(3)	32
Income tax provision	36	27	47	41
Net income (loss)	24	(89)	64	47
Net income attributable to noncontrolling interests	—	—	1	—
Net income (loss) attributable to our common shareholder	\$ 24	\$ (89)	\$ 63	\$ 47

	(Unaudited) Quarter Ended			
	June 30, 2015	September 30, 2015	December 31, 2015	March 31, 2016
Net sales	\$ 2,634	\$ 2,482	\$ 2,354	\$ 2,402
Cost of goods sold (exclusive of depreciation and amortization)	2,400	2,241	2,051	2,035
Selling, general and administrative expenses	100	100	104	103
Depreciation and amortization	87	89	88	89
Interest expense and amortization of debt issuance costs	80	82	82	83
Research and development expenses	13	13	13	15
Loss on extinguishment of debt	13	—	—	—
Restructuring and impairment, net	15	4	10	19
Equity in net loss of non-consolidated affiliates	1	1	—	1
Other (income) expense, net	(30)	(32)	(16)	10
Income tax provision (benefit)	15	(3)	16	18
Net (loss) income	(60)	(13)	6	29
Net income attributable to noncontrolling interests	—	—	—	—
Net (loss) income attributable to our common shareholder	\$ (60)	\$ (13)	\$ 6	\$ 29

Item 9. Changes in and Disagreements with Accountants on Accounting and Financial Disclosure

None.

Item 9A. Controls and Procedures

Evaluation of Disclosure Controls and Procedures

We maintain disclosure controls and procedures designed to ensure that information required to be disclosed in the reports that we file or submit under the Securities Exchange Act of 1934, as amended (the Exchange Act) is recorded, processed, summarized and reported within the time periods specified in the SEC's rules and forms. Disclosure controls and procedures, as defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act, include controls and procedures designed to ensure that information required to be disclosed in the reports we file or submit under the Exchange Act is accumulated and communicated to our management, including the Principal Executive Officer and the Principal Financial Officer, as appropriate, to allow timely decisions regarding required disclosure. Any system of controls, however well designed and operated, can provide only reasonable, and not absolute, assurance that the objectives of the system are met.

As required by Securities and Exchange Commission rules, we have evaluated the effectiveness of the design and operation of our disclosure controls and procedures as of the end of the period covered by this Annual Report on Form 10-K. This evaluation was carried out under the supervision and with the participation of our management, including our Principal Executive Officer and Principal Financial Officer. Based on this evaluation, our management, including our Principal Executive Officer and Principal Financial Officer, has concluded that our disclosure controls and procedures were effective as of March 31, 2017.

Management's Report on Internal Control over Financial Reporting

The report of management on our internal control over financial reporting as of March 31, 2017 is set forth in Part II, "Item 8. Financial Statements and Supplementary Data" in this report.

Changes in Internal Control Over Financial Reporting

There have been no changes in our internal control over financial reporting (as defined in Rule 13a-15(f) under the Exchange Act) during the most recently completed fiscal quarter that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

Item 9B. Other Information

On May 5, 2017, our Board of Directors approved a fiscal year 2018 executive annual incentive plan (2018 Executive AIP) and an executive long term incentive plan covering fiscal years 2018 through 2020 (2018 Executive LTIP). For additional information regarding the 2018 Executive AIP and the 2018 Executive LTIP, see Item 11 - Executive Compensation, Fiscal Year 2018 Incentive Compensation Plans, which is incorporated by reference into this item.

PART III

Item 10. Directors, Executive Officers and Corporate Governance

Our Directors

Our Board of Directors is currently comprised of six directors. All of our directors were appointed by our sole shareholder, Hindalco. Our directors' terms will expire at each annual shareholder meeting, provided that if an election of directors is not held at an annual shareholder meeting, the directors then in office shall continue in office or until their successors shall be elected. Biographical details for each of our directors are set forth below.

Name	Director Since	Age	Position
Kumar Mangalam Birla	May 15, 2007	49	Chairman of the Board
Askaran Agarwala (B)	May 15, 2007	83	Director
D. Bhattacharya (A)(B)	May 15, 2007	68	Director and Vice Chairman of the Board
Clarence J. Chandran (A)(B)	January 6, 2005	68	Director
Donald A. Stewart (A)	May 15, 2007	70	Director
Satish Pai (B)	August 6, 2013	55	Director

(A) Member of our Audit Committee

(B) Member of our Compensation Committee

Mr. Kumar Mangalam Birla was elected as the Chairman of the Board of Directors of Novelis on May 15, 2007. Mr. Birla is the Chairman of Hindalco Industries Limited which is an industry leader in aluminum and copper. He is also the Chairman of Aditya Birla Group's leading blue-chip companies including Grasim, UltraTech Cement, Aditya Birla Nuvo and Idea Cellular; and globally, Novelis, Aditya Birla Chemicals (Thailand) Limited and Indo Phil Textile Mills Inc. Philippines. Mr. Birla also serves as director on the board of the Group's international companies spanning Thailand, Indonesia, Philippines, Egypt, and Canada. Additionally, Mr. Birla is the Chancellor of the Birla Institute of Technology & Science, Pilani and the Chairman of the Board of Governors Indian Institute of Management, Ahmedabad and Indian Institute of Technology. He is a member of the London Business School's Asia Pacific Advisory Board. Mr. Birla's past affiliations include service on the boards of Maruti Udyog Limited and Tata Iron and Steel Co. Limited. He was a part time non-official director on the Central Board of Reserve Bank of India. Mr. Birla brings to the board significant global leadership experience acquired through his service as a director of numerous corporate, professional and regulatory entities in various regions of the world.

Mr. Askaran Agarwala has served as a Director of Hindalco since September 1998. He was Chairman of the Business Review Council of the Aditya Birla Group from October 2003 to March 2010. From 1982 to October 2003, he was President of Hindalco. Mr. Agarwala serves on the Compensation Committee of the Novelis Board of Directors. Mr. Agarwala also serves as a director of several other companies, including Udyog Services Ltd., Tanfac Industries Ltd., Aditya Birla Insurance Brokers Limited and Aditya Birla Health Services Limited. He is a trustee of Sarla Basant Birla Param Bhakti Trust, Aditya Vikram Birla Memorial Trust and the Aditya Birla Foundation, among many other organizations. Mr. Agarwala's past and current service as a director of several companies and industry associations in the metals and manufacturing industries adds valuable perspective to the board. Having served as president of our parent company, Hindalco, Mr. Agarwala also brings a depth of understanding of our business and operations.

Mr. Debnarayan Bhattacharya is Vice Chairman of Novelis and serves on the Audit and Compensation Committees of the Novelis Board of Directors. He retired from his position as Managing Director of Hindalco in July 2016. Mr. Bhattacharya continues to serve as Non Executive Director and is appointed as the Vice Chairman of Hindalco. He is also a Director of Aditya Birla Management Corporation Private Ltd. Mr. Bhattacharya's extensive knowledge of the aluminum and metals industries provides a valuable resource to the company in the setting and implementation of its operating business plans as the Company considers various strategic alternatives. Mr. Bhattacharya brings to the board a high degree of financial literacy.

Clarence J. Chandran has been a director of the Company since 2005. Mr. Chandran serves on the Compensation and Audit Committees of the Novelis Board of Directors, and acts as the Chairman of the Compensation Committee. Mr. Chandran is Chairman of 4Front Capital Partners Inc. Mr. Chandran also serves as Venture Partner of The Walsingham Fund. He is a past director of Alcan Inc. and MDS Inc. He retired as Chief Operating Officer of Nortel Networks Corporation (communications) in 2001. Mr. Chandran is a past member of the Board of Visitors of the Pratt School of Engineering at Duke University. He has acquired years of significant experience through his leadership and management of companies with

international business operations. Mr. Chandran brings to the board his deep knowledge in the areas of technology, sales and global operations.

Donald A. Stewart serves as Chairman of the Audit Committee of the Novelis Board of Directors. He retired as Chief Executive Officer and Director of Sun Life Financial Inc. and Sun Life Assurance Company of Canada. Mr. Stewart continues to serve as a director of Sun Life Global Investments Inc. and Sun Life Everbright Life Insurance Company Limited. He is the Chairman of AV Group NB Inc., AV Terrace Bay Inc., Sun Life Assurance Company of Canada (UK) Limited and of the federal-provincial Nominating Committee for the Canada Pension Plan Investment Board. Mr. Stewart brings extensive financial management and operating experience to the board.

Mr. Satish Pai has served as the managing Director of Hindalco Industries Limited since August 2016. Mr. Pai previously served as Deputy Managing Director of Hindalco Industries Limited from February 2014 to May 2016, and as Chief Executive Officer - Aluminum Business of Hindalco Industries Limited from August 2013 to January 2014. Prior to that, Mr. Pai served as Executive Vice President, Worldwide Operations of Schlumberger Ltd. Mr. Pai joined Schlumberger Ltd. in 1985 as a field engineer and held various positions of increased responsibility over the course of his 28 year tenure with the company. He serves on the Compensation Committee of the Novelis Board of Directors and also serves as a director of Hindalco. Mr. Pai also serves as a Director of ABB Limited, Switzerland. Mr. Pai brings extensive industry and global operating experience to the board.

Our Executive Officers

The following table sets forth information for persons serving as executive officers of our Company as of April 30, 2017. Biographical details for each of our executive officers are also set forth below.

Name	Age	Position
Steven Fisher	46	President and Chief Executive Officer
Devinder Ahuja	51	Senior Vice President and Chief Financial Officer
Steven E. Pohl	57	Senior Vice President, Business Performance and Execution
Marco Palmieri	60	Senior Vice President and President, Novelis North America
Emilio Braghi	49	Senior Vice President and President, Novelis Europe
Antonio Tadeu Coelho Nardocci	59	Senior Vice President and President, Novelis South America
Sachin Satpute	51	Senior Vice President and President, Novelis Asia
Leslie J. Parrette, Jr.	55	Senior Vice President, General Counsel, Compliance Officer and Corporate Secretary
Nicholas Madden	60	Senior Vice President, Manufacturing Excellence and Procurement
H.R. Shashikant	54	Senior Vice President and Chief Human Resources Officer
Randal Miller	54	Vice President, Treasurer
Stephanie Rauls	48	Vice President, Controller and Chief Accounting Officer

Steven Fisher is our President and Chief Executive Officer. Since joining the company in 2006, Fisher has served in a number of executive positions, most recently as Chief Financial Officer from May 2007 to May 2015. Mr. Fisher joined Novelis in February 2006 as Vice President, Strategic Planning and Corporate Development. Prior to joining Novelis, Mr. Fisher served as Vice President and Controller for TXU Energy, the non-regulated subsidiary of TXU Corp., at its headquarters in Dallas, Texas. Mr. Fisher is a member of the Business Roundtable, an association of leading U.S. companies working to promote sound public policy. In addition, he is a member of the Board of Directors for the Metro Atlanta Chamber of Commerce, where he chairs the Global Commerce Council. Mr. Fisher received a bachelor's degree in finance and accounting from the University of Iowa and is a certified public accountant.

Devinder Ahuja is our Senior Vice President and Chief Financial Officer, and has served in this role since August 2016. Before joining Novelis, Mr. Ahuja spent 15 years at Novartis Group, where he served most recently as Chief Financial Officer of the Alcon Division's North America business. Prior to that, Mr. Ahuja held positions of increasing responsibility at Novartis covering the areas of finance, strategic planning, supply chain and purchasing. During his career, Mr. Ahuja has held various finance leadership roles including posts in Switzerland, South Korea, Japan and India. Mr. Ahuja holds a Bachelor of Commerce degree from the RA Podar College of Commerce and Economics in Mumbai, India and is a Chartered Accountant.

Steven Pohl is our Senior Vice President, Business Performance and Execution and has served in this role since June 2016. Mr. Pohl joined Novelis in 2009 as Vice President Finance, Chief Financial Officer North America, and has served as Vice

President, Financial Planning & Analysis from 2012 to July 2015, and as Interim Chief Financial Officer from October 2015 to August 2016. Mr. Pohl came to Novelis from PPG Industries, Inc., the world's leading coatings and specialty products company, where he served as General Auditor from 2008 to 2009. Before that, he held key finance and management positions of increasing responsibility at PPG Industries, Inc. from 1981 to 2008. He is also a board member and trustee of La Roche College in Pittsburgh, Pennsylvania. Mr. Pohl earned his B.S. in Accounting from La Roche College.

Marco Palmieri has served as our Senior Vice President and President, Novelis North America since June 2013. He previously served as Senior Vice President and President, Novelis South America from August 2011 to May 2013. Prior to joining Novelis, Mr. Palmieri spent more than 30 years in the metals and engineering industries, including more than 25 years with Rio Tinto Alcan, where he held a succession of international leadership positions in various areas, including business development, primary metal and energy production. Before joining Novelis, Mr. Palmieri was most recently Aluminum Business Director for Votorantim Metais Ltd.

Emilio Braghi has served as our Senior Vice President and President, Novelis Europe since September 2016. Previously, he served as Vice President, Operations, Novelis North America, since February 2015. Mr. Braghi joined Novelis in 1999 as Sales Manager, Europe. During his tenure, he has taken on many leadership roles of increasing responsibility and moved into his first general management role in 2006, when he was named head of Novelis' business in Italy. Mr. Braghi went on to hold multiple general management leadership positions with Novelis' Litho and Painted Products value streams in Europe, directing both commercial and operational activities and he joined the Asia leadership team in March 2012 as Vice President of Operations. Mr. Braghi holds a degree in Engineering and Industrial Production Technologies from Politecnico di Milano in Milan, Italy.

Antonio Tadeu Coelho Nardocci has served as our Senior Vice President and President, Novelis South America since May 2013. He previously served as our Senior Vice President and President, Novelis Europe from June 2009 to April 2013. Prior to that, he served as our Strategy, Innovation and Technology from August 2008 to June 2009, and as Senior Vice President and President of our South American operations from February 2005 to August 2008. Before our spin-off from Alcan, Mr. Nardocci held a number of leadership positions with Alcan, most recently serving as President of Rolled Products South America from March 2002 until January 2005. Mr. Nardocci graduated from the University of São Paulo in Brazil with a degree in metallurgy. Mr. Nardocci is a member of the Brazilian Aluminum Association Board.

Sachin Satpute is Senior Vice President and President, Novelis Asia and has served in this role since June 2016. He previously served as Chief Marketing Officer for Hindalco Industries since 2012, and was Managing Director of Aluminum Company of Malaysia (ALCOM) from April 2011 until June 2012. Prior to his most recent role with Hindalco, Mr. Satpute spent five years with Novelis in various roles of increasing responsibility. Mr. Satpute began his career at a Hindalco aluminum plant in 1987 as a development engineer. In addition to a degree in mechanical engineering from Pune University, Mr. Satpute also holds an MBA in marketing from Mumbai University, India.

Leslie J. Parrette, Jr. rejoined our company in October 2009 to serve as our Senior Vice President, General Counsel and Compliance Officer, and he was appointed Corporate Secretary in February 2010. Before rejoining Novelis, Mr. Parrette served as Senior Vice President, Legal Affairs and General Counsel for WESCO International, Inc. (formerly Westinghouse Electric Supply Co.) (electrical product distribution) from March 2009 until October 2009. From March 2005 until March 2009, he served as our Senior Vice President, General Counsel, Secretary and Compliance Officer. Prior to that, Mr. Parrette served as Senior Vice President, General Counsel and Secretary for Aquila, Inc. (gas and electric utility; energy trading) from July 2000 until February 2005. Mr. Parrette holds an A.B. in Sociology from Harvard College and received his J.D. from Harvard Law School.

Nicholas Madden is our Senior Vice President, Manufacturing Excellence and Procurement. Prior to this role, he served as Senior Vice President, Chief Supply Chain Officer, which he assumed in January 2012 and served as Senior Vice President and Chief Procurement Officer from October 2006 until December 2011 and President of Novelis Europe's Can, Litho and Recycling business unit beginning in October 2004. He was Vice President of Metal Management and Procurement for Alcan's Rolled Products division in Europe from December 2000 until September 2004 and was also responsible for the secondary recycling business. Mr. Madden holds a B.Sc. (Hons) degree in Economics and Social Studies from University College in Cardiff, Wales.

H.R. Shashikant has served as our Senior Vice President and Chief Human Resources Officer since August 2015. In this role, Mr. Shashikant is responsible for the formulation and implementation of the company's worldwide human resources objectives, policies and practices. As the head of the global Human Resources function, he has responsibility for Talent Acquisition and Development, Compensation, Benefits, HRIS and Global Security. Before joining Novelis, Mr. Shashikant was Group Executive President, Group Human Resources, for the Aditya Birla Group, the Mumbai-based conglomerate of which Novelis is a part. He joined the Aditya Birla Group as a Vice President in 1999 and was instrumental in setting up HR systems,

processes, and Centers of Excellence across the Group. An Economics graduate from Karnataka University in Dharwad, India, Mr. Shashikant holds a post graduate degree in Personnel Management from the Tata Institute of Social Sciences, Mumbai.

Randal P. Miller is our Vice President, Treasurer. Prior to joining Novelis in July 2008, Mr. Miller served as Vice President and Treasurer of Transocean Offshore Deepwater Drilling from May 2006 to November 2007 where he was responsible for all treasury, banking, and capital markets activities for Transocean and its subsidiaries. From 2001 to 2006, Mr. Miller served as Vice President Finance, Treasurer of Aquila, Inc. Mr. Miller earned his B.S.B.A. from Iowa State University and M.B.A from the University of Missouri — Kansas City.

Stephanie Rauls has served as our Vice President, Controller and Chief Accounting Officer since February 2016. Ms. Rauls previously served as Vice President of Global Tax since December 2013. Prior to joining Novelis, Ms. Rauls served as Vice President, Tax of Wal-Mart Stores, Inc. from 2011 to 2013, and prior to that, she was employed by GE Healthcare as a tax director from 2002 to 2011. Before joining GE Healthcare, Ms. Rauls was employed by KPMG LLP from 1994 to 2002. She earned a Bachelor of Business Administration in Accounting from the University of Wisconsin-Madison and a Juris Doctor from Valparaiso University School of Law. Ms. Rauls is a Certified Public Accountant.

Board of Directors and Corporate Governance Matters

We are committed to our corporate governance practices, which we believe are essential to our success and to the enhancement of shareholder value. Our Senior Notes are publicly traded in the U.S., and, accordingly, we make required filings with U.S. securities regulators. We make these filings available on our website at www.novelis.com as soon as reasonably practicable after they are electronically filed. We are subject to a variety of corporate governance and disclosure requirements. Our corporate governance practices meet applicable regulatory requirements to ensure transparency and effective governance of the company.

Our Board of Directors reviews corporate governance practices in light of developing requirements in this field. As new provisions come into effect, our Board of Directors will reassess our corporate governance practices and implement changes as and when appropriate. The following is an overview of our corporate governance practices.

Novelis Board of Directors

Our Board of Directors currently has six members, all of whom are appointed by our sole shareholder. Our Board of Directors has the responsibility for stewardship of Novelis Inc., including the responsibility to ensure that we are managed in the interest of our sole shareholder, while taking into account the interests of other stakeholders. Our Board of Directors supervises the management of our business and affairs and discharges its duties and obligations in accordance with the provisions of: (1) our articles of incorporation and bylaws; (2) the charters of its committees and (3) other applicable legislation and company policies.

Our corporate governance practices require that, in addition to certain statutory duties, the following matters be subject to our Board of Directors' approval: (1) capital expenditure budgets and significant investments and divestments; (2) our strategic and value-maximizing plans; (3) the number of directors within the limits provided by our by-laws and (4) any matter which may have the potential for substantial impact on Novelis. Our Board of Directors reviews its composition and size once a year. Senior management makes regular presentations to our Board of Directors on the main areas of our business.

Corporate Governance

Holders of our Senior Notes and other interested parties may communicate with the Board of Directors, a committee or an individual director by writing to Novelis Inc., Two Alliance Center, 3560 Lenox Road N.E., Suite 2000, Atlanta, GA 30326, Attention: Corporate Secretary — Board Communication. All such communications will be compiled by the Corporate Secretary and submitted to the appropriate director or board committee. The Corporate Secretary will reply or take other actions in accordance with instructions from the applicable board contact.

Committees of Our Board of Directors

Our Board of Directors has established two standing committees: the Audit Committee and the Compensation Committee. Each committee is governed by its own charter. According to their authority as set out in their charters, our Board of Directors and each of its committees may engage outside advisors at the expense of Novelis.

Audit Committee and Financial Experts

Our Board of Directors has established an Audit Committee. Messrs. Stewart, Bhattacharya and Chandran are the members of the Audit Committee. Mr. Stewart, an independent director, has been identified as an “audit committee financial expert” as that term is defined in the rules and regulations of the SEC.

Our Audit Committee’s main objective is to assist our Board of Directors in fulfilling its oversight responsibilities for the integrity of our financial statements, our compliance with legal and regulatory requirements, the qualifications and independence of our independent registered public accounting firm and the performance of both our internal audit function and our independent registered public accounting firm. Under the Audit Committee charter, the Audit Committee is responsible for, among other matters:

- evaluating and compensating our independent registered public accounting firm;
- making recommendations to the Board of Directors and shareholder relating to the appointment, retention and termination of our independent registered public accounting firm;
- discussing with our independent registered public accounting firm its qualifications and independence from management;
- reviewing with our independent registered public accounting firm the scope and results of its audit;
- pre-approving all audit and permissible non-audit services to be performed by our independent registered public accounting firm;
- reviewing areas of potential significant financial risk and the steps taken to monitor and manage such exposures;
- overseeing the financial reporting process and discussing with management and our independent registered public accounting firm the interim and annual financial statements that we file with the SEC; and
- reviewing and monitoring our accounting principles, accounting policies and disclosure, internal control over financial reporting and disclosure controls and procedures.

Compensation Committee

Our Compensation Committee establishes our general compensation philosophy and oversees the development and implementation of compensation policies and programs. It also reviews and approves the level of and/or changes in the compensation of individual executive officers taking into consideration individual performance and competitive compensation practices. The committee’s specific roles and responsibilities are set out in its charter. Our Compensation Committee periodically reviews the effectiveness of our overall management organization structure and succession planning for senior management, reviews recommendations for the appointment of executive officers, and reviews annually the development process for high potential employees.

Code of Conduct and Guidelines for Ethical Behavior

Novelis has adopted a Code of Conduct and maintains a Code of Ethics for Senior Financial Officers that applies to our senior financial officers including our principal executive officer, principal financial officer, principal accounting officer, or persons performing similar functions. Copies of the Code of Conduct and the Code of Ethics for Senior Financial Officers are available on our website at www.novelis.com. We will promptly disclose any future amendments to these codes on our website as well as any waivers from these codes for executive officers and directors. Copies of these codes are also available in print from our Corporate Secretary upon request.

Item 11. Executive Compensation

This section provides a discussion of the background and objectives of our compensation programs for our named executive officers and other senior management employees. Our named executive officers are determined in accordance with rules of the Securities and Exchange Commission and include persons serving in the role of principal executive officer, persons serving in the role of principal financial officer and the three other highest paid executive officers who were employed by the Company on March 31, 2017.

Named Executive Officer for Fiscal 2017

Title

Steven Fisher	President and Chief Executive Officer
Devinder Ahuja	Senior Vice President, Chief Financial Officer ¹
Steven E. Pohl	Senior Vice President, Business Performance and Execution ²
Leslie J. Parrette	Senior Vice President, General Counsel, Compliance Officer and Corporate Secretary
Marco Palmieri	Senior Vice President and President, Novelis North America
Emilio Braghi	Senior Vice President and President Novelis Europe

¹ Mr. Ahuja served as the Company's Chief Financial Officer since August 9, 2016.

² Mr. Pohl served as the Company's Interim Chief Financial Officer from October 19, 2015 to August 8, 2016.

Compensation Committee and Role of Management

The Compensation Committee of our board of directors (the Committee) is responsible for approving the compensation programs for our named executive officers and making decisions regarding specific compensation to be paid or awarded to them. The Committee acts pursuant to a charter approved by our board. Our Chief Human Resources Officer serves as the primary management liaison officer for the Committee. Our human resources and legal departments provide assistance to the Committee in the administration of the Committee's responsibilities.

Our named executive officers have no direct role in setting their own compensation. The Committee, however, meets with members of our management team to evaluate performance against pre-established goals, and management makes recommendations to the board regarding budgets, production and sales forecasts and other information, which affect certain goals. The Committee may seek input from our senior management concerning individual performance, expected future contributions and compensation matters generally.

Management assists the Committee by providing information needed or requested by the Committee (such as our performance against budget and objectives, historical compensation, compensation expense, current Company policies and programs, country-specific compensation practices, peer group metrics and peer group target pay levels) and by providing input and advice regarding potential changes to compensation programs and policies and their impact on the Company and its executives.

In the first quarter of each fiscal year, the Committee (1) reviews prior year performance and approves the distribution of short-term incentive and long term incentive earned payouts, if any, for the prior year, (2) reviews and approves base pay and short term incentive targets for executives for the current year, and (3) recommends to the board of directors the form of long term- incentive award vehicles and vesting performance criteria for the current cycle of the program. The Committee may employ alternative practices when appropriate under the circumstances.

Although the Committee did not independently engage a third party compensation consultant to assist in developing our fiscal 2017 compensation program, management worked with Mercer LLC (a global human resource consulting firm) to evaluate and benchmark our executive compensation program, and management reports Mercer's analysis to the Committee. Management also routinely reviews compensation surveys published by other leading global human resources consulting firms. Hay Group (a global human resource consulting firm) periodically assists management with the internal leveling of executive roles to ensure internal equity and external competitiveness of pay opportunities based on the scope and complexity of executive roles.

For executive compensation benchmarking purposes, management focuses on large global companies headquartered in the southeastern United States with whom Novelis may compete for executive talent, as well as other major companies in the manufacturing and materials sectors having revenues in excess of \$2 billion. The companies that comprise our peer group may change from year to year as a result of merger and acquisition activity or revenue growth of relevant companies that moves such companies into consideration. The peer group considered in management's most recent compensation competitive analysis consisted of the following companies:

AGCO
Air Products & Chemicals Inc.
Alcoa Inc.
Altria Group Inc.
Ashland

Berry Plastics Group Inc.
Eastman Chemical Co.
Genuine Parts Co.
Ingersoll- Rand PLC
Kennametal

Newell Rubbermaid
PPG Industries
Praxair
Southern Co.

While both the Committee and management review compensation data (in surveys and public filings) to confirm that our executive compensation program is competitive, the Committee retains discretion to set an individual executive's compensation. As a result, compensation for an executive may differ significantly from the survey or peer group data and may be influenced by factors including past performance, experience and potential, retention needs, job position and/or tenure. Management and the Committee focus on target compensation opportunities disclosed in survey and peer group compensation data (and not actual compensation earned, which is influenced by the historical company or individual performance of the survey and peer group participants).

Objectives and Design of Our Compensation Program

Our executive compensation program is designed to attract, retain, and reward talented executives who will contribute to our long-term financial and operational success and thereby build value for our shareholder. The program is organized around three fundamental principles:

- *Provide Total Cash and Total Direct Compensation Opportunities that are Competitive with Similar Positions at Comparable Companies:* To enable us to attract, motivate and retain qualified executives to build long-term shareholder value, total cash compensation (base pay plus annual short-term incentives) and total direct compensation (total cash compensation plus the value of long-term incentives) opportunities for each executive are targeted at levels to be market competitive and reflect the value paid to executives in similar positions at comparable companies and also be appropriately positioned within the Company to ensure internal equity based on the scope and complexity of the role as it is designed at Novelis.
- *A Substantial Portion of Total Direct Compensation Should be at Risk Because it is Performance-Based:* We believe an executive's actual compensation should be linked directly to the Company's short-term and long-term financial performance and each individual's annual contribution. Consequently, a substantial portion of an executive's total direct compensation should be at risk, with amounts that are paid dependent on actual performance against pre-established objectives for both the individual and financial goals of the Company. The portion of an individual's total direct compensation that is based upon these performance objectives and financial goals should increase as the individual's business responsibilities and job scope increase. Additionally, we believe performance that exceeds target goals should be appropriately rewarded and aligned with prevalent market practices.
- *A Substantial Portion of Total Direct Compensation Should be Delivered in the Form of Long-Term Performance Based Awards:* We believe a long-term stake in the sustained financial performance of Novelis effectively aligns executive and shareholder interests and provides motivation for enhancing shareholder value.

The Committee recognizes that the engagement of top talent in critical functions may require the recruitment of new executives and involve negotiations with individual candidates. As a result, the Committee may determine in a particular situation that it is in our best interests to negotiate a compensation package that varies from the principles set forth above.

Key Elements of Our Compensation Program

Our compensation program consists of four key elements: base pay, short-term (annual) incentives, long-term incentives, and employee benefits, which includes certain executive perquisites. The Committee reviews these compensation elements, generally during the first quarter of the fiscal year. On a regular basis, the Committee compares the competitiveness of these key elements to that of companies in our peer group and/or to available compensation survey market data. Our objective for named executive officer compensation is to be at or near the market median (50th percentile) for both target total cash compensation and total direct compensation. In fiscal 2017, Mercer LLC conducted a compensation analysis for us which revealed that our aggregate fiscal 2017 target total cash compensation and total direct compensation for our named executive officers were 83% and 71%, respectively, of the market median. This comparison was largely impacted by the changes in our Chief Financial Officer roles in fiscal 2017. Over time it is expected that these compensation metrics will move closer to the market median based on the executives' performance and as the executives' tenure in these roles lengthens. Unless otherwise indicated, all amounts paid in currencies other than U.S. dollars are reflected in the Compensation Discussion and Analysis in U.S. dollars as adjusted by the applicable exchange rates on March 31, 2017.

Base Pay. Based on market practices, we believe it is appropriate that a minimum portion of total direct compensation be provided in a form that is fixed and recognizes individual performance in the prior fiscal year. Any changes in base salaries are generally effective July 1 of the current year (i.e., the start of the Company's second quarter of the fiscal year), unless an executive is promoted or assumes a new role during the fiscal year. The Committee's objective is to position base salaries for the named executive officers at or near the median of comparable positions at companies in our peer group. In aggregate, fiscal 2017 salaries of our named executive officers were 88% of the market median.

Short-Term (Annual) Cash Incentives. We believe that an annual incentive opportunity is necessary to attract, retain and reward our executives. Our philosophy concerning annual incentive program design for executives is based on the guiding values below:

- Annual incentives should be directly linked with and clearly communicate the strategic priorities approved by our board of directors.
- Annual incentives should be primarily weighted on the achievement of Company-wide financial goals.
- Annual incentives should be 100% at-risk, and there should be a minimum financial performance threshold that must be attained to receive any payout.
- Performance goals should be sufficiently ambitious to drive enterprise value creation, but also be based on metrics that executives can meaningfully influence over the annual time frame, and payouts should not be concentrated on a single metric.
- Threshold, target and maximum opportunity payouts (as a percent of salary) should be comparable with opportunity payouts of executives in similar roles in other benchmark companies or industries.
- The Committee retains the discretion to adjust, up or down, annual incentives earned based on the Committee's subjective assessment of individual performance.

Our Committee and board of directors, after input from management, approved our fiscal 2017 annual incentive plan (2017 AIP) during the first quarter of fiscal 2017. The performance benchmarks for the year were tied to four key metrics: (1) the Company's earnings before interest, taxes, depreciation and amortization (EBITDA) performance; (2) the Company's free cash flow performance; (3) the executive's individual performance in recognition of each individual's unique job responsibilities and annual objectives; and (4) the company's performance against safety goals of reduction in serious injuries and reduction in total recordable incidents.

No 2017 AIP bonuses are payable with respect to any of the three incentive metrics unless overall Novelis EBITDA performance for fiscal 2017 achieves at least 75% of the financial target. If the EBITDA threshold is achieved, the actual payout under the two financial metrics will range from 50% to 200% of target payout opportunity depending upon the actual performance results attributable to each metric, and the actual payout under the metric for individual performance can range from 0% to 200% of target payout opportunity. Actual performance below the threshold for a particular metric results in no payout for that metric.

The table below shows the 2017 AIP target and actual performance for each goal and the amount earned based on actual performance rounded to the nearest whole dollar.

Name	Target Bonus as Percentage of Salary (A)	Performance Objective (B)	Performance Weighting	Targeted Performance (\$) (B)	Actual Performance (\$) (C)	Actual Performance as a Percentage of Target Performance
Steven Fisher	110%	EBITDA	40%	343,200	389,875	114%
		Cash Flow	35%	300,300	600,600	200%
		Personal	15%	128,700	154,440	120%
		Safety	10%	85,800	—	—%
			100%	858,000	1,144,915	133%
Devinder Ahuja	54%	EBITDA	40%	108,280	122,999	114%
		Cash Flow	35%	94,745	189,479	200%
		Personal	15%	40,605	40,603	100%
		Safety	10%	27,070	37,896	140%
			100%	270,700	390,977	144%
Steven E. Pohl	56%	EBITDA	40%	90,214	102,483	114%
		Cash Flow	35%	78,937	157,874	200%
		Personal	15%	33,830	40,596	120%
		Safety	10%	22,553	31,575	140%
			100%	225,534	332,528	147%
Leslie Parrette	70%	EBITDA	40%	156,030	177,250	114%
		Cash Flow	35%	136,526	273,053	200%
		Personal	15%	58,511	58,511	100%
		Safety	10%	39,008	54,611	140%
			100%	390,075	563,425	144%
Marco Palmieri	65%	EBITDA	40%	103,626	117,719	114%
		Cash Flow	35%	90,673	181,345	200%
		Personal	15%	38,860	77,719	200%
		Safety	10%	25,906	36,269	140%
			100%	259,065	413,052	159%
Emilio Braghi	54%	EBITDA	40%	72,307	82,140	114%
		Cash Flow	35%	63,268	126,537	200%
		Personal	15%	27,115	27,115	100%
		Safety	10%	18,077	25,307	140%
			100%	180,767	261,099	144%

- (A) Mr. Ahuja's target bonus is prorated to reflect his hire date of July 15, 2016. Mr. Pohl's target bonus is prorated to reflect the change in his bonus target on June 6, 2016 from 40% to 60% of his salary.
- (B) Fiscal 2017 AIP performance metric definitions are set forth in the 2017 AIP.
- (C) As leader of the organization, Mr. Fisher will not receive a payout for the Global Safety component as a result of a fatality that occurred at one of our manufacturing plants during the fiscal year.

Long-Term Incentives. We believe a long-term incentive program that comprises a substantial portion of each executive's total direct compensation opportunity is necessary to reward our executives. Our philosophy concerning long-term incentive design for executives is based on the guiding values below:

- Long-term incentives should motivate achievement of long-term strategic and financial goals and incentivize actions that are intended to create sustainable value for our shareholder.
Long-term incentives should be designed to effectively retain valuable executive talent.
Long-term incentives should create a clear and understandable platform for wealth creation that is tied closely with the long-term performance of Novelis.
A majority of the long-term incentive award value should be at risk and tied to financial performance.
Vesting schedules generally should span several years to reward long-term service.
- The value of long-term incentives as a percent of salary should be competitive with opportunity payouts of executives in similar roles in other benchmark companies or industries.

During the first quarter of fiscal 2017, the Committee authorized a long-term incentive plan covering fiscal years 2017 through 2019 (2017 LTIP). Under the 2017 LTIP, participants were awarded three types of long-term incentive vehicles. Twenty percent of a participant's total long-term incentive opportunity consists of performance-based Hindalco stock appreciation rights (Hindalco SARs), 30% of the long-term incentive opportunity consists of Hindalco restricted stock units (Hindalco RSUs) and the remaining 50% consists of Novelis Performance Units ("Novelis PUs"). For additional information, see the table below setting forth grants of plan-based awards in fiscal 2017. The actual number of Hindalco SARs awarded are determined using a Black Scholes methodology. The Committee approved the fiscal 2017 long-term incentive awards for our named executive officers.

Hindalco SARs awarded in fiscal 2017 have seven year terms and vest at a rate of 33.33% per year measured from the initial grant date; provided the Company achieves the 75% EBITDA threshold. If the EBITDA threshold is not achieved, then the portion of the SARs that would otherwise vest for that year will be forfeited. Each SAR is to be settled in cash at the time of exercise based on the appreciation in value of one Hindalco share from the date of award through the date of exercise. Payout of Hindalco SARs is limited to three times the award value. SARs do not transfer any shareholder rights to a participant, and dividend equivalents are neither accumulated nor paid at any time. Hindalco RSUs awarded in fiscal 2017 vest at a rate of 33.33% per year over three years and are not subject to performance criteria. Payout of Hindalco RSUs is also limited to three times the award value. RSUs do not transfer any shareholder rights to a participant, and dividend equivalents are neither accumulated nor paid at any time.

Novelis PUs are at risk and are measured over a three year performance period. At the end of the performance period, the number of units earned will be calculated based on the Company's average return on capital employed (ROCE) over the performance period. Actual payout will range from 50% (threshold) to 200% (maximum) of target award value, based on actual results, and will be paid in cash. Performance results between threshold level and target level or between target level and maximum level are determined by means of interpolation. To receive payment of Novelis PUs, a participant must remain employed by Novelis through the end of the performance period, subject to certain exceptions, including death, disability and retirement. For our executive officers, the number of Novelis PUs earned were subject to an additional adjustment based on the Company's net debt to EBITDA ratio for the performance period. Under the 2017 LTIP rules, if the net debt to EBITDA ratio is greater than 4.0 at the end of the performance period, the number of Novelis PUs earned will be multiplied by 50%; and if the ratio is less than or equal to 4.0, the number of Novelis PUs earned will be multiplied by 120%.

In connection with the redesign of the Company's long term incentive plan for fiscal 2017, participants were offered a one-time opportunity to exchange their outstanding Novelis stock appreciation rights ("Novelis SARs"), other than those granted with respect to fiscal year 2011, for Novelis PUs. Participants who elected to exchange their Novelis SARs received Novelis PUs, and their outstanding Novelis SARs (except those granted for fiscal 2011) were canceled.

The table below shows the aggregate target long-term incentive of our named executive officers under the 2017 LTIP.

Named Executive Officer	2017 LTIP Award (\$)
Steven Fisher	2,800,000
Devinder Ahuja	405,000
Steven E. Pohl	300,000
Leslie Parrette	700,000
Marco Palmieri	700,000
Emilio Braghi	360,000

The Indian Rupee exchange rate is fixed on the date of the LTIP award so that the awards are not subject to fluctuating currency exchange rates.

Employee Benefits. Our named executive officers are eligible to participate in our broad-based retirement, health and welfare, and other employee benefit plans on the same basis as other Company employees. In addition to these broad-based plans, some of our named executive officers may be eligible for certain non-qualified retirement benefits, which are designed to provide levels of retirement benefits that are limited under broad-based retirement plan caps mandated by certain regulatory restrictions on highly-compensated employees. Our named executive officers are also eligible for certain perquisites consistent with market practice. We do not view our executive perquisites as a significant element of our overall compensation structure. See the All Other Compensation column and related footnotes to the Summary Compensation Table for further information about perquisites.

Employment-Related Agreements

Retention Agreements. We enter into retention agreements from time to time with certain key employees, including our named executive officers. These retention agreements are intended to supplement our long-term incentive program and sometimes are entered into to reflect changes in responsibilities or other special circumstances. Retention amounts are paid in cash provided the employee remains employed with the Company through the applicable vesting date. In most cases, the retention awards vest ratably over a three-year retention period. If the employee voluntarily terminates employment or is terminated by the Company for cause prior to the expiration date of the retention award, the employee will be required to repay any payments made under the agreement in the previous 12 months and will not be entitled to any other payments under the retention agreement. If an employee is terminated involuntarily without cause, any unpaid cash installments under the retention agreement will be forfeited. Any amounts paid to our named executive officers under a retention award during fiscal 2017 are shown in the Summary Compensation Table. The following chart is a summary of outstanding retention awards.

Name	Agreement Date	Payment Date										
		Dec-'14	Mar-'15	Dec-'15	Mar-'16	Jul-'16	Dec-'16	Mar-'17	Jul-'17	Dec-'17	Jul-'18	Dec-'18
Steven Fisher	Jul-'14	50,000		25,000			25,000					
	Jun-'16					180,000			180,000		240,000	
Steven E Pohl	Jul-'14	20,000		10,000			10,000					
	Jun-'15			12,000			12,000			16,000		
	Jun-'16					100,000			100,000			
Leslie Parrette	Jul-'14	37,500		18,750			18,750					
	Jun-'15			22,500			22,500			30,000		
	Jul-'16						22,500			22,500		30,000
Marco Palmieri	Jul-'14	50,000		25,000			25,000					
	Jun-'15			30,000			30,000			40,000		
	Jul-'16						30,000			30,000		40,000
Emilio Braghi	Jul-'14	20,000		10,000			10,000					
	Jan-'15		92,255		92,254			92,254				
	Jun-'15			15,000			15,000			20,000		
	Jul-'16						15,000			15,000		20,000

Change in Control Agreements. Each of Messrs. Fisher, Ahuja, Parrette and Palmieri were party to a Change in Control Agreement during fiscal 2017, which provides that the executive will be entitled to certain payments and benefits if the executive's employment is terminated by the Company without cause, or by the executive for good reason, within 24 months following a change in control of the Company. The change in control severance payment is equal to 2.0 times the sum of the executive's annual base salary plus target short-term incentive for the year and is payable in a lump sum. The executive may also receive (i) a special one-time payment to assist with post-employment medical coverage; (ii) continuation of coverage under the Company's group life insurance plan for a period of 12 months; (iii) 12 months of additional credit for benefit accrual or contribution purposes under our retirement plans; and (iv) accelerated vesting, if applicable, under our retirement plans.

Severance Compensation Agreements. We have severance arrangements with our named executive officers (except for Mr. Braghi, whose severance arrangements are subject to local law and practice), which provide that the executive will be entitled to certain payments and benefits if their employment is terminated by the Company without cause. The severance payment is equal to either 1.5 times or 2.0 times the sum of the executive's annual base salary and annual incentive target (as in effect at the executive's termination date or as in effect on the date of the executive's employment agreement, depending on the terms of the executive's employment agreement). Severance payments are payable in a lump sum. The executive may also receive (i) a special one-time payment to assist with post-employment medical coverage; (ii) continuation of coverage under the Company's group life insurance plan for a period of 12 months; (iii) 12 months of additional credit for benefit accrual or contribution purposes under our retirement plans; and (iv) accelerated vesting, if applicable, under our retirement plans. Each agreement also contains a noncompetition and non-solicitation provision which prohibits the executive from competing with us or soliciting our customers, suppliers or employees for a period of 18 months following termination (or 24 months in the case of Mr. Fisher). An executive may be required to sign a general release of claims against the Company as a condition to receiving the payments and benefits described above. See Potential Payments Upon Termination or Change in Control below for further information.

Compensation Risk Assessment

In fiscal 2017, the Committee reviewed the Company's executive compensation policies and practices, and determined that the Company's executive compensation programs are not reasonably likely to have a material adverse effect on the Company. Our compensation programs contain design features that mitigate the incentive for our employees, including named executive officers, to take unreasonable risks in managing the business, which include:

- An appropriate balance between short-term and long-term incentive compensation with multiple time horizons;
- Short-term incentives that provide for lower payouts for lower performance and higher payouts for higher performance;
- Short-term incentives that require minimum financial performance to achieve any payouts and also set capped maximum payouts at 200% of target;
- Short-term incentive payouts that are tied to multiple performance factors with no one performance factor having excessive weighting;
- Long-term incentives with multi-year vesting schedules, which reward employees for long-term performance;
- Goals that are not unreasonable and that are approved by the Committee on an annual basis and goals with no excessive payout opportunities at certain performance levels that may encourage short-term decisions and actions to meet payout thresholds;
- Oversight of the compensation programs by the Committee and multiple functions within the Company and at various levels within the functions to gain different viewpoints and prevent a small number of people to be exclusively involved in compensation decisions; and
- Advice from expert outside advisors regarding the design of the compensation program.

Based on its review, the Committee determined that the Company's compensation programs do not encourage excessive risk and instead encourage behaviors that support sustainable value creation.

Compensation Committee Report

The Committee has reviewed and discussed the foregoing Compensation Discussion and Analysis with management. Based on the Committee's review and discussions with management, the Committee recommended to the board of directors that the Compensation Discussion and Analysis be included in the Company's Annual Report on Form 10-K for fiscal 2017.

The foregoing report is provided by the following directors, who constitute the Committee:

Mr. Clarence J. Chandran, Chairman
Mr. Debnarayan Bhattacharya
Mr. Askaran Agarwala
Mr. Satish Pai

Summary Compensation Table

The table below sets forth information regarding compensation for our named executive officers for fiscal 2017 and the two prior fiscal years, as applicable. Any amounts paid to our named executive officers in a foreign currency are reflected in the table below and elsewhere in U.S. dollars as adjusted by the March 31, 2017 exchange rate.

Name and Principal Position	Fiscal Year	Salary (\$)	Bonus (\$)	Stock Awards (\$) (C)	Options Awards (\$) (C)	Non-Equity Incentive Plan Compensation (\$) (D)	All Other Compensation (\$) (E)	Total Compensation (\$)
Steven Fisher, President and Chief Executive Officer	2017	771,462	—	840,000	560,000	1,144,916	412,118	3,728,496
	2016	676,128	350,000	500,000	2,000,000	1,007,822	204,512	4,738,462
	2015	545,607	—	170,000	680,000	577,545	195,925	2,169,077
Devinder Ahuja, Senior Vice President and Chief Financial Officer	2017	334,615	350,000 (A)	121,500	81,000	390,978	251,786	1,529,879
Steven E. Pohl, Senior Vice President Business Performance and Execution	2017	386,453	100,000 (B)	90,000	60,000	332,528	238,702	1,207,683
	2016	332,889	110,000	36,000	144,000	180,074	143,560	946,523
Leslie Parrette, Senior Vice President, General Counsel, Compliance Officer and Corporate Secretary	2017	551,888	—	210,000	140,000	563,426	202,678	1,667,992
	2016	534,185	—	140,000	560,000	505,026	171,325	1,910,536
	2015	518,626	—	120,000	480,000	393,298	176,710	1,688,634
Marco Palmieri, Senior Vice President and President of Novelis North America	2017	624,017	—	210,000	140,000	413,053	734,738	2,121,808
	2016	602,945	—	140,000	560,000	303,027	886,389	2,492,361
	2015	560,961	—	130,000	520,000	291,260	885,784	2,388,005
Emilio Braghi, Senior Vice President and President of Novelis Europe	2017	336,546	—	108,000	72,000	261,100	1,112,597	1,890,243

(A) This amount reflects a sign-on bonus.

(B) This amount reflects cash awards in respect of Mr. Pohl's services as Interim CFO.

(C) These awards are granted under the 2017 LTIP.

(D) This amount reflects the cash award earned under the 2017 AIP.

(E) The amounts shown in this column reflect the values from the table below.

All Other Compensation Table

Name	Company Contribution to Defined Contribution Plans and Nonqualified Plans (A) (\$)	Group Life Insurance (\$)(B)	Retention Payments (\$)(C)	Relocation, Assignee and Housing Related Payments (\$)	Other Perquisites and Personal Benefits (\$)	Total (\$)
Steven Fisher	140,501	4,122	205,000	—	62,495 (G)	412,118
Devinder Ahuja	31,442	2,844	—	183,020 (D)	34,480 (H)	251,786
Steven E. Pohl	45,081	2,275	144,500	—	46,846 (H)	238,702
Leslie Parrette	87,758	3,170	63,750	—	48,000 (H)	202,678
Marco Palmieri	46,613	1,014	85,000	586,956 (E)	15,155 (I)	734,738
Emilio Braghi	6,410	1,168	132,254	800,608 (F)	172,157 (J)	1,112,597

(A) All company contributions made to government social security systems have been excluded.

(B) This amount represents additional Company-paid life insurance for named executive officers beyond the regular employee coverage.

(C) These amounts represent payments pursuant to retention agreements as detailed above under Employee Related Agreements.

(D) This amount represents relocation related costs for Mr. Ahuja.

(E) This amount includes \$38,835 for housing allowance and related costs, \$58,458 goods and services adjustment, \$18,287 home leave, and \$471,376 related to tax payments for foreign assignment.

(F) This amount includes \$91,635 for relocation and immigration expenses, \$148,617 for housing allowance and related costs, \$78,681 goods and services adjustment, \$35,576 home leave, and \$446,099 related to tax payments for foreign assignment.

(G) This amount includes \$60,000 flex allowance and \$2,495 executive physical.

(H) This amount represents executive flex allowance.

(I) This amount represents \$11,750 for auto lease, \$500 imputed value of tax preparation, \$805 for other foreign compensation and \$2,100 for other foreign assignment related expenses.

(J) This amount represents \$153,495 for tuition, \$3,433 auto lease, \$500 imputed value of tax preparation, and \$14,729 for other foreign assignment related expenses.

Grants of Plan-Based Awards in Fiscal 2017

The table below sets forth information regarding grants of plan-based awards made to our named executive officers during fiscal 2017 pursuant to our 2017 AIP and 2017 LTIP.

Name	Grant Date	Estimated Future Payout Under Non-Equity Incentive Plan Awards			All Other Stock Awards: Number of Shares or Stock Units	All Other Option Awards: Number of Securities Underlying Options	Award Type	Exercise or Base Price of Option Awards (\$/Sh)	Grant Date Fair Value of Stock and Option Awards
		Threshold (\$)	Target	Maximum					
Steven Fisher	5/5/2016	441,870	858,000	1,716,000	—	—	AIP	—	
	5/5/2016	—	—	—	614,042	—	Hindalco RSU	840,000	
	5/5/2016	—	—	—	—	845,962	Hindalco SAR	0.66	
	5/5/2016	350,000	1,400,000	3,360,000	—	—	Novelis PU	—	
	5/5/2016	443,625	1,774,500	4,258,800	—	—	Exchanged Novelis PU	—	
Devinder Ahuja	7/15/2016	139,411	270,700	541,400	—	—	AIP	—	
	10/1/2016	—	—	—	53,705	—	Hindalco RSU	121,500	
	10/1/2016	—	—	—	—	73,989	Hindalco SAR	1.09	
	10/1/2016	50,625	202,500	486,000	—	—	Novelis PU	—	
Steven E. Pohl	5/5/2016	116,150	225,534	451,069	—	—	AIP	—	
	5/5/2016	—	—	—	65,791	—	Hindalco RSU	90,000	
	5/5/2016	—	—	—	—	90,639	Hindalco SAR	0.66	
	5/5/2016	37,500	150,000	360,000	—	—	Novelis PU	—	
	5/5/2016	37,925	151,700	364,080	—	—	Exchanged Novelis PU	—	
Leslie Parrette	5/5/2016	200,889	390,076	780,151	—	—	AIP	—	
	5/5/2016	—	—	—	153,511	—	Hindalco RSU	210,000	
	5/5/2016	—	—	—	—	211,491	Hindalco SAR	0.66	
	5/5/2016	87,500	350,000	840,000	—	—	Novelis PU	—	
	5/5/2016	156,200	624,800	1,499,520	—	—	Exchanged Novelis PU	—	
Marco Palmieri	5/5/2016	133,418	259,065	518,129	—	—	AIP	—	
	5/5/2016	—	—	—	153,511	—	Hindalco RSU	210,000	
	5/5/2016	—	—	—	—	211,491	Hindalco SAR	0.66	
	5/5/2016	87,500	350,000	840,000	—	—	Novelis PU	—	
	5/5/2016	149,700	598,800	1,437,120	—	—	Exchanged Novelis PU	—	
Emilio Braghi	5/5/2016	93,095	180,767	361,533	—	—	AIP	—	
	5/5/2016	—	—	—	48,247	—	Hindalco RSU	66,000	
	5/5/2016	—	—	—	—	66,469	Hindalco SAR	0.66	
	5/5/2016	55,000	110,000	220,000	—	—	Novelis PU	—	
	5/5/2016	83,000	166,000	332,000	—	—	Exchanged Novelis PU	—	
	10/1/2016	—	—	—	18,565	—	Hindalco RSU	42,000	
	10/1/2016	—	—	—	—	25,577	Hindalco SAR	1.09	
10/1/2016	17,500	70,000	168,000	—	—	Novelis PU	—		

Outstanding Equity Awards as of March 31, 2017

Name	LTIP Year	Hindalco Options				Hindalco RSUs	
		Number of Securities Underlying Unexercised Options # Exercisable	Number of Securities Underlying Unexercised Options # Unexercisable	Option Exercise Price (\$)	Option Expiration Date	Number of Shares or Units of Stock That Have Not Vested	Market Value of Shares or Units of Stock That Have Not Vested
Steven Fisher	2017	—	845,962	1.37	May 5, 2023	614,042	1,730,761
	2016	78,799	236,397	2.10	May 7, 2022	90,462	264,866
	2016	—	745,703	1.09	May 7, 2022	285,356	817,086
	2015	117,042	117,042	2.43	May 13, 2021	69,960	219,190
	2014	227,163	75,722	1.91	May 13, 2020	—	—
	2013	—	—	1.98	May 22, 2019	—	—
	2012	83,644	—	4.28	May 20, 2018	—	—
	2011	—	—	3.13	May 25, 2017	—	—
Devinder Ahuja	2017	—	73,989	2.26	October 1, 2023	53,705	151,378
Steven E. Pohl	2017	—	90,639	1.37	May 5, 2023	65,791	185,441
	2016	—	44,792	2.10	May 7, 2022	17,141	50,188
	2015	—	20,654	2.43	May 13, 2021	12,346	38,681
	2014	—	13,983	1.91	May 13, 2020	—	—
	2013	—	—	1.98	May 22, 2019	—	—
	2012	14,166	—	4.28	May 20, 2018	—	—
	2011	—	—	3.13	May 25, 2017	—	—
Leslie Parrette	2017	—	211,491	1.37	May 5, 2023	153,511	432,692
	2016	—	174,188	2.10	May 7, 2022	66,656	195,164
	2015	—	82,618	2.43	May 13, 2021	49,384	154,724
	2014	—	53,450	1.91	May 13, 2020	—	—
	2013	—	—	1.98	May 22, 2019	—	—
	2012	—	—	4.28	May 20, 2018	—	—
	2011	—	—	3.13	May 25, 2017	—	—
Marco Palmieri	2017	—	211,491	1.37	May 5, 2023	153,511	432,692
	2016	—	174,188	2.10	May 7, 2022	66,656	195,164
	2015	—	89,502	2.43	May 13, 2021	53,499	167,616
	2014	—	55,054	1.91	May 13, 2020	—	—
	2013	—	—	1.98	May 22, 2019	—	—
	2012	—	—	4.28	May 20, 2018	—	—
Emilio Braghi	2017	—	66,469	1.37	May 5, 2023	48,247	135,991
	2017	—	25,577	2.26	October 1, 2023	18,565	52,329
	2016	16,590	49,767	2.10	May 7, 2022	19,045	55,762
	2015	20,655	20,654	2.43	May 13, 2021	12,346	38,681
	2014	11,652	11,653	1.91	May 13, 2020	—	—
	2013	8,805	—	1.98	May 22, 2019	—	—
	2012	9,371	—	4.28	May 20, 2018	—	—
	2011	7,107	—	3.13	May 25, 2017	—	—

In addition, Mr. Braghi has 195 vested Novelis SARs under the 2011 LTIP with an exercise price of \$63.23.

Option Exercises and Stock Vested in Fiscal Year 2017

The table below sets forth the information regarding stock options that were exercised during fiscal 2017 and stock awards that vested and were paid out during fiscal 2017.

Name	Options Awards		Stock Awards	
	Number of Shares Acquired on Exercise, but Settled in Cash	Value Realized on Exercise (\$ USD)	Number of Shares Acquired on Vesting, but Settled in Cash	Value Realized on Vesting (\$ USD)
Steven Fisher	567,918	705,585	88,967	147,711
Devinder Ahuja	—	—	—	—
Steven E. Pohl	95,292	95,529	16,429	27,277
Leslie Parrette	581,599	737,319	62,800	104,266
Marco Palmieri	218,835	227,622	64,684	107,394
Emilio Braghi	40,160	58,406	13,691	22,731

Non-Qualified Deferred Compensation

This table summarizes contributions and earnings under our Defined Contribution Supplemental Executive Retirement Plan for fiscal year 2017. The plan is an unfunded, non-qualified defined contribution plan for U.S. based executives. The plan provides eligible executives with the opportunity to voluntarily defer, on a pretax basis, a portion of their base salary and annual incentive pay that otherwise may not be deferred under the Company's tax-qualified savings plan due to limitations under the U.S. Internal Revenue Code. The plan also provides eligible executives with Company non-elective and matching contribution credits which they are restricted from receiving under the tax-qualified savings plan due to those same limitations.

Name	Elective Contributions in Last Fiscal Year (\$)	Registrant Contributions in Last Fiscal Year (\$)	Aggregate Earnings in Last Fiscal Year (\$)	Aggregate Withdrawals/ Distributions (\$)	Aggregate Balance at Last Fiscal Year End (\$)
Steven Fisher	—	114,669	24,965	—	1,000,622
Devinder Ahuja	—	—	—	—	—
Steven E. Pohl	—	21,081	1,959	—	78,572
Leslie Parrette	—	62,170	7,126	—	343,726

Potential Payments Upon Termination or Change in Control

This section provides an estimate of the payments and benefits that would be paid to certain of our named executive officers, on March 31, 2017, upon voluntary termination or involuntary termination of employment without cause and were adjusted by the March 31, 2017 Brazilian Real and Euro exchange rates for Mr. Palmieri and Mr. Braghi respectively. This section, however, does not reflect any payments or benefits that would be paid to our salaried employees generally, including for example accrued salary and vacation pay; regular retirement plan benefits under our defined contribution plans; or normal retirement, death or disability benefits. See Employment Related Agreements above for a discussion of the change in control, severance compensation and retention agreements for our named executive officers and any restrictive covenants contained therein.

Name	Type of Payment	Voluntary Termination by Executive (\$)	Termination by Us without Cause (\$)	Termination in Connection with CIC by Us without Cause or by Executive for Good Reason(\$)	Death or Disability (\$)
Steven Fisher	Short-Term Incentive Pay (A)	858,000	858,000	858,000	858,000
	Long-Term Incentive Plan (B)	549,755	3,872,863	7,760,173	7,192,059
	Severance (C)	—	3,000,000	3,000,000	—
	Retirement plans (D)	—	140,501	140,501	—
	Lump sum cash payment for continuation of health coverage (E)	—	35,658	35,658	—
	Continued group life insurance coverage (F)	—	4,122	4,122	—
	Total		1,407,755	7,911,144	11,798,454
Devinder Ahuja	Short-Term Incentive Pay (A)	270,685	380,000	380,000	270,685
	Long-Term Incentive Plan (B)	—	56,854	234,956	234,956
	Severance (C)	—	1,320,000	1,760,000	—
	Retirement plans (D)	—	31,442	31,442	—
	Lump sum cash payment for continuation of health coverage (E)	—	35,658	35,658	—
	Continued group life insurance coverage (F)	—	2,844	2,844	—
	Total		270,685	1,826,798	2,444,900
Steven E Pohl	Short-Term Incentive Pay (A)	225,534	240,000	225,534	225,534
	Long-Term Incentive Plan (B)	841	300,944	593,842	571,321
	Severance (C)	—	960,000	—	—
	Retirement plans (D)	—	45,081	—	—
	Lump sum cash payment for continuation of health coverage (E)	—	35,658	—	—
	Continued group life insurance coverage (F)	—	2,275	—	—
	Total		226,375	1,583,958	819,376
Leslie Parrette	Short-Term Incentive Pay (A)	390,076	390,076	390,076	390,076
	Long-Term Incentive Plan (B)	—	971,494	1,735,577	1,647,733
	Severance (C)	—	1,420,990	1,894,653	—
	Retirement plans (D)	—	87,758	87,758	—
	Lump sum cash payment for continuation of health coverage (E)	—	10,829	10,829	—
	Continued group life insurance coverage (F)	—	3,170	3,170	—
	Total		390,076	2,884,317	4,122,063
Marco Palmieri	Short-Term Incentive Pay (A)	259,065	259,065	259,065	259,065
	Long-Term Incentive Plan (B)	—	977,938	1,744,538	1,655,948
	Severance (C)	—	1,315,251	1,315,251	—
	Retirement plans (D)	—	48,385	48,385	—
	Lump sum cash payment for continuation of health coverage (E)	—	20,755	20,755	—
	Continued group life insurance coverage (F)	—	1,031	1,031	—
	Total		259,065	2,622,425	3,389,025
Emilio Braghi	Short-Term Incentive Pay (A)	180,767	180,767	180,767	180,767
	Long-Term Incentive Plan (B)	74,408	364,273	658,971	634,194
	Severance (C)	—	448,728	448,728	—
	Retirement plans (D)	—	6,410	6,410	6,410
	Lump sum cash payment for continuation of health coverage (E)	—	—	—	—
	Continued group life insurance coverage (F)	—	—	—	—
	Total		255,175	1,000,178	1,294,876

- (A) These amounts represent 100% of the executive's target AIP opportunity for the fiscal year.
- (B) These amounts reflect the estimated value of the vested SARs, RSUs and PUs granted pursuant to our long term incentive plans.
- (C) These amounts would be paid pursuant to the executive's severance agreement. Except for the retirement and life insurance benefits, these amounts would be paid in a single lump sum following termination of employment. The retirement benefit represents one additional year of benefit accrual or contribution credit, as applicable. The life insurance benefit represents the estimate value of coverage for one additional year.
- (D) Under the executive's change in control agreement, these amounts would be paid to the executive if his employment is terminated without cause, or he resigns for good reason, within 24 months of a change of control. Except for the retirement and life insurance benefits, these amounts would be paid in a single lump sum following termination of employment. The retirement benefit represents one additional year of benefit accrual or contribution credit, as applicable. The life insurance benefit represents the estimate value of coverage for one additional year.
- (E) This amount is intended to assist the executive in paying post-employment health coverage for 12 months. This amount would be paid in a single lump sum following termination of employment.
- (F) This amount represents the estimated value of one additional year of coverage under our group and executive life insurance plans.

Director Compensation for Fiscal 2017

The Chairman of our board of directors is entitled to receive cash compensation equal to \$250,000 per year, and the Chair of our Audit Committee is entitled to receive \$175,000 per year. Each of our other directors is entitled to receive compensation equal to \$150,000 per year, plus an additional \$5,000 if he is a member of our Audit Committee. Directors' fees are ordinarily paid in quarterly installments.

Since July 2008, our Chairman, Mr. Birla has declined to receive the director compensation to which he is entitled. All directors continue to receive reimbursement for out of pocket expenses associated with attending board and Committee meetings. The table below sets forth the total compensation received by our directors for fiscal 2017.

Name	Fees Earned or Paid in Cash (\$)
Kumar Mangalam Birla	—
D. Bhattacharya	155,000
Askaran K. Agarwala	150,000
Clarence J. Chandran	155,000
Donald A. Stewart	175,000
Satish Pai	150,000

Compensation Committee Interlocks and Insider Participation

In fiscal 2017, Clarence J. Chandran was the Chairman of the Committee. The other Committee members during all or part of the year were Mr. D. Bhattacharya, Mr. Askaran Agarwala and Mr. Satish Pai. During fiscal 2017, none of our executive officers served as:

- a member of the Committee (or other board committee performing equivalent functions or, in the absence of any such committee, the entire board of directors) of another entity, one of whose executive officers served on our Committee;
- a director of another entity, one of whose executive officers served on our Committee; or
- a member of the Committee (or other board committee performing equivalent functions or, in the absence of any such committee, the entire board of directors) of another entity, one of whose executive officers served as one of our directors.

Fiscal Year 2018 Incentive Compensation Plans

On May 5, 2017, our board of directors approved our fiscal 2018 Annual Incentive Plan (2018 Executive AIP) and a long term incentive plan covering fiscal years 2018 through 2020 (2018 Executive LTIP). The target amounts for each plan for our named executive officers are as follows:

Name	2018 Executive AIP Target (as % of base salary)	2018 Executive LTIP Target Awarded May 5, 2017 (\$)
Steven Fisher	111%	3,240,000
Devinder Ahuja	80%	500,000
Steven E. Pohl	60%	400,000
Leslie Parrette	70%	700,000
Marco Palmieri	65%	760,000
Emilio Braghi	60%	480,000

Item 12. *Security Ownership of Certain Beneficial Owners and Management and Related Shareholder Matters*

On May 15, 2007, the Company was acquired by Hindalco through its indirect wholly-owned subsidiary AV Metals Inc. pursuant to a plan of arrangement entered into on February 10, 2007 and approved by the Ontario Superior Court of Justice on May 14, 2007.

Subsequent to completion of the Arrangement on May 15, 2007, all of our common shares were indirectly held by Hindalco.

Item 13. *Certain Relationships and Related Transactions and Director Independence*

We maintain various policies and procedures that govern related party transactions. Pursuant to our Code of Conduct and our Code of Ethics for Senior Financial Officers, senior managers and directors of the company (a) must avoid any action that creates or appears to create, a conflict of interest between their own interest and the interest of the company, (b) cannot usurp corporate opportunities, and (c) must deal fairly with third parties. This policy is available on our website at www.novelis.com. In addition, we have enacted procedures to monitor related party transactions by (x) identifying possible related parties through questions in our director and officer questionnaires, (y) determining whether we receive payments from or make payments to any of the identified related parties, and (z) if we determine payments are made or received, researching the nature of the interactions between the company and the related parties and ensuring that the related person does not have an interest in the transaction with the company. The Audit Committee is responsible for reviewing material related party transactions that involve the company, one of our directors or executive officers or any of their immediate family members.

We have entered into various transactions with our parent company, Hindalco, and its affiliates for the sale of products and services of less than \$1 million in the aggregate and purchases of \$3 million. In addition, we loaned \$3 million to a subsidiary of Hindalco which has been repaid during the quarter ended March 31, 2017. These transactions are not material to Novelis individually or in the aggregate. Because of the relationship four of our directors have with Hindalco, we consider these sales to be related party transactions.

Item 14. Principal Accountant Fees and Services

PricewaterhouseCoopers LLP has served as our independent registered public accounting firm since our spin-off from Alcan on January 6, 2005. The following table shows fees and expenses paid to PricewaterhouseCoopers LLP for services rendered for the years ended March 31, 2017 and 2016:

	March 31,	
	2017	2016
Audit fees (1)	\$ 7,124,817	\$ 6,292,273
Audit-Related Fees (2)	—	235,235
Tax Fees (3)	56,373	70,004
All Other Fees (4)	597,356	52,029
Total	\$ 7,778,546	\$ 6,649,541

- (1) Represent fees for professional services rendered and expenses incurred for the audit of the Company's annual financial statements, review of financial statements included in the Company's Form 10-Qs and services that are normally provided by PricewaterhouseCoopers LLP in connection with statutory and regulatory filings or engagements for those fiscal periods.
- (2) Represent fees for assurance related services that are reasonably related to the performance of the audit or review of our consolidated financial statements and are not reported under "Audit Fees." In the fiscal year ended March 31, 2016, this fee includes consultations on accounting and disclosure matters as well as quality assurance assessment of certain ERP functionalities. Note that the nature of such advice did not result in the principal auditor firm acting in a management function or providing services that were considered book-keeping in nature.
- (3) In the fiscal year ended March 31, 2017, this fee includes procedures performed related to transfer pricing studies and customs valuation audits. In the fiscal year ended March 31, 2016, this fee includes procedures performed related to transfer pricing studies.
- (4) In the fiscal year ended March 31, 2017, this fee includes services performed for Novelis Inc. in connection with an Offering Document of its' parent company, Hindalco Industries Limited, as well as for services not included in the Audit, Audit Related, and Tax categories. In the fiscal year ended March 31, 2016, this represents fees for services not included in the Audit, Audit Related, and Tax categories.

Pre-Approval of Audit and Permissible Non-Audit Services

The charter of the Audit Committee provides that the Committee is responsible for the pre-approval of all audit and permissible non-audit services to be performed by the independent auditors. The Audit Committee has adopted a policy for the pre-approval of services provided by the independent auditors. The policy gives detailed guidance to management as to the specific services that are eligible for general pre-approval and provides specific cost limits for certain services on an annual basis. Pursuant to the policy and the Audit Committee charter, the Audit Committee has granted to its chairman the authority to address any requests for pre-approval of individual services.

PART IV

Item 15. Exhibits and Financial Statement Schedules

1. Financial Statement Schedules

None.

2. Exhibits

<u>Exhibit No.</u>	<u>Description</u>
2.1	Arrangement Agreement by and among Hindalco Industries Limited, AV Aluminum Inc. and Novelis Inc., dated as of February 10, 2007 (incorporated by reference to Exhibit 2.1 to our Current Report on Form 8-K filed on February 13, 2007 (File No. 001-32312))
3.1	Restated Certificate and Articles of Incorporation of Novelis Inc. (incorporated by reference to Exhibit 3.1 to our Current Report on Form 8-K filed on January 7, 2005 (File No. 001-32312))
3.2	Certificate and Articles of Amalgamation of Novelis Inc., dated March 31, 2016 (incorporated by reference to Exhibit 3.2 to our Annual Report on Form 10-K filed May 10, 2016 (File No. 001-32312))
3.3	Novelis Inc. Amended and Restated Bylaws, adopted as of July 24, 2008 (incorporated by reference to Exhibit 3.2 to our Current Report on Form 8-K filed on July 25, 2008 (File No. 001-32312))
4.1	Specimen Certificate of Novelis Inc. Common Shares (incorporated by reference to Exhibit 4.2 to our Registration Statement on Form 10-12B filed on December 27, 2004 (File No. 001-32312))
4.2	Indenture relating to the 6.25% Senior Notes due 2024, dated August 29, 2016, between Novelis Corporation, as issuer, Novelis Inc., as guarantor, the subsidiary guarantors names on the signature page thereto and Regions Bank, as trustee (incorporated by reference to Exhibit 4.3 to our Current Report on Form 8-K filed on September 19, 2016 (File No. 001-32312))
4.3	Indenture relating to the 5.875% Senior Notes due 2026, dated September 14, 2016, between Novelis Corporation, as issuer, Novelis Inc., as guarantor, the subsidiary guarantors named on the signature page thereto and Regions Bank, as trustee (incorporated by reference to Exhibit 4.1 to our Current Report on Form 8-K filed on September 19, 2016 (File No. 001-32312))
10.1	Term Loan Credit Agreement dated as of January 10, 2017, among Novelis Inc., as borrower, AV Metals, Inc., and the other guarantors party thereto, the lenders party thereto, and Standard Chartered Bank, as administrative agent and collateral agent (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on February 7, 2017 (File No. 001-32312))
10.2	Second Amended and Restated Credit Agreement dated as of October 6, 2014, by and among Novelis Inc. and other borrowers and guarantors party thereto and Wells Fargo Bank, National Association as Administrative Agent, Collateral Agent, Issuing Bank and U.S. Swingline Lender and other lenders party thereto (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on November 10, 2014 (File No. 001-32312))
10.3*	Form of Indemnity Agreement between Novelis Inc. and Members of the Board of Directors of Novelis Inc. (incorporated by reference to Exhibit 10.1 to our Current Report on Form 8-K filed on May 21, 2007 (File No. 001-32312))

- 10.4* Form of Change in Control Agreement between Novelis Inc. and certain executive officers (incorporated by reference to Exhibit 10.1 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
- 10.5* Form of Severance Agreement (incorporated by reference to Exhibit 10.4 to our Current Report on Form 8-K filed on July 1, 2009 (File No. 001-32312))
- 10.6* Novelis Inc. 2013 Long-Term Incentive Plan (incorporated by reference into Exhibit 10.1 to our Current Report on Form 8-K filed on May 25, 2012 (File No. 001-32312))
- 10.7* Novelis Inc. Long-Term Incentive Plans Amendment dated May 13, 2013 (incorporated by reference to Exhibit 10.44 to our Annual Report on Form 10-K filed on May 15, 2013 (File No. 001-32312))
- 10.8* Novelis Inc. Fiscal Year 2014 Long-Term Incentive Plan (incorporated by reference to Exhibit 10.42 to our Annual Report on Form 10-K filed on May 15, 2013 (File No. 001-32312))
- 10.9* Novelis Inc. Fiscal Year 2015 Long-Term Incentive Plan (incorporated by reference to Exhibit 10.30 to our Annual Report on Form 10-K filed on May 16, 2014 (File No. 001-32312))
- 10.10* Novelis Inc. Fiscal Year 2016 Long-Term Incentive Plan (incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
- 10.11* Novelis Inc. Fiscal Year 2017 Executive Long-Term Incentive Plan (incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
- 10.12* Novelis Inc. Fiscal Year 2017 Executive Annual Incentive Plan (incorporated by reference to Exhibit 10.32 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
- 10.13* Novelis Inc. Fiscal Year 2018 Executive Annual Incentive Plan
- 10.14* Novelis Inc. Fiscal Year 2018 Executive Long Term Incentive Plan
- 10.15* Novelis Supplementary Pension Plan dated January 1, 2012 ((incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 24, 2012 (File No. 001-32312))
- 10.16* Employment Agreement between Novelis Inc. and Steven Fisher dated August 10, 2015 (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on November 9, 2015 (File No. 001-32312))
- 10.17* Employment Agreement between Novelis Inc. and Antonio Tadeu Coelho Nardocci dated September 4, 2009 (incorporated by reference to Exhibit 10.1 to our Current Report on Form 8-K/A filed on September 9, 2009 (File No. 001-32312))
- 10.18* Employment Agreement between Novelis Inc. and Devinder Ahuja, dated as of June 6, 2016 (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on August 5, 2016 (File No. 001-32312))
- 10.19* Employment Agreement between Novelis Inc. and Emilio Braghi, dated as of July 22, 2016 (incorporated by reference to Exhibit 10.3 to our Quarterly Report on Form 10-Q filed on August 5, 2016 (File No. 001-32312))

- 10.20* Employment Agreement between Novelis do Brasil Ltda. and Marco Antonio Palmieri dated August 8, 2011 (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on November 9, 2011 (File No. 001-32312))
- 10.21* Employment Agreement between Novelis Inc. and Sachin Satpute dated as of April 28, 2016 (incorporated by reference to Exhibit 10.2 to our Quarterly Report on Form 10-Q filed on August 5, 2016 (File No. 001-32312))
- 10.22* Employment Agreement between Novelis Inc. and Leslie J. Parrette, Jr., dated September 21, 2009 ((incorporated by reference to Exhibit 10.46 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
- 10.23* Employment Agreement between Novelis Inc. and Steven Pohl dated as of June 6, 2016
- 10.24* Retention Award Letter to Steven Fisher, dated July 1, 2014 ((incorporated by reference to Exhibit 10.47 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
- 10.25* Retention Award Letter to Marco Palmieri, dated July 1, 2014 ((incorporated by reference to Exhibit 10.48 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
- 10.26* Retention Award Letter to Leslie J. Parrette, dated July 1, 2014 ((incorporated by reference to Exhibit 10.50 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
- 10.27* Retention Award Letter to Steven Pohl dated July 1, 2014
- 10.28* Retention Award Letter to Emilio Braghi dated July 1, 2014
- 10.29* Retention Award Letter to Marco Palmieri, dated June 2015 (incorporated by reference to Exhibit 10.47 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
- 10.30* Retention Award Letter to Leslie J. Parrette, Jr. dated June 2015 (incorporated by reference to Exhibit 10.49 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
- 10.31* Retention Award Letter to Steven E. Pohl dated June 2015 (incorporated by reference to Exhibit 10.51 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
- 10.32* Retention Award Letter to Emilio Braghi dated January 16, 2015
- 10.33* Retention Award Letter to Emilio Braghi dated June 2015
- 10.34* Retention Award Letter to Steven Fisher dated June 2016
- 10.35* Retention Award Letter to Steve Pohl dated June 20, 2016
- 10.36* Retention Award Letter to Steve Pohl dated July 29, 2016
- 10.37* Retention Award Letter to Leslie J. Parrette, Jr. dated July 29, 2016
- 10.38* Retention Award Letter to Marco Palmieri dated July 29, 2016

10.39*	Retention Award Letter to Emilio Braghi dated July 29, 2016
21.1	List of Subsidiaries of Novelis Inc.
31.1	Section 302 Certification of Principal Executive Officer
31.2	Section 302 Certification of Principal Financial Officer
32.1	Section 906 Certification of Principal Executive Officer
32.2	Section 906 Certification of Principal Financial Officer
101.INS	XBRL Instance Document
101.SCH	XBRL Taxonomy Extension Schema Document
101.CAL	XBRL Taxonomy Extension Calculation Linkbase
101.DEF	XBRL Taxonomy Extension Definition Linkbase
101.LAB	XBRL Taxonomy Extension Label Linkbase
101.PRE	XBRL Taxonomy Extension Presentation Linkbase

* Indicates a management contract or compensatory plan or arrangement.

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.

NOVELIS INC.

By: /s/ Steven Fisher

Name: Steven Fisher

Title: President and Chief Executive Officer

Date: May 10, 2017

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

<u>/s/ Steven Fisher</u> Steven Fisher	(Principal Executive Officer)	Date 5/10/2017
<u>/s/ Devinder Ahuja</u> Devinder Ahuja	(Principal Financial Officer)	Date 5/10/2017
<u>/s/ Stephanie Rauls</u> Stephanie Rauls	(Principal Accounting Officer)	Date 5/10/2017
<u>/s/ Kumar Mangalam Birla</u> Kumar Mangalam Birla	(Chairman of the Board of Directors)	Date 5/10/2017
<u>/s/ Askaran Agarwala</u> Askaran Agarwala	(Director)	Date 5/10/2017
<u>/s/ Debnarayan Bhattacharya</u> Debnarayan Bhattacharya	(Director)	Date 5/10/2017
<u>/s/ Clarence J. Chandran</u> Clarence J. Chandran	(Director)	Date 5/10/2017
<u>/s/ Donald A. Stewart</u> Donald A. Stewart	(Director)	Date 5/10/2017
<u>/s/ Satish Pai</u> Satish Pai	(Director)	Date 5/10/2017

EXHIBIT INDEX

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10.9*	Novelis Inc. Fiscal Year 2015 Long-Term Incentive Plan (incorporated by reference to Exhibit 10.30 to our Annual Report on Form 10-K filed on May 16, 2014 (File No. 001-32312))
10.10*	Novelis Inc. Fiscal Year 2016 Long-Term Incentive Plan (incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
10.11*	Novelis Inc. Fiscal Year 2017 Executive Long-Term Incentive Plan (incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
10.12*	Novelis Inc. Fiscal Year 2017 Executive Annual Incentive Plan (incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
10.13*	Novelis Inc. Fiscal Year 2018 Executive Annual Incentive Plan
10.14*	Novelis Inc. Fiscal Year 2018 Executive Long Term Incentive Plan
10.15*	Novelis Supplementary Pension Plan dated January 1, 2012 ((incorporated by reference to Exhibit 10.31 to our Annual Report on Form 10-K filed on May 24, 2012 (File No. 001-32312))
10.16*	Employment Agreement between Novelis Inc. and Steven Fisher dated August 10, 2015 (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on November 9, 2015 (File No. 001-32312))
10.17*	Employment Agreement between Novelis Inc. and Antonio Tadeu Coelho Nardocci dated September 4, 2009 (incorporated by reference to Exhibit 10.1 to our Current Report on Form 8-K/A filed on September 9, 2009 (File No. 001-32312))
10.18*	Employment Agreement between Novelis Inc. and Devinder Ahuja, dated as of June 6, 2016 (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on August 5, 2016 (File No. 001-32312))
10.19*	Employment Agreement between Novelis Inc. and Emilio Braghi, dated as of July 22, 2016 (incorporated by reference to Exhibit 10.3 to our Quarterly Report on Form 10-Q filed on August 5, 2016 (File No. 001-32312))
10.20*	Employment Agreement between Novelis do Brasil Ltda. and Marco Antonio Palmieri dated August 8, 2011 (incorporated by reference to Exhibit 10.1 to our Quarterly Report on Form 10-Q filed on November 9, 2011 (File No. 001-32312))
10.21*	Employment Agreement between Novelis Inc. and Sachin Satpute dated as of April 28, 2016 (incorporated by reference to Exhibit 10.2 to our Quarterly Report on Form 10-Q filed on August 5, 2016 (File No. 001-32312))
10.22*	Employment Agreement between Novelis Inc. and Leslie J. Parrette, dated September 21, 2009 ((incorporated by reference to Exhibit 10.46 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))

10.23*	Employment Agreement between Novelis Inc. and Steven Pohl dated as of June 6, 2016
10.24*	Retention Award Letter to Steven Fisher, dated July 1, 2014 ((incorporated by reference to Exhibit 10.47 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
10.25*	Retention Award Letter to Marco Palmieri, dated July 1, 2014 ((incorporated by reference to Exhibit 10.48 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
10.26*	Retention Award Letter to Leslie J. Parrette, dated July 1, 2014 ((incorporated by reference to Exhibit 10.50 to our Annual Report on Form 10-K filed on May 12, 2015 (File No. 001-32312))
10.27*	Retention Award Letter to Steven Pohl dated July 1, 2014
10.28*	Retention Award Letter to Emilio Braghi dated July 1, 2014
10.29*	Retention Award Letter to Marco Palmieri, dated June 2015 (incorporated by reference to Exhibit 10.47 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
10.30*	Retention Award Letter to Leslie J. Parrette, Jr. dated June 2015 (incorporated by reference to Exhibit 10.49 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
10.31*	Retention Award Letter to Steven E. Pohl dated June 2015 (incorporated by reference to Exhibit 10.51 to our Annual Report on Form 10-K filed on May 10, 2016 (File No. 001-32312))
10.32*	Retention Award Letter to Emilio Braghi dated January 16, 2015
10.33*	Retention Award Letter to Emilio Braghi dated June 2015
10.34*	Retention Award Letter to Steven Fisher dated June 2016
10.35*	Retention Award Letter to Steve Pohl dated June 20, 2016
10.36*	Retention Award Letter to Steve Pohl dated July 29, 2016
10.37*	Retention Award Letter to Leslie J. Parrette, Jr. dated July 29, 2016
10.38*	Retention Award Letter to Marco Palmieri dated July 29, 2016
10.39*	Retention Award Letter to Emilio Braghi dated July 29, 2016
21.1	List of Subsidiaries of Novelis Inc.
31.1	Section 302 Certification of Principal Executive Officer
31.2	Section 302 Certification of Principal Financial Officer
32.1	Section 906 Certification of Principal Executive Officer

32.2	Section 906 Certification of Principal Financial Officer
101.INS	XBRL Instance Document
101.SCH	XBRL Taxonomy Extension Schema Document
101.CAL	XBRL Taxonomy Extension Calculation Linkbase
101.DEF	XBRL Taxonomy Extension Definition Linkbase
101.LAB	XBRL Taxonomy Extension Label Linkbase
101.PRE	XBRL Taxonomy Extension Presentation Linkbase

* Indicates a management contract or compensatory plan or arrangement.

Item 16. Form 10-K Summary

None.

Novelis 2018 Executive Annual Incentive Plan

1. **Title and Administration.** This annual incentive plan (the “2018 Executive AIP” or the “Plan”) will be administered by the Human Resources department of Novelis Inc. (the “Company”).
2. **Performance Period and Payments.** The performance period will commence on April 1, 2017 and end on March 31, 2018. Payments under the Plan will be made in a lump sum, minus required withholdings, during the first fiscal quarter following the end of the performance year.
3. **Eligibility.** Employees in job bands 3 and higher are eligible to participate in the Plan. An individual must be either employed in an eligible job band or transferred or hired into an eligible job band during the performance year to receive a payout under the Plan. Eligibility and payments for employees who begin employment with Novelis after the start of the performance period will be determined by the “Plan Rules Administration” document then in effect as maintained by the Company’s Human Resources department.
4. **Target Opportunity.** Each participant’s target opportunity will be determined by the Company’s Human Resources department or the Compensation Committee of the Company’s Board of Directors, as applicable.
5. **Plan Design.**
 - (a) **Performance Measures.** The following measures will determine payouts under the Plan.

Measure	Weighting	Threshold	Target	Maximum
Operating EBITDA Before Metal Price Lag	40%	60%	100%	200%
Free Cash Flow Before Metal Price Lag	35%	50%	100%	200%
Individual Performance per Novelis Performance Management System	15%	60%	100%	200%
Global Safety	10%			

- (b) **Performance Threshold.** No payout will be made under the Plan unless Operating EBITDA Before Metal Price Lag for the performance year is at least 75% of the target level Operating EBITDA Before Metal Price Lag as established by the Company. Performance results between threshold level and maximum level are determined by means of interpolation.
6. **Separation from Employment.** Participants whose employment terminates during the performance year will be subject to the applicable terms set forth below. Any payments to former employees will be made at or near the same date payment is made to active employees under the Plan.

Termination Event	Treatment
Death, Disability or Retirement	Payout will be prorated based on length of employment during the performance period.
Change in Control	Payout will be prorated based on length of employment during the performance period.
Intercompany Transfers	Payout will be prorated based on length of employment during the performance period.
Voluntary Termination	The participant will forfeit the entire payout, and no payout will be made.
Involuntary Termination – For Cause	The participant will forfeit the entire payout, and no payout will be made.
Involuntary Termination – Without Cause (e.g., plant closure, sale of assets, position elimination)	Payout will be prorated based on length of employment during the performance period.

7. **Definitions.** The following terms will have the meaning ascribed to them below.

(a) **Operating EBITDA Before Metal Price Lag** means “Segment Income” as reported in the Company’s Annual Report on Form 10-K filed with the United States Securities and Exchange Commission (the “Form 10-K”) *adjusted by* (1) the impact from timing differences in the pass-through of metal price changes to the Company’s customers, net of realized derivative instruments; *reduced by* (2) the impact from re-measuring to current exchange rates any monetary assets and liabilities which are denominated in a currency other than the functional currency of the reporting unit, net of realized and unrealized derivative instruments; *and further adjusted by* (3) the impact on cost of working capital management activities to the extent caused by any excess or shortfall of Free Cash Flow described in paragraph 7(b)(iii) below.

(b) **Free Cash Flow Before Metal Price Lag** means the Company’s operating free cash flow calculated by removing the following items from “free cash flow” (as defined in the “Liquidity and Capital Resources” section of Item 7 of the Form 10-K): (1) the impact from timing differences in the pass-through of metal price changes to the Company’s customers, net of realized derivative instruments; and (2) 100% of the impact on inventory of fourth quarter variations in metal prices (including LME and local market premiums); provided, however, that:

- (i) In the event fourth quarter base metal cost (“BMC”) exceeds the budgeted BMC, the adjustment will be calculated as: (i) budgeted ending physical book inventory kilotonnes times (ii) actual fourth quarter BMC, reduced by budgeted fourth quarter BMC. The result will be added to the Company’s operating free cash flow for purposes of calculating achievement under this Plan;
- (ii) In the event fourth quarter BMC is lower than the budgeted BMC price, the adjustment will be calculated as: (i) actual ending physical book inventory kilotonnes times (ii) budgeted fourth quarter BMC, reduced by actual fourth quarter

BMC. The result will be deducted from the Company's operating free cash flow for purposes of calculating achievement under this Plan; and

- (iii) Free Cash Flow may also include cash flows from working capital management activities and programs (including, without limitation, factoring of accounts receivable). For purposes of calculating achievement of Free Cash Flow under this Plan, any cash flow impact resulting from such working capital management activities or programs will be disregarded.

(c) **Global Safety** is comprised of two components, as follows:

- (i) Global Serious Injuries and Fatalities (SIF), which refers to the total number of work-related deaths, life-threatening injuries/illnesses and life-altering injuries/illnesses occurring during fiscal year 2018; and
- (ii) Total Recordable Incident Rate (TRIF), which refers to (i) the number of Injury/Illness Record Keeping System cases multiplied by 200,000; divided by (ii) the number of hours worked by all employees, in each case during fiscal year 2018.

SIF will be weighted 60% and TRIF will be weighted 40% of the Global Safety metric. Notwithstanding the foregoing, in the case of a fatality at a Company location during fiscal 2018, select participants will receive no payout for the Global Safety measure.

(d) **Retirement** means separation from the Company at 65 years of age or a combination of age and service greater than or equal to 65 with a minimum age of 55.

(e) **Change in Control** means the first to occur of any of the following events: (i) any person or entity (excluding any person or entity affiliated with the Aditya Birla Group) is or becomes the beneficial owner, directly or indirectly through any parent entity of the Company or otherwise, of securities of the Company representing 35% or more of either the then outstanding shares of common stock of the Company or the combined voting power of the Company's then outstanding securities (the "Value or Vote of the Company"); provided, however, that a Change in Control will not be deemed to have occurred in the event that (A) any person or entity becomes the beneficial owner of securities representing 50% or less of the Value or Vote of the Company through (i) an initial public offering, (ii) a secondary offering, (iii) a private placement of securities, (iv) a share exchange transaction, or (v) any similar share purchase transaction in which the Company or any of its affiliates issues securities (any such transaction, a "Share Issuance Transaction"); and (B) a person or entity's beneficial ownership interest in the Value or Vote of the Company is diluted solely as a result of any Share Issuance Transaction; or (ii) the majority of the members of the Board of Directors of the Company is replaced during any 12-month period by directors whose appointment or election is not endorsed by a majority of the members of the Board prior to the date of the appointment or election; or (iii) the consummation of a merger or consolidation of the Company with any other entity not affiliated with the Aditya Birla Group, other than (a) a merger or consolidation which would result in the voting securities of the Company outstanding immediately prior to such merger or consolidation continuing to represent (either by remaining outstanding or by being converted into voting securities of the surviving entity or any parent thereof), in combination with the ownership of any trustee or other fiduciary holding securities under an employee benefit plan of the Company, 50% or more of the

combined voting power of the voting securities of the Company or such surviving entity or any parent thereof outstanding immediately after such merger or consolidation, or (b) a merger or consolidation effected to implement a recapitalization of the Company (or similar transaction) in which no person or entity is or becomes the beneficial owner, directly or indirectly, of securities of the Company (not including in the securities beneficially owned by such person or entity any securities acquired directly from the Company or its affiliates, other than in connection with the acquisition by the Company or its affiliates of a business) representing 50% or more of either the then outstanding shares of common stock of the Company or the combined voting power of the Company's then outstanding securities; or (iv) the sale or disposition of all or substantially all of the Company's assets, other than a sale or disposition by the Company of all or substantially all of its assets to a member of the Aditya Birla Group.

Notwithstanding the foregoing, no "Change in Control" will be deemed to have occurred if there is consummated any transaction or series of integrated transactions immediately following which the record holders of the common stock of the Company immediately prior to such transaction or series of transactions continue to have substantially the same proportionate ownership in an entity which owns all or substantially all of the assets of the Company immediately following such transaction or series of transactions. For purposes of this Section, "beneficial ownership" will be determined in accordance with Rule 13d-3 under the Securities Exchange Act of 1934, as amended.

8. **Interpretation.** Novelis will interpret and construe the terms and conditions of the plan in its sole discretion, including but not limited to all decisions regarding eligibility for, and the amount of benefits payable under, the Plan.
9. **No Right to Continued Service.** Nothing in the Plan confers upon any participant the right to continued employment or service with the Company or otherwise interfere with or restrict the right of Novelis or any affiliate to terminate the participant's employment or service for any reason.

Novelis 2018 Executive Long-Term Incentive Plan

1. **Title and Administration.** This long-term incentive plan (the “2018 Executive LTIP” or the “Plan”) will be administered by the Human Resources department of Novelis Inc. (the “Company”).
2. **Performance Period and Award Date.** The performance period will commence on April 1, 2017 and end on March 31, 2020. The award date will be May 5, 2017, or such later date as may be determined for a participant as provided herein.
3. **Target Opportunity.** Each participant’s target opportunity will be determined by the Company’s Human Resources department or the Compensation Committee of the Company’s Board of Directors (the “Board”), as applicable. Currency exchange rates will be fixed on the award date.
4. **Plan Design.** A participant’s target opportunity under the Plan will be comprised of Novelis Performance Units, Hindalco Stock Appreciation Rights, and Hindalco Restricted Stock Units.
 - (a) **Novelis Performance Units.** Novelis Performance Units will comprise 50% of each participant’s award under the Plan.
 - (i) ***Value.*** Each Novelis Performance Unit (“PU”) will have a fixed value of US\$100.
 - (ii) ***Vesting.*** The PUs are at-risk, and the number of PUs that vest will be determined by the Company’s achievement of ROCE targets established for the performance period. Vesting will range from 50% (threshold) to 200% (maximum) of target award value. Performance results between threshold level and target level or between target level and maximum level will be determined by means of interpolation.
 - (iii) ***Definitions.***
 - ***ROCE*** means NOPAT divided by fiscal year average CE. ROCE will be calculated for each fiscal year of the performance period. The sum for all fiscal years in the performance period will be divided by the number of fiscal years in the performance period to obtain a simple average.
 - ***NOPAT*** means (i) EBITDA *minus* (ii) all the following: depreciation, derivatives not in operating EBITDA, book tax, adjustments to eliminate proportional consolidation, and all Net Other Costs.
 - ***CE*** means (i) book debt *plus* (ii) book equity *plus* (iii) goodwill impairment (fixed at \$1.5 billion) *less* (iv) cash in excess of \$400 million, *plus* (v) any new impairment impacting equity; this total amount will be normalized for dividend and/or capital payments, if any. Average CE for a fiscal year will be based on the beginning and ending balances for the fiscal year.
 - ***EBITDA*** means Operating EBITDA Before Metal Price Lag, which is equivalent to “Segment Income” as reported in Novelis Inc.’s Annual Report on Form 10-K filed with the United States Securities and Exchange Commission.
 - (iv) ***Target Modifications.*** In the event the Company completes a significant strategic transaction during the performance period, the Board may, in its sole discretion, modify the ROCE targets established for the performance period.

- (v) *Payments.* Payments will be made in cash in the first quarter following the end of the performance period.
 - (b) Hindalco Stock Appreciation Rights. Hindalco Stock Appreciation Rights will comprise 20% of each participant's award under the Plan.
 - (i) *Value.* The Black Scholes method of valuation will be used to arrive at the number of SARs to be awarded to participant. Each Hindalco Stock Appreciation Right ("Hindalco SAR") will track the appreciation value of one Hindalco share. Total cash payouts over the term each award will be capped at a maximum of 3.0 times the value on the award date.
 - (ii) *Vesting and Expiration.* Hindalco SARs will vest ratably in one-third tranches on each anniversary of the award date, provided the Company achieves at least 75% of the Operating EBITDA before Metal Price Lag target established for the performance year. Hindalco SARs must be exercised no later than the seventh anniversary of the award date.
 - (iii) *Exercise.* The exercise price of a Hindalco SAR will be determined by using the average of the high and low prices of a Hindalco share as published by the Bombay Stock Exchange on the award date. Upon exercise, the participant will receive a cash payment equal to the product of (i) the number of Hindalco SARs exercised, times (ii) the increase in value of one Hindalco share from the award date through the date of exercise. If an employee exercises on a date the Bombay Stock Exchange is closed, the exercise price will be the closing price of Hindalco shares on the immediately previous date the Bombay Stock Exchange was open. A participant may exercise vested Hindalco SARs at any time prior to the expiration date.
 - (c) Hindalco Restricted Stock Units. Hindalco Restricted Stock Units will comprise 30% of each participant's award under the Plan.
 - (i) *Value.* The value of each RSU will be equivalent to the value of one Hindalco share. The initial value of each RSU will be determined by using the average of the high and low prices of a Hindalco share as published by the Bombay Stock Exchange on the award date. Total cash payouts over the term each award will be capped at a maximum of 3.0 times the value on the award date.
 - (ii) *Vesting.* The RSUs will vest ratably in one- third tranches on each anniversary of the award date and will be paid in cash within 30 days of the applicable vesting date.
5. **Eligibility.** Employees in job bands 3 and higher are eligible to participate in the Plan. An individual must be either employed in an eligible job band or transferred or hired into an eligible job band during the performance year to receive a payout under the Plan. Eligibility and payments for employees who begin employment with the Company after the start of the performance period will be determined by the "Plan Rules Administration" document then in effect as maintained by the Company's Human Resources department.
- (a) Employment After Award Date. Eligibility for employees who begin employment with Novelis after the award date will be determined as follows.
 - (i) *First or Second Quarter.* An eligible employee who begins employment after the award date but before the end of the second quarter of the fiscal year will be granted an award at 90%

of the target amount for the employee’s job band. The award date will be the following October 1.

(ii) *Third Quarter.* An eligible employee who begins employment during the third quarter of the fiscal year will be granted an award at 75% of the target amount for the employee’s job band. The award date will be the following January 1.

(iii) *Fourth Quarter.* An eligible employee who begins employment after the start of the fourth quarter of the fiscal year will not be eligible for an award under the Plan.

(b) Promotion After Award Date. Awards for employees promoted into an eligible job band during the fiscal year will be determined as follows.

(i) *First Quarter.* An employee who is promoted into an eligible job band during the first quarter of the fiscal year will be eligible for a full award under the Plan.

(ii) *Second Quarter.* An employee who is promoted into an eligible band during the second quarter of the fiscal year will be granted an award at 90% of the target amount for the employee’s job band. The award date will be the following October 1.

(iii) *Third Quarter.* An employee who is promoted into an eligible job band during the third quarter of the fiscal year will be granted an award at 75% of the target amount for the employee’s job band. The award date will be the following January 1.

(iv) *Fourth Quarter.* An employee who is promoted into an eligible job band after the start of the fourth quarter of the fiscal year will not be eligible for an award under the Plan in that fiscal year.

(v) *Promotion of Eligible Employees.* An employee in an eligible job band who is promoted into a higher job band during the first quarter of the fiscal year will be eligible for a full award under the Plan at the level of the higher job band. An employee in an eligible job band who is promoted into a higher job band after the start of the second quarter of the fiscal year will not be eligible for an award at the level of the employee’s new job band.

6. Separation from Employment. Participants whose employment terminates during the performance year will be subject to the applicable terms set forth below.

Event	Awards	Vesting and Exercise Treatment
Death, Disability	SARs	<ul style="list-style-type: none"> • All unvested SARs will vest immediately. • Vested SARs must be exercised within one year, and in no event later than the seventh anniversary of the award date.
	RSUs	<ul style="list-style-type: none"> • All unvested RSUs will vest immediately and will be cashed out 30 days following the date of death or disability.
	PUs	<ul style="list-style-type: none"> • Vesting will be prorated based on months of service during the performance period, subject to the PU vesting rules set forth above. • Vested PUs will be cashed out after the end of the performance period.

Retirement	SARs	<ul style="list-style-type: none"> If Retirement occurs more than one year after the award date, unvested SARs will continue on the vesting schedule and must be exercised no later than the third anniversary of the Retirement date. Vested SARs must be exercised prior to the expiration date. If Retirement occurs before the first anniversary of the award date, all unvested SARs will be forfeited.
	RSUs	<ul style="list-style-type: none"> If Retirement occurs more than one year after the award date, unvested RSUs will vest immediately and will be cashed out within 30 days following date of Retirement. If Retirement occurs before the first anniversary of the award date, all unvested RSUs will be forfeited.
	PUUs	<ul style="list-style-type: none"> Vesting will be prorated based on months of service during the performance period, subject to the PU vesting rules set forth above. Vested PUs will be cashed out after the end of the performance period.
Change in Control	SARs	<ul style="list-style-type: none"> All invested SARs will vest immediately and the vested portion will be cashed out within 30 days following a change in control.
	RSUs	<ul style="list-style-type: none"> All unvested RSUs will vest immediately and will be cashed out within 30 days following a change in control.
	PUUs	<ul style="list-style-type: none"> Vesting will be prorated based on months of service during the performance period, subject to the PU vesting rules set forth above. Vested PUs will be cashed out after the end of the performance period.
Intercompany Transfers	SARs	<ul style="list-style-type: none"> Any unvested SARs scheduled to vest within six months after the date of transfer will continue to vest according to the vesting schedule. All other unvested SARs will be forfeited.
	RSUs	<ul style="list-style-type: none"> Any unvested RSUs scheduled to vest within six months after the date of transfer will continue to vest according to the vesting schedule. All other unvested RSUs will be forfeited.
	PUUs	<ul style="list-style-type: none"> Vesting will be prorated based on months of service during the performance period, subject to the PU vesting rules set forth above. Vested PUs will be cashed out after the end of the performance period.
Voluntary Termination	SARs	<ul style="list-style-type: none"> Participant must exercise unvested SARs within 90 days, and in no event later than the seventh anniversary of the award date. All unvested SARs will be forfeited.
	RSUs	<ul style="list-style-type: none"> All RSUs will be forfeited.
	PUUs	<ul style="list-style-type: none"> All PUs will be forfeited.
Involuntary Termination – Without Cause (e.g., plant closure, sale of assets, position elimination)	SARs	<ul style="list-style-type: none"> Vesting will be prorated based on months of service during the performance period, subject to the SAR vesting rules set forth above. Vested SARs must be exercised within 90 days, and in no event later than the seventh anniversary of the award date.
	RSUs	<ul style="list-style-type: none"> Vesting will be prorated based on months of service during the performance period, subject to the RSU vesting rules set forth above. Vested RSUs will be cashed out 30 days following the date of termination.
	PUUs	<ul style="list-style-type: none"> Vesting will be prorated based on months of service during the performance period, subject to the PU vesting rules set forth above. Vested PUs will be cashed out after the end of the performance period.
Involuntary Termination – For Cause	SARs	All SARs will be forfeited.
	RSUs	All RSUs will be forfeited.
	PUUs	All PUs will be forfeited.

7. Definitions. The following terms will have the meaning ascribed to them below.

(a)**Retirement** means separation from service with the Company and its subsidiaries and affiliates on or after (i) reaching 65 years of age or (ii) having a combination of age and service greater than or equal to 65 with a minimum age of 55.

(b)**Change in Control** means the first to occur of any of the following events: (i) any person or entity (excluding any person or entity affiliated with the Aditya Birla Group) is or becomes the beneficial owner, directly or indirectly through any parent entity of the Company or otherwise, of securities of the Company representing 35% or more of either the then outstanding shares of common stock of the Company or the combined voting power of the Company's then outstanding securities (the "Value or Vote of the Company"); provided, however, that a Change in Control shall not be deemed to have occurred in the event that (A) any person or entity becomes the beneficial owner of securities representing 50% or less of the Value or Vote of the Company through (i) an initial public offering, (ii) a secondary offering, (iii) a private placement of securities, (iv) a share exchange transaction, or (v) any similar share purchase transaction in which the Company or any of its affiliates issues securities (any such transaction, a "Share Issuance Transaction"); and (B) a person or entity's beneficial ownership interest in the Value or Vote of the Company is diluted solely as a result of any Share Issuance Transaction; or (ii) the majority of the members of the Board of Directors of the Company is replaced during any 12-month period by directors whose appointment or election is not endorsed by a majority of the members of the Board prior to the date of the appointment or election; or (iii) the consummation of a merger or consolidation of the Company with any other entity not affiliated with the Aditya Birla Group, other than (a) a merger or consolidation which would result in the voting securities of the Company outstanding immediately prior to such merger or consolidation continuing to represent (either by remaining outstanding or by being converted into voting securities of the surviving entity or any parent thereof), in combination with the ownership of any trustee or other fiduciary holding securities under an employee benefit plan of the Company, 50% or more of the combined voting power of the voting securities of the Company or such surviving entity or any parent thereof outstanding immediately after such merger or consolidation, or (b) a merger or consolidation effected to implement a recapitalization of the Company (or similar transaction) in which no person or entity is or becomes the beneficial owner, directly or indirectly, of securities of the Company (not including in the securities beneficially owned by such person or entity any securities acquired directly from the Company or its affiliates, other than in connection with the acquisition by the Company or its affiliates of a business) representing 50% or more of either the then outstanding shares of common stock of the Company or the combined voting power of the Company's then outstanding securities; or (iv) the sale or disposition of all or substantially all of the Company's assets, other than a sale or disposition by the Company of all or substantially all of its assets to a member of the Aditya Birla Group.

Notwithstanding the foregoing, no "Change in Control" shall be deemed to have occurred if there is consummated any transaction or series of integrated transactions immediately following which the record holders of the common stock of the Company immediately prior to such transaction or series of transactions continue to have substantially the same proportionate ownership in an entity which owns all or substantially all of the assets of the Company immediately following such transaction or series of transactions. For purposes of this Section, "beneficial ownership" shall be determined in accordance with Rule 13d-3 under the Securities Exchange Act of 1934, as amended.

8. Taxes.

(a)Taxes and Other Withholdings. All payments under this plan shall be subject to applicable tax and other withholdings.

(b)Compliance with §409A of the U.S. Internal Revenue Code. To the extent applicable, this plan shall be interpreted and administered in a manner so that any amount or benefit payable hereunder shall

be paid or provided in a manner that is either exempt from or compliant with the requirements Section 409A of the Internal Revenue Code of 1986, as amended (“Section 409A”), and applicable Internal Revenue Service guidance and Treasury Regulations issued thereunder. Notwithstanding anything in this plan to the contrary, all payments and benefits under this plan that would constitute non-exempt “deferred compensation” for purposes of Section 409A and that would otherwise be payable or distributable hereunder by reason of an individual’s termination of employment, will not be payable or distributable to individual unless the circumstances giving rise to such termination of employment meet any description or definition of “separation from service” in Section 409A and applicable regulations (without giving effect to any elective provisions that may be available under such definition). If this provision prevents the payment or distribution of any amount or benefit, such payment or distribution shall be made on the date, if any, on which an event occurs that constitutes a Section 409A-compliant “separation from service.” Further, to the extent the individual is a “specified employee” within the meaning of Section 409A and notwithstanding paragraph 7 or any other provision herein to the contrary, then payment may not be made before the date which is six (6) months after the date of separation from service (or, if earlier, the date of death of individual).

9. **Interpretation and Amendment.** The Company will interpret and construe the terms and conditions of the plan in its sole discretion, including but not limited to all decisions regarding eligibility for, and the amount of benefits payable under, the Plan. The Company also reserves the right to amend or modify this Plan at any time.
10. **No Right to Continued Service.** Nothing in the Plan confers upon any participant the right to continued employment or service with the Company or any subsidiary or affiliate or to otherwise interfere with or restrict the right of the Company or any subsidiary or affiliate to terminate the participant’s employment or service for any reason.



June 6, 2016

Dear Steve,

Re: Promotion Letter

Novelis Inc. is pleased to offer you the role of Senior Vice President, Business Performance and Execution. This position will initially be based in Atlanta, Georgia (US) but may be relocated to any other location based on business needs. You will report to Mr. Steven Fisher, President and Chief Executive Officer of Novelis Inc. The terms and conditions applicable to your appointment to this position are as follows:

1. Position Title

Senior Vice President, Business Performance and Execution of Novelis Inc.

2. Base Salary

Effective June 6, 2016, your base salary will be **\$400,000** annually. Your next salary review will be in July 2017.

3. Annual Incentives

You are entitled to participate in the Novelis Annual Incentive Plan (AIP). The target opportunity for your position will be 60% of your annual base salary. The annual incentive performance measures for Fiscal Year 2017 are set forth in the Novelis 2017 Executive Annual Incentive Plan.

4. Long Term Incentive Plan (LTIP)

You are eligible to participate in the Novelis Long Term Incentive Plan (LTIP). Your target opportunity for Fiscal 2017 is **\$300,000**. The LTIP grant is in the form of 50% Novelis Performance Units, 20% Hindalco Stock Appreciation Rights (SARs) and 30% Hindalco Restricted Stock Units (RSU's) as more fully described in the Novelis 2017 Executive LTIP Plan.

5. Benefits

Novelis provides a wide range of benefits as well as an annual Company paid executive physical examination. Benefits include:

- Savings and Retirement
-

- Life insurance
- Medical and prescription drug plan for you and your eligible dependents
- Dental coverage for you and your eligible dependents
- Short-Term Disability
- Long-Term Disability
- Business Travel and Accident Insurance
- Flex Perks – You will receive an annual stipend of \$48,000 minus required deductions, paid to you over 12 months. This amount is intended for your personal use for club memberships, tax preparation services, car allowance, professional financial services or as you may choose. The company does not otherwise pay club dues and/or other services.

6. Vacation Entitlement

Your vacation entitlement is governed by Novelis' vacation policy but will be no less than 25 days annually. You are also entitled to the paid holidays in Novelis' published holiday schedule for the Atlanta office.

7. Change in Control

Novelis will provide you with a separate agreement that provides protection in the event of a Change in Control.

8. Retention Award

Novelis will provide you with a separate award letter that details the terms of your retention award of \$200,000, which will be payable over a two year period.

9. Severance and Other Termination Benefits

You are entitled to severance and other benefits if the Company shall terminate your employment other than for Cause, or you terminate your employment for Good Reason defined as follows:

“Cause” means only (i) your conviction of any crime (whether or not involving the company) constituting a felony in the applicable jurisdiction; (ii) willful and material violation of the companies policies including, but not limited to, those relating to sexual harassment and confidential information; (iii) willful misconduct in the performance of your duties for the Company; or (iv) willful failure or refusal to perform your material duties and responsibilities which is not remedied within ten (10) days after written demand from the Board of Directors to remedy such failure or refusal.

“Good Reason” means any of the following if it shall occur without your express written consent: (i) a material reduction in your position, duties, reporting relationships, responsibilities, authority, or status within the Company except as contained in this contract; (ii) a reduction in your base salary and target

short term and long term incentive opportunities in effect on date hereof or as the same may be increased from time to time during the term of this Agreement; or (iii) any failure of the Company to comply with its obligations under this Agreement, in each case which is not remedied within ten (10) day after written demand by you to remedy such reduction or failure.

Your right to receive severance and benefits shall be subject to the terms and conditions of the Company's release from and waiver by you of claims, non-compete agreement and non-solicitation agreement for executive employees. No payments or benefits shall be paid unless you execute such release and waiver of claims, non-compete agreement and non-solicitation agreement. The Release shall not release your right to receive indemnification and defense from the Company for any claims arising out of the performance of your duties on behalf of the Company. Termination of employment due to Cause, Death, Disability or Retirement at any time shall not give rise to any rights to compensation.

(a) Severance Pay. The Company shall pay a lump sum cash amount equal to:
[A x (B + C)] - D, where

"A" equals a multiplier of 1.5;

"B" equals your annual base salary (including all amounts of such base salary that are voluntarily deferred under any qualified and non-qualified plans of the Company) determined at the rate in effect as of the date of appointment, which stands at \$ 400,000;

"C" equals your target short term incentive opportunity given in this contract of employment which is \$240,000; and

"D" equals the amount of retention and severance payments, if any, paid or payable to you by the Company other than pursuant to this Agreement; it being expressly understood that the purpose of this deduction is to avoid any duplication of payments to you.

(b) Other Benefits

- (i) If you are not eligible for retiree medical benefits and are covered under the Company's group health plan at the time of your termination of employment, the Company shall pay an additional lump sum cash amount for the purpose of assisting you with the cost of post-employment medical continuation coverage equal to: $(C \times M) / (1 - T)$, where

"C" equals the full monthly COBRA premium charged for coverage under the Company's group medical plan at your then current level of coverage;

"M" equals twelve (12) months; and

"T" equals an assumed tax rate of 40%

(ii) To the extent applicable, you shall be entitled to continue coverage under the Company's group life plan for a period of twelve (12) months at your pre-termination level of coverage.

(iii) You shall be entitled to twelve (12) months of additional credit for benefit accrual and contribution allocation purposes including credit for age, service and earnings pro rated over twelve (12) months under the Company's tax-qualified and non-qualified pension, savings or other retirement plans; provided that if applicable provisions of the Code prevent payment in respect of such credit under the Company's tax-qualified plans, such payments shall be made under the Company's non-qualified plans.

(iv) To the extent you are not already fully vested under the Company's tax-qualified and non-qualified retirement pension, savings and other retirement plans, you shall become 100% vested under such plans; provided that if applicable provisions of the Code prevent accelerated vesting under the Company's tax-qualified plans, an equivalent benefit shall be payable under the Company's non-qualified plans.

Notwithstanding the foregoing provisions of this paragraph 9 or any other provision in this Agreement, if you are a "specified employee" within the meaning of Code Section 409A, then all payments under this Agreement shall be delayed for a period of six (6) months to the extent required by Section 409A.

Should you decide to voluntarily separate from the company you will have to give the company a 3 month notice and will not be entitled to any of the payments in this paragraph 9.

10. Internal Revenue Code Section 409A

To the extent applicable, this Agreement shall be interpreted in accordance with Section 409A of the Code and the applicable U.S. Treasury regulations and other interpretative guidance issued thereunder, including without limitation any regulations or other guidance that may be issued after the effective date of this Agreement. Notwithstanding any provision of the Agreement to the contrary, the Company may adopt such amendments to the Agreement or adopt other policies and procedures, or take any other actions, that the Company determines is necessary or appropriate to exempt the Agreement from Section 409A and/or preserve the intended tax treatment of the benefits provided hereunder, or to comply with the requirements of Section 409A and related U.S. Treasury guidance, as long as such changes do not reduce the overall compensation.

11. Non-Competition

11.1 Competing Entities: In this Agreement, "Competing Entities" includes any entity whose major business consists of manufacturing or recycling of aluminium, alumina, or downstream rolled aluminium products.

11.2 Competitive Activities: You covenant and agree that, while employed with the Company and for 24 months thereafter, you shall not, directly or indirectly, in any manner whatsoever including, without limitation, either individually, or in partnership, jointly or in conjunction with any other person, or as employee, principal, agent, consultant, director, shareholder, lender or otherwise:

- (a) be engaged actively in or by any Competing Entities in order to provide products or services similar to the products and services provided by the Company;
- (b) have any financial or other interest including, without limitation, an interest by way of royalty or other compensation arrangements, in or in respect of any Competing Entities, excluding the ownership of not more than 5% of the issued shares of any such Competing Entities, the shares of which are listed on a recognized stock exchange or traded in the over-the-counter market; or
- (c) advise, lend money to or guarantee the debts or obligations of any Competing Entities.

12. Non-Solicitation

12.1 Customers and Suppliers: You covenant and agree that, while employed with the Company and for 24 months thereafter, you will not, in any manner, directly or indirectly, by any means, in any capacity, in order to direct away from the Company, approach, solicit, or contact any customers or suppliers of the Company who has actively done business with the Company in the preceding twenty four months, or any prospective customer or supplier that the Company approached, solicited or contacted in the preceding twenty four months, or attempt to do any of the foregoing, in order to offer or obtain services or products that compete with the business of the Company (or any material part thereof) as conducted at the time of the cessation of the your employment or during the twenty four month period prior to such date or contemplated to be carried on in its most recent annual business plan.

12.2 Employees: You covenant and agree that, while employed with the Company and for 24 months thereafter, you will not induce or solicit, or attempt to induce or solicit, or assist any person to induce or solicit, any management or higher employee, contractor or advisor of the Company, or assist or encourage any management or higher employee, contractor or advisor of the Company, to accept employment or engagement elsewhere that competes with the business of the Company (or any

material part thereof) as conducted at the time of the cessation of your employment or any other business conducted by the Company during the twenty four month period prior to such date or contemplated to be carried on in its most recent annual business plan.

13. Governing Law

This letter agreement shall be governed by, and shall be construed in accordance with, the internal laws (and not the laws of conflicts) of the State of Georgia.

14. Obligation to Mitigate Damages: No Effect on other Contractual Rights

14.1 You shall not be required to mitigate damages or the amount of any payment provided for under this Agreement by seeking other employment or otherwise nor shall the amount of any payment provided for under this Agreement be reduced by any compensation earned by you as a result of employment by another employer after your termination of employment, or otherwise.

14.2 The provision of this Agreement, and any payments provided for hereunder, shall not reduce any amounts otherwise payable, or in any way diminish your existing rights, or rights which would accrue solely as a result of the passage of time, under any employee benefit plan or arrangement providing retirement benefits or health, life, disability, or similar welfare benefits.

15. Successor to the Company

The Company will require any successor or assign (whether direct or indirect, by purchase, merger, consolidation or otherwise) to all or substantially all of the business and/or assets of the Company to absolutely and unconditionally assume and agree to perform this Agreement in the same manner and to the extent that the Company would be required to perform it if no such succession or assignment had taken place.

Any failure of the Company to obtain such assumption and agreement prior to the effectiveness of any such succession or assignment shall entitle you to terminate your employment for Good Reason.

16. Indemnification


The Company will provide full indemnification to the maximum extent permitted under the Companies by-laws and applicable law. The Company shall maintain Directors and Officers liability insurance coverage in an amount reasonably anticipated to satisfy such indemnification during your employment and at all times thereafter for the duration of any period of limitations during which any action may be brought against you.

17. General

- 17.1 All the information in this letter including eligibility for participation in compensation and benefits plan is subject to the terms of applicable plan documents and policies, which are subject to change during the normal course of Novelis business, but shall not result in an overall reduction of your compensation or terms and conditions of your employment. Your employment at Novelis is "at – will" and either you or Novelis may decide to terminate the employment relationship at any time for any reason, except as provided by law. The terms of this letter, therefore, do not and are not intended to create either an express or implied contract of employment with Novelis for any particular duration.
- 17.2 In carrying out the Company's business, employees often learn confidential or proprietary information about the Company, its customers, suppliers, or joint venture parties. Employees must maintain the confidentiality of all information so entrusted to them, except when disclosure is authorized or legally mandated. Confidential or proprietary information of the Company, and of other companies, includes any non-public information that would be harmful to the relevant company or useful or helpful to competitors if disclosed. You will find more information about this in the Code of Conduct. By signing below, you acknowledge you have received a copy of the Novelis/Aditya Birla Group Code of Conduct.

If you agree with the foregoing terms, please sign and return a copy of this letter to me. If you have any questions, please feel free to contact me.

Sincerely,



HR Shashikant
Senior Vice President and Chief Human Resources Officer

Accepted:

/Steve E. Pohl/

Steve E. Pohl



July 1, 2014
Steven Pohl

Dear Steven,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the existing LTI program. This "Bridge" plan was developed to supplement the LTIP while the new Novelis portion of the Plan matures. This program will provide you with a cash incentive in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

The Bridge plan is in place for FY2015 and will be reviewed annually.

You will receive three payments in the total amount of \$40,000:

First Payment in December 2014	\$20,000
Second Payment in December 2015	\$10,000
Third Payment in December 2016	\$10,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2016, or are terminated for cause, you will be required to repay any payments made under the Bridge plan in the previous 12 months, less applicable taxes, and any you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to you continuing to be a key member of the team as we focus on building an even more successful Novelis.

Sincerely,

A handwritten signature in cursive script that reads "Phil".

Phil Martens
President and Chief Executive Officer



July 1, 2014
Emilio Braghi

Dear Emilio,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the existing LTI program. This "Bridge" plan was developed to supplement the LTIP while the new Novelis portion of the Plan matures. This program will provide you with a cash incentive in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

The Bridge plan is in place for FY2015 and will be reviewed annually.

You will receive three payments in the total amount of \$40,000

First Payment in December 2014 \$20,000
Second Payment in December 2015 \$10,000
Third Payment in December 2016 \$10,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2016, or are terminated for cause, you will be required to repay any payments made under the Bridge plan in the previous 12 months, less applicable taxes, and any you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to you continuing to be a key member of the team as we focus on building an even more successful Novelis.

Sincerely,

A handwritten signature in cursive script that reads "Phil".

Phil Martens



January 16, 2015

Emilio Braghi
VP Sales & Operations
Novelis Asia

Dear Emilio

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an Retention incentive. This will provide you with a cash incentive in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

You will receive three payments in the total amount of €259,045.00 (subject to tax withholding)

First Payment in March 2015 - €86,349

Second Payment in March 2016 €86,348

Third Payment in March 2017 €86,348

Because this opportunity is designed as a retention incentive, in the event that you voluntarily terminate your employment prior to March 31, 2018, or are terminated for cause, you will be required to repay any payments made under the Retention incentive in the previous 12 months, less applicable taxes, and you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to you continuing to be a key member of the team as we focus on building an even more successful Novelis.

Sincerely,

A handwritten signature in cursive script that reads "Phil".

Phil Martens
President and Chief Executive Officer



June 2015
Emilio Braghi

Dear Emilio,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the existing long-term incentive plan (LTIP). This “Bridge” plan was developed to supplement the LTIP while the new Novelis portion of the Plan matures. This program will provide you with a cash incentive in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

The Bridge plan is in place for FY2016 and will be reviewed and considered for FY2017.

You will receive three payments in the total amount of \$50,000

First Payment in December 2015	\$15,000
Second Payment in December 2016	\$15,000
Third Payment in December 2017	\$20,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2018, or are terminated for cause, you will be required to repay any payments made under the Bridge plan in the previous 12 months, less applicable taxes, and you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continuing to be a key member of the team as we focus on building an even more successful Novelis.

Sincerely,

A handwritten signature in black ink, appearing to read "S. Fisher". The signature is fluid and cursive, with a large initial "S" and a distinct "Fisher" at the end.

Steve Fisher
Interim President & CEO and Senior Vice President and CFO



June 2016

Steven Fisher

Dear Steve,

In recognition of your critical contributions to the future of Novelis, the Company is awarding you a cash incentive in addition to your other compensation, subject to the terms and conditions set forth herein.

You will receive three payments in the total amount of \$600,000, as follows:

First Payment in July 2016: \$180,000

Second Payment in July 2017: \$180,000

Third Payment in July 2018: \$240,000

Because this award is designed to be a retention incentive, in the event that you voluntarily terminate your employment or are terminated for cause, in either case within 12 months of receiving a payment hereunder, you will be required to repay any such amounts paid in the last 12 months (less applicable taxes), and any unpaid installments will not be paid. If you are terminated without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continuing to be a key member of the team as we focus on building an even more successful Novelis.

Sincerely,

A handwritten signature in black ink, appearing to read "R. Shashikant". The signature is written in a cursive style with a large initial "R" and a stylized "S" at the end. There is a horizontal line underneath the signature.

HR Shashikant
Senior Vice President and Chief Human Resources Officer



20 June 2016

Steven Pohl

Dear Steve,

In recognition of your critical contributions to the future of Novelis, the Company is awarding you a cash incentive in addition to your other compensation, subject to the terms and conditions set forth herein.

You will receive two payments in the total amount of \$200,000, as follows:

First Payment in July 2016: \$100,000

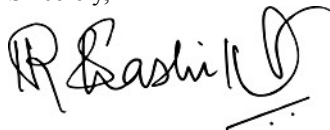
Second Payment in July 2017: \$100,000

Because this award is designed to be a retention incentive, in the event that you voluntarily terminate your employment or are terminated for cause, in either case within 12 months of receiving a payment hereunder, you will be required to repay any such amounts paid in the last 12 months (less applicable taxes), and any unpaid installments will not be paid. If you are terminated without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continuing to be a key member of the team as we focus on building an even more successful Novelis.

Sincerely,

A handwritten signature in black ink, appearing to read "R. Shashikant". The signature is written in a cursive style with a large, stylized initial "R" and a flourish at the end.

HR Shashikant
Senior Vice President and Chief Human Resources Officer



July 29, 2016
Steven Pohl

Dear Steven,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the FY2017 Long-Term Incentive Plan (LTIP), known as the "Bridge Award". The Bridge Award is intended to encourage you to remain with Novelis by supplementing you with a cash incentive while the new Novelis Performance Unit component of the FY2017 LTIP matures. The Bridge Award is in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

You will receive three payments for the FY2017 Bridge Award in the total amount of \$ 75,000.

First Payment in December 2016	\$ 22,500
Second Payment in December 2017	\$ 22,500
Third Payment in December 2018	\$ 30,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2019, or are terminated for cause, you will be required to repay the gross amount of any payments made under the Bridge plan in the previous 12 months and you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continued support as a key member of the team as we focus on building an even more successful Novelis.

Regards,

A handwritten signature in black ink that reads "Steve Fisher".

Steve Fisher
President and Chief Executive Officer
Novelis Inc.



July 29, 2016
Leslie Parrette

Dear Leslie,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the FY2017 Long-Term Incentive Plan (LTIP), known as the "Bridge Award". The Bridge Award is intended to encourage you to remain with Novelis by supplementing you with a cash incentive while the new Novelis Performance Unit component of the FY2017 LTIP matures. The Bridge Award is in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

You will receive three payments for the FY2017 Bridge Award in the total amount of \$ 75,000.

First Payment in December 2016	\$ 22,500
Second Payment in December 2017	\$ 22,500
Third Payment in December 2018	\$ 30,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2019, or are terminated for cause, you will be required to repay the gross amount of any payments made under the Bridge plan in the previous 12 months and you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continued support as a key member of the team as we focus on building an even more successful Novelis.

Regards,

A handwritten signature in black ink that reads "S. Fisher".

Steve Fisher
President and Chief Executive Officer
Novelis Inc.



July 29, 2016
Marco Palmieri

Dear Marco,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the FY2017 Long-Term Incentive Plan (LTIP), known as the "Bridge Award". The Bridge Award is intended to encourage you to remain with Novelis by supplementing you with a cash incentive while the new Novelis Performance Unit component of the FY2017 LTIP matures. The Bridge Award is in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

You will receive three payments for the FY2017 Bridge Award in the total amount of \$ 100,000.

First Payment in December 2016	\$ 30,000
Second Payment in December 2017	\$ 30,000
Third Payment in December 2018	\$ 40,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2019, or are terminated for cause, you will be required to repay the gross amount of any payments made under the Bridge plan in the previous 12 months and you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continued support as a key member of the team as we focus on building an even more successful Novelis.

Regards,

A handwritten signature in black ink that reads "S. Fisher".

Steve Fisher
President and Chief Executive Officer
Novelis Inc.



July 29, 2016
Emilio Braghi

Dear Emilio,

Your contributions to Novelis are very important. In recognition of this, the Company has put in place an enhancement to the FY2017 Long-Term Incentive Plan (LTIP), known as the "Bridge Award". The Bridge Award is intended to encourage you to remain with Novelis by supplementing you with a cash incentive while the new Novelis Performance Unit component of the FY2017 LTIP matures. The Bridge Award is in addition to your other compensation such as your base salary, annual bonus opportunity and long-term incentive opportunity.

You will receive three payments for the FY2017 Bridge Award in the total amount of \$ 50,000.

First Payment in December 2016	\$ 15,000
Second Payment in December 2017	\$ 15,000
Third Payment in December 2018	\$ 20,000

Because this opportunity is designed to enhance our LTIP as a retention incentive, in the event that you voluntarily terminate your employment prior to December 31, 2019, or are terminated for cause, you will be required to repay the gross amount of any payments made under the Bridge plan in the previous 12 months and you will not be entitled to any other payments thereafter. If you are terminated involuntarily without cause, any unpaid cash installments will be immediately cancelled, but you will not be required to repay any cash payments you have received.

Your acceptance of any payments under this award shall constitute your acceptance of the terms and conditions set forth above.

I am very pleased that we are able to offer you this opportunity and I look forward to your continued support as a key member of the team as we focus on building an even more successful Novelis.

Regards,

A handwritten signature in black ink, appearing to read "S. Fisher".

Steve Fisher
President and Chief Executive Officer
Novelis Inc.

List of Subsidiaries of Novelis Inc.

Name of Entity	Jurisdiction of Organization
Novelis Corporation	Texas, United States
Novelis de Mexico, S.A. de C.V.	Mexico
Novelis Global Employment Organization, Inc.	Delaware, United States
Logan Aluminum Inc.	Delaware, United States
Novelis South America Holdings LLC	Delaware, United States
Novelis Acquisitions LLC	Delaware, United States
Novelis Holdings Inc.	Delaware, United States
Novelis Services (North America) Inc.	Delaware, United States
Novelis Services (Europe) Inc.	Delaware, United States
Novelis AG	Switzerland
Novelis Switzerland S.A.	Switzerland
Novelis Italia SpA	Italy
Novelis Europe Holdings Limited	United Kingdom
Novelis UK Ltd	United Kingdom
Novelis Services Limited	United Kingdom
Novelis Aluminium Holding Unlimited Company	Ireland
Novelis Deutschland GmbH	Germany
Aluminium Norf GmbH	Germany
Novelis Aluminium Beteiligungs GmbH	Germany
Deutsche Aluminium Verpackung Recycling GmbH	Germany
Novelis Sheet Ingot GmbH	Germany
France Aluminium Recyclage S.A.	France
Novelis Laminés France S.A.S.	France
Novelis PAE S.A.S.	France
4260848 Canada Inc.	Canada
4260856 Canada Inc.	Canada
8018227 Canada Inc.	Canada
Novelis Korea Limited	South Korea
Novelis (China) Aluminum Products Co., Ltd.	China
Novelis (Shanghai) Aluminum Trading Co., Ltd.	China
Novelis Vietnam Company Limited	Vietnam
Novelis MEA Ltd.	Dubai, UAE
Novelis do Brasil Ltda.	Brazil
Brecha Energetica Ltda	Brazil
Novelis (India) Infotech Ltd.	India

Certification

I, Steven Fisher, certify that:

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

/s/ Steven Fisher

Steven Fisher

President and Chief Executive Officer

(Principal Executive Officer)

Date: May 10, 2017

Certification

I, Devinder Ahuja, certify that:

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

/s/ Devinder Ahuja

Devinder Ahuja
Chief Financial Officer
(Principal Financial Officer)

Date: May 10, 2017

**Certification Pursuant to 18 U.S.C. Section 1350 as adopted pursuant to
Section 906 of the Sarbanes-Oxley Act of 2002**

Pursuant to 18 U.S.C. Section 1350, the undersigned officer of Novelis Inc. (Novelis), hereby certifies that Novelis' Annual Report on Form 10-K for the period ended March 31, 2017 (Report) fully complies with the requirements of Section 13(a) or Section 15(d), as applicable, of the Securities Exchange Act of 1934, as amended, and that the information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of Novelis.

/s/ Steven Fisher

Steven Fisher

President and Chief Executive Officer

(Principal Executive Officer)

Date: May 10, 2017

of this Report.

The foregoing certification is being furnished solely pursuant to 18 U.S.C. Section 1350 and is not being filed as part

**Certification Pursuant to 18 U.S.C. Section 1350 as adopted pursuant to
Section 906 of the Sarbanes-Oxley Act of 2002**

Pursuant to 18 U.S.C. Section 1350, the undersigned officer of Novelis Inc. (Novelis), hereby certifies that Novelis' Annual Report on Form 10-K for the period ended March 31, 2017 (Report) fully complies with the requirements of Section 13(a) or Section 15(d), as applicable, of the Securities Exchange Act of 1934, as amended, and that the information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of Novelis.

/s/ Devinder Ahuja

Devinder Ahuja

Chief Financial Officer

(Principal Financial Officer)

Date: May 10, 2017

of this Report.

The foregoing certification is being furnished solely pursuant to 18 U.S.C. Section 1350 and is not being filed as part