BRASKEM SA
Form 20-F
September 25, 2017

As filed with the Securities and Exchange Commission on September 22, 2017

UNITED STATES

SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 20-F

REGISTRATION STATEMENT PURSUANT TO SECTION 12(b) OR 12(g) OF THE SECURITIES EXCHANGE ACT OF 1934

OR

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

FOR THE FISCAL YEAR ENDED DECEMBER 31, 2016

OR

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

OR

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

Commission file number: 001-14862

BRASKEM S.A.

(Exact Name of Registrant as Specified in its Charter)

N/A	**The Federative Republic of Brazil**
(Translation of Registrant s Name into English)	**(Jurisdiction of Incorporation or Organization)**

Rua Lemos Monteiro, 120 24° andar

Butantã São Paulo SP, CEP 05501-050, Brazil

(Address of Principal Executive Offices)

Pedro van Langendonck Teixeira de Freitas

Braskem S.A.

Rua Lemos Monteiro, 120 24° andar

Butantã São Paulo SP, CEP 05501-050, Brazil

Telephone: + (55 11) 3576-9000

Fax: + (55 11) 3576-9532

(Name, Telephone, E-mail and/or Facsimile number and Address of Company Contact Person)

Securities registered or to be registered pursuant to Section 12(b) of the Act:

Title of Each Class	Name of Each Exchange on which Registered
Preferred Shares, Class A, without par value per share, each represented by American Depositary Receipts	New York Stock Exchange

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

Securities for which there is a reporting obligation pursuant to Section 15(d) of the Act:

TITLE OF EACH CLASS:

6.450% Notes due 2024, issued by Braskem Finance Limited

The total number of issued shares of each class of stock of Braskem S.A. as of December 31, 2016 was:

451,668,652 Common Shares, without par value

345,010,622 Preferred Shares, Class A, without par value

578,330 Preferred Shares, Class B, without par value

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

If this report is an annual or transition report, indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934. Yes No

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

Indicate by check mark whether the registrant has submitted electronically 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 (§232.405 of this chapter) 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 whether the registrant is a large accelerated filer, an accelerated filer, or a non-accelerated filer. See definition of accelerated filer and large accelerated filer in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer Accelerated filer Non-accelerated filer Emerging growth company

If an emerging growth company that prepares its financial statements in accordance with U.S. GAAP, 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. The term new or revised financial accounting standard refers to any update issued by the Financial Accounting Standards Board to its Accounting Standards Codification after April 5, 2012.

Indicate by check mark which basis of accounting the registrant has used to prepare the financial statements included in this filing:

U.S. GAAP International Financial Reporting Standards as issued by the International Accounting Standards Board Other

If Other has been checked in response to the previous question, indicate by check mark which financial statement item the registrant has elected to follow. Item 17 Item 18

If this is an annual report, indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). Yes No

Table of Contents

TABLE OF CONTENTS

Table of Contents

PRESENTATION OF FINANCIAL AND OTHER INFORMATION

All references herein to the *real*, *reais* or R$ are to the Brazilian *real*, the official currency of Brazil. All references to U.S. dollars, dollars or US$ are to U.S. dollars, the official currency of the United States. All references to CHF are Swiss francs, the official currency of Switzerland.

All references herein (1) to we, us or our company are references to Braskem S.A., its consolidated subsidiaries and jointly controlled entities, and (2) to Braskem are references solely to Braskem S.A. All references herein to Braskem Europe mean Braskem Europe GmbH and its consolidated subsidiaries, including Braskem America, Inc., or Braskem America.

On September 21, 2017, the exchange rate for *reais* into U.S. dollars was R$3.1347 to US$1.00, based on the selling rate as reported by the Central Bank of Brazil (*Banco Central do Brasil*), or the Central Bank. The selling rate was R$3.2591 to US$1.00 on December 31, 2016, R$3.9048 to US$1.00 on December 31, 2015 and R$2.6562 to US$1.00 on December 31, 2014, in each case, as reported by the Central Bank. The *real*/U.S. dollar exchange rate fluctuates widely, and the selling rate on September 21, 2017 may not be indicative of future exchange rates. See Item 3. Key Information Exchange Rates for information regarding exchange rates for the *real* since January 1, 2012.

Solely for the convenience of the reader, we have translated some amounts included in Item 3. Key Information Selected Financial and Other Information and elsewhere in this annual report from *reais* into U.S. dollars using the selling rate as reported by the Central Bank as of December 31, 2016 of R$3.2591 to US$1.00. These translations should not be considered representations that any such amounts have been, could have been or could be converted into U.S. dollars at that or at any other exchange rate. Such translations should not be construed as representations that the *real* amounts represent or have been or could be converted into U.S. dollars as of that or any other date.

Financial Statements

We maintain our books and records in reais. Our consolidated financial statements as of December 31, 2016 and 2015 and for the three years ended December 31, 2016 have been audited, as stated in the report appearing herein, and are included in this annual report.

We have prepared our consolidated financial statements included in this annual report in accordance with International Financial Reporting Standards, as issued by the International Accounting Standards Board, or IFRS.

Market Share and Other Information

We make statements in this annual report about our market share in the petrochemical industry in Brazil and our production capacity relative to that of other petrochemical producers in Brazil, Latin America, the United States and the world. We have made these statements on the basis of information obtained from third-party sources that we believe are reliable. We have calculated our Brazilian market share with respect to specific products by dividing our domestic net sales volumes of these products by the total Brazilian domestic consumption of these products. We derive information regarding the production capacity of other companies in the Brazilian petrochemical industry and the estimated total Brazilian domestic consumption of petrochemical products principally from reports published by the Brazilian Chemical Industry Association (*Associação Brasileira da Indústria Química*), or ABIQUIM. We derive information regarding the production capacity of other companies in the global petrochemical industry, international market prices for petrochemicals products and per capita consumption in certain geographic regions, principally from reports published by IHS, Inc., or IHS. We derive information relating to Brazilian imports and exports from the

System for Analyzing International Trade (*Sistema de Análise das Informações de Comércio Exterior*), or ALICE-Web, produced by the Brazilian Secretary of International Trade (*Secretaria de Comércio Exterior*) and the Brazilian Secretary of Development, Industry and Trade (*Ministério do Desenvolvimento, Indústria e Comércio Exterior*). We also include information and statistics regarding economic growth in emerging economies obtained from the International Monetary Fund and statistics regarding gross domestic product, or GDP, growth in Brazil, the United States, Europe and Mexico obtained from independent public sources such as the Brazilian Institute of Geography and Statistics (*Instituto Brasileiro de Geografia e Estatística*), or the IBGE; the U.S. Department of Commerce, Eurostat, the statistical office of the European Union; and the Mexican Institute of Statistics and Geography (*Instituto Nacional de Estadística y Geografía*).

Table of Contents

We have no reason to believe that any of this information is inaccurate in any material respect. However, we have not independently verified the production capacity, market share, market size or similar data provided by third parties or derived from industry or general publications.

We provide information regarding domestic apparent consumption of some of our products, based on information available from the Brazilian government, Institute of Applied Economic Research (*Instituto de Pesquisa Econômica Aplicada*), IPEA and ABIQUIM. Domestic apparent consumption is equal to domestic production plus imports minus exports. Domestic apparent consumption for any period may differ from actual consumption because this measure does not give effect to variations of inventory levels in the petrochemical supply chain.

Certain Industry Terms

As used in this annual report:

production capacity means the annual nominal capacity for a particular facility, calculated based upon operations for 24 hours each day of a year and deducting scheduled downtime for regular maintenance; and

ton means a metric ton, which is equal to 1,000 kilograms or 2,204.62 pounds.

Rounding

We have made rounding adjustments to some of the amounts included in this annual report. As a result, numerical figures shown as totals in some tables may not be arithmetic aggregations of the amounts that precede them.

Table of Contents

CAUTIONARY STATEMENT WITH RESPECT TO FORWARD-LOOKING STATEMENTS

This annual report contains forward-looking statements. Some of the matters discussed concerning our business operations and financial performance include forward-looking statements within the meaning of the U.S. Securities Act of 1933, as amended, or the Securities Act, or the U.S. Securities Exchange Act of 1934, as amended, or the Exchange Act.

Statements that are predictive in nature, that depend upon or refer to future events or conditions or that include words such as expects, anticipates, intends, plans, believes, estimates and similar expressions are forward-looking statements. Although we believe that these forward-looking statements are based upon reasonable assumptions, these statements are subject to several risks and uncertainties and are made in light of information currently available to us.

Our forward-looking statements may be influenced by numerous factors, including the following:

- general economic, political and business conditions in the markets in which we operate, including demand and prices for petrochemical products;
- interest rate fluctuations, inflation and exchange rate movements of the *real* in relation to the U.S. dollar and other currencies;
- the cyclical nature of the global petrochemical industry;
- competition in the global petrochemical industry;
- prices of naphtha, ethane, propane, propylene and other raw materials;
- international prices of petrochemical products;
- actions taken by our major shareholders;
- our ability to implement our financing strategy and to obtain financing on satisfactory terms;
- our progress in integrating the operations of companies or assets that we may acquire in the future, so as to achieve the anticipated benefits of these acquisitions;
- changes in laws and regulations, including, among others, laws and regulations affecting tax and environmental matters and import tariffs in other markets in which we operate or to which we export our

products;

future changes in Brazilian, Mexican, American and European policies and related actions undertaken by those governments;

a deterioration in the world economy that could negatively impact demand for petrochemicals;

decisions rendered in major pending or future tax, labor and other legal proceedings; and

other factors identified or discussed under Item 3. Key Information Risk Factors.

Our forward-looking statements are not guarantees of future performance, and our actual results or other developments may differ materially from the expectations expressed in the forward-looking statements. As for forward-looking statements that relate to future financial results and other projections, actual results will be different due to the inherent uncertainty of estimates, forecasts and projections. Because of these uncertainties, potential investors should not rely on these forward-looking statements.

Forward-looking statements speak only as of the date they are made, and we do not undertake any obligation to update them in light of new information or future developments or to release publicly any revisions to these statements in order to reflect later events or circumstances or to reflect the occurrence of unanticipated events.

Table of Contents

PART I

I TEM 1. IDENTITY OF DIRECTORS, SENIOR MANAGEMENT AND ADVISERS

Not applicable.

ITEM 2. OFFER STATISTICS AND EXPECTED TIMETABLE

Not applicable.

ITEM 3. KEY INFORMATION

Selected Financial and Other Information

The following selected information should be read in conjunction with Presentation of Financial and Other Information, Item 5. Operating and Financial Review and Prospects and our audited consolidated financial statements and the related notes thereto, which are included in this annual report.

The selected financial data as of December 31, 2016 and 2015 and for the three years ended December 31, 2016 have been derived from our audited consolidated financial statements, prepared in accordance with IFRS, and included in this annual report. Our audited consolidated financial statements as of December 31, 2014 and 2013 and for the years ended December 31, 2014 and 2013 have been adjusted for the effects of the restatement more fully described in this annual report and in note 2.4 to our audited consolidated financial statements.

As a result of the independent internal investigation that was conducted by law firms with extensive experience in similar cases in the United States and Brazil, each an Expert Firm and, collectively, the Expert Firms, into the allegations described in note 23.3 to our audited consolidated financial statements as of December 31, 2016 in the context of the so-called Operation Car Wash (*Operação Lava Jato*), or the Investigation, we identified several errors in our previously issued financial statements as of December 31, 2015 and 2014 and for the three years ended December 31, 2015, which have been restated.

The selected financial data as of December 31, 2013 and 2012 and for the years ended December 31, 2012 have been derived from Braskem s accounting records and reflect the restatement of improperly classified expenses from selling and distribution expense to other expense and to correct errors in the calculation of tax payables.

We have included information with respect to the dividends and/or interest attributable to shareholders equity paid to holders of our common shares and preferred shares since January 1, 2012 in *reais* and in U.S. dollars translated from *reais* at the commercial market selling rate in effect as of the payment date under the caption Item 8. Financial Information Dividends and Dividend Policy Payment of Dividends.

We prepare individual financial statements in accordance with the accounting practices adopted in Brazil, pursuant of Law 6,404/76 and subsequent adjustments, and of the standards issued by the *Comitê de Pronunciamentos Contábeis* (CPC), including for the calculation of dividends.

Table of Contents

	For the Year Ended December 31,					
	2016(1)	2016	2015 Restated	2014 Restated	2013 Restated	2012 Restated
	(in millions of US$, except per share data)	(in millions of *reais*, except per share data)				
Statement of Operations Data:						
Net sales revenue	US$ 14,624,9	R$ 47,664.0	R$ 46,880.0	R$ 45,135.9	R$ 40,229.0	R$ 36,160.3
Cost of products sold	(10,720.9)	(34,940.6)	(36,728.0)	(39,351.7)	(35,225.4)	(32,709.1)
Gross profit	3,904.0	12,723.4	10,152.0	5,784.2	5,003,6	3,451.2
Income (expenses):						
Selling and Distribution	(432.9)	(1,410.8)	(1,083.2)	(1,037.4)	(924.6)	(932.8)
General and administrative	(453.3)	(1,477.2)	(1,280.5)	(1,195.5)	(1,002.7)	(1,071.0)
Research and development	(49.7)	(162.0)	(169.6)	(128.1)	(115.7)	(106.2)
Results from equity investments	9.2	30.1	2.2	3.9	(3.2)	(25.8)
Other operating income (expenses), net	(1,151.3)	(3,752.2)	(731.2)	42.8	(320.9)	239.9
Operating profit	1,826.0	5,951.2	6,889.7	3,469.8	2,637.5	1,555.3
Financial results:						
Financial expenses	(1,095.7)	(3,571.0)	(3,163.4)	(2,716.4)	(2,534.2)	(2,037.5)
Financial income	211.8	690.1	584.9	399.9	772.0	312.2
Exchange rate variations, net	(985.1)	(3,210.4)	102.9	(84.1)	7.1	(1,678.9)
Financial expenses, net	(1,869.0)	(6,091.3)	(2,475.6)	(2,400.6)	(1,755.1)	(3,404.2)
Profit (loss) before income tax and social contribution	(43.0)	(140.0)	4,414.2	1,069.2	882.4	(1,848.9)
Current and deferred income tax and social contribution	(189.0)	(616.0)	(1,660.4)	(491.0)	(456.7)	783.1
Profit (loss) from continuing operations	(232.0)	(756.1)	2,753.8	578.2	425.7	(1,065.8)

Results from discontinued operations		8.3		26.9		6.4		0.1		15.7		281.5
Profit (loss)	US$	(223.7)	R$	(729.2)	R$	2,760.2	R$	578.2	R$	441.4	R$	(784.3)
Profit (loss) attributable to shareholders of the company	US$	(126.3)	R$	(411.5)	R$	3,001.2	R$	716.0	R$	444.1	R$	(777.1)
Loss attributable to non-controlling interest		(97.5)		(317.7)		(241.5)		(137.8)		(2.7)		(7.2)
Profit (loss) per share:												
Basic:												
Common shares	US$	(0.1691)	R$	(0.5511)	R$	3.7651	R$	0.8995	R$	0.5210	R$	(1.3296)
Preferred class A shares		(0.1691)		(0.5511)		3.7651		0.8995		0.6062		(1.3296)
Preferred class B shares						0.6065		0.6062		0.6062		
Diluted:												
Common shares	US$	(0.1587)	R$	(0.5173)	R$	3.7732	R$	0.8996	R$	0.5210	R$	(1.3296)
Preferred class A shares		(0.1587)		(0.5173)		3.7731		0.8996		0.6062		(1.3296)
Preferred class B shares						0.6065		0.6062		0.6062		
ADS(2)		(0.3174)		(1.0346)		7.5464		1.7992		1.0427		(2.6592)

(1) Translated for convenience only using the selling rate as reported by the Central Bank as of December 31, 2016 for *reais* into U.S. dollars of R$3.2591=US$1.00.

(2) American depositary shares (ADS) are U.S. dollar-denominated equity shares of a foreign-based company on an American stock exchange. In our case, each ADS represents two class A preferred shares.

2

Table of Contents

	2016(1)	2016	2015 Restated	2014 Restated	2013 Restated	2012 Restated
		At and For the Year Ended December 31,				
	(in millions of US$, except as indicated)	(in millions of *reais*, except as indicated)				
Balance Sheet Data:						
Cash and cash equivalents(2)	US$ 2,421.6	R$ 7,892.3	R$ 7,458.2	R$ 4,085.7	R$ 4,335.9	R$ 3,287.6
Short-term trade accounts receivable	501.4	1,634.1	2,755.7	2,409.1	2,792.3	2,326.5
Inventories(3)	1,626.1	5,299.5	6,243.7	5,688.3	5,172.4	4,102.1
Property, plant and equipment	9,001.5	29,336.7	34,100.3	29,071.0	25,410.1	21,176.8
Total assets	15,900.7	51,821.9	60,626.9	49,501.9	46,844.6	41,170.0
Short-term borrowings (including current portion of long-term borrowings)	796.1	2,594.5	1,970.0	1,419.5	1,249.6	1,836.0
Long-term borrowings	6,362.7	20,736.6	25,380.5	18,926.7	17,362.9	15,675.6
Capital	2,467.9	8,043.2	8,043.2	8,043.2	8,043.2	8,043.2
Shareholders equity (including non-controlling interest)	527.9	1,720.7	945.5	5,597.1	7,543.9	8,588.7
Other Financial and Operating Information:						
Cash Flow Information:						
Net cash provided by (used in):						
Operating activities	US$ 1,456.3	R$ 4,746.2	R$ 7,877.8	R$ 3,813.1	R$ 2,457.8	R$ 2,571.8
Investing activities	(871.7)	(2,840.9)	(4,120.3)	(5,054.1)	(4,954.2)	(2,834.3)
Financing activities	(846.0)	(2,757.3)	(97.5)	894.4	3,614.2	633.9
Other Information:						
Capital expenditures:						
Property, plant and equipment	871.2	2,839.2	4,103.9	5,378.8	5,656.4	2,792.9
Investments in other companies				0.1		
Total Sales Volume Data* (in thousands of tons):						

Ethylene(4)	576.1	548.6	511.4	535.4	531.9
Propylene(4)	370.6	416.5	445.7	389.0	406.6
Polyethylene	2,729.7	2,626.9	2,386.5	2,543.7	2,530.0
Polypropylene	1,671.9	1,513.1	1,591.9	1,580.8	1,648.8
Polyvinyl chloride (PVC)	645.2	594.9	659.6	636.5	560.9

(1) Translated for convenience only using the selling rate as reported by the Central Bank as of December 31, 2016 for *reais* into U.S. dollars of R$3.2591=US$1.00.
(2) Includes non-current financial investments.
(3) Includes non-current advances to suppliers.
(4) Includes only third-party sales.
(*) Unaudited.

Exchange Rates

The Brazilian foreign exchange system allows the purchase and sale of foreign currency and the international transfer of *reais* by any person or legal entity, regardless of the amount, subject to certain regulatory procedures. Since 1999, the Central Bank has allowed the U.S. dollar-*real* exchange rate to float freely, and, since then, the U.S. dollar-*real* exchange rate has fluctuated considerably.

Table of Contents

In the past, the Central Bank has intervened occasionally to control unstable movements in foreign exchange rates. We cannot predict whether the Central Bank or the Brazilian government will continue to permit the *real* to float freely or will intervene in the exchange rate market through the return of a currency band system or otherwise. The *real* may depreciate or appreciate against the U.S. dollar substantially. Furthermore, Brazilian law provides that, whenever there is a serious imbalance in Brazil s balance of payments or there are serious reasons to foresee a serious imbalance, temporary restrictions may be imposed on remittances of foreign capital abroad. We cannot assure you that such measures will not be taken by the Brazilian government in the future. See Risk Factors Risks Relating to Brazil Brazilian government exchange control policies could increase the cost of servicing our foreign currency-denominated debt, adversely affect our ability to make payments under our foreign currency-denominated debt obligations and impair our liquidity and Risk Factors Risks Relating to Our Class A Preferred Shares and the ADSs If holders of the ADSs exchange them for class A preferred shares, they may risk temporarily losing, or being limited in, the ability to remit foreign currency abroad and certain Brazilian tax advantages.

The following table shows the selling rate for U.S. dollars for the periods and dates indicated. The information in the Average column represents the average of the exchange rates on the last day of each month during the periods presented.

	***Reais* per U.S. Dollars**			
Year	**High**	**Low**	**Average**	**Period End**
2012	R$ 2.112	R$ 1.702	R$ 1.955	R$ 2.043
2013	2.446	1.953	2.161	2.343
2014	2.740	2.197	2.355	2.656
2015	4.195	2.575	3.339	3.905
2016	4.156	3.119	3.483	3.259

	***Reais* per U.S. Dollars**	
Month	**High**	**Low**
March 2017	R$ 3.1735	R$ 3.0765
April 2017	3.1984	3.0923
May 2017	3.3807	3.0924
June 2017	3.3362	3.2307
July 2017	3.3193	3.1256
August 2017	3.1976	3.1161
September 2017 (through September 21)	3.1389	3.0852

Source: Central Bank.

Risk Factors

Risks Relating to Our Company and the Petrochemical Industry

The cyclical nature of the petrochemical industry may reduce our net sales revenue and gross margin.

The petrochemical industry, including the global markets in which we compete, is cyclical and sensitive to changes in global supply and demand. This cyclicality may reduce our net sales revenue, increase our costs and decrease our gross margin, including as follows:

- downturns in general business and economic activity may cause demand for our products to decline;
- when global demand falls, we may face competitive pressures to lower our prices;
- increases in prices of the main raw materials we use, principally naphtha, ethane and propylene; and

if we decide to expand our plants or construct new plants, we may do so based on an estimate of future demand that may never materialize or materializes at levels lower than we predicted.

Historically, the international petrochemical markets have experienced alternating periods of limited supply, which have caused prices and profit margins to increase, followed by expansion of production capacity, which has resulted in oversupply and reduced prices and profit margins. Prices in the petrochemical industry follow the global petrochemical industry, and we establish the prices for the products we sell in Brazil, Latin America, the United States and the world with reference to international market prices. Therefore, our net sales revenue and gross margin are increasingly linked to global industry conditions that we cannot control, and which may adversely affect our results of operations and financial position.

Our revenue from customers is significant, and the credit risks associated with certain of these customers could adversely affect our results of operations.

We engage in a number of transactions where counterparty credit risk is a relevant factor, including transactions with customers and those businesses we work with to provide services, among others. These risks are dependent upon market conditions and also the real and perceived viability of the counterparty. The failure or perceived weakness of any of our counterparties has the potential to expose us to risk of loss in certain situations. Our revenue from our customers is significant, and the credit risks associated with certain of these customers could adversely affect our results of operations. Certain contracts and arrangements that we enter into with counterparties may provide us with indemnification clauses to protect us from financial loss. To the extent the credit quality of these customers deteriorates or these customers seek bankruptcy protection, our ability to collect our receivables, and ultimately our results of operations, may be adversely affected.

Our results may be adversely affected by increases in reserves for uncollectible accounts receivable.

We have a large balance of accounts receivable and have established a reserve for the portion of such accounts receivable that we estimate will not be collected because of our customers non-payment.

If the business viability of certain of our customers deteriorates or our credit policies are ineffective in reducing our exposure to credit risk, additional increases in reserves for uncollectible accounts may be necessary, which could have a material adverse effect on our cash flows and results of operations. We record an allowance for doubtful accounts in an amount we consider sufficient to cover estimated losses on the realization of our trade accounts receivable, taking into account our loss experience and the aging of our accounts receivable, but we cannot assure you that these amounts will be sufficient to cover eventual losses.

As of December 31, 2016, our total trade accounts receivable was R$2,084.9 million and the provision for doubtful accounts was R$380.6 million. Significant changes in our historical loss experience on accounts receivable which are not apparent through our aging analysis could require significant changes to our provisions for doubtful accounts, and, therefore, have an adverse effect on our results of operations and financial condition.

Global macroeconomic factors have had, and may continue to have, adverse effects on the margins that we realize on our products.

Our results of operations may be materially affected by adverse conditions in the financial markets and depressed economic conditions generally. Economic downturns in geographic areas in which we sell our products may substantially reduce demand for our products and result in decreased sales volumes. Recessionary environments adversely affect our business because demand for our products is reduced.

Reduced or negative growth in emerging economies resulted in decreased growth in the global economy, which increase is estimated at 3.1% in 2016, according to the International Monetary Fund. In 2016, Brazil s GDP contracted 3.6%, as compared to a contraction of 3.8% in 2015 and growth of 0.5% in 2014, according to the IBGE. In 2016, demand for thermoplastic resins in Brazil declined by 1%.

Table of Contents

In the United States, GDP grew by 1.6% in 2016 compared to growth of 2.6% in 2015 and growth of 2.4% in 2014, according to the U.S. Department of Commerce. In Europe, GDP grew by 1.7% in 2016 compared to growth of 2.0% in 2015 and growth of 1.4% in 2014, according to Eurostat, outpacing the United States for the first time since the 2008 financial crisis. Mexico s GDP grew by 2.4% in 2016 compared to growth of 2.6% in 2015 and growth of 2.3% in 2014, according to Mexican Institute of Statistics and Geography.

Our ability to export to other countries is a function of the level of economic growth in those countries and other economic conditions, including prevailing inflation and interest rates. In addition, disruptions in the global balance between supply and demand may impair our ability to export our products in response to a decline in domestic demand for these products. Prolonged volatility in economic activity in our key export markets, such as South America, Europe and Asia, could continue to reduce demand for some of our products and lead to increased margin pressure by importers into Brazil, which would adversely affect our results of operations.

We face competition from producers of polyethylene, polypropylene, PVC and other petrochemical products.

We face strong competition across all of our petrochemical products. Our U.S. operations face competition in the United States from other U.S. producers of polypropylene and the other foreign producers of polypropylene that serve the United States. Our German operations face competition in Europe and the other export markets that it serves from European and other foreign producers of polypropylene. Our Mexico operations face competition from Mexican and U.S. producers of polyethylene producers. In Brazil, although only our vinyls business faces competition in Brazil, players from South America are able to export to Brazil with reduced or no import duties. In addition, producers of almost all continents have regular or spot sales to trading companies and direct customers in Brazil for petrochemicals and resins.

We generally set the prices for our second generation products sold in Brazil with reference to the prices charged for these products by foreign producers in international markets. We generally set the prices for our second generation products exported from Brazil based on international spot market prices. We set the prices for polypropylene sold in the United States and Europe based on regional market pricing. The price for polyethylene in Mexico is based on prices for the polymer in the U.S Gulf Coast region.

As a result of the announced commissioning of new ethylene capacity, particularly in the United States, in the Middle East and in China, coupled with the increased competitiveness of gas-based ethylene producers in United States as a result of their relatively lower raw material costs, we anticipate that we may experience increasing competition from other producers of second generation products in the markets in which we sell these products. In addition, the appreciation of the *real* against the U.S. dollar may increase the competitiveness of prices of imported products in *reais,* which may increase the competition in Brazil from other producers of second generation products. Some of our foreign competitors are substantially larger and have greater financial, manufacturing, technological and/or marketing resources than our company.

Higher raw materials costs would increase our cost of goods sold and services rendered and may reduce our gross margin and negatively affect our overall financial performance.

Naphtha, a crude oil derivative, is the principal raw material used by our Basic Petrochemicals Unit and, indirectly, in our other business units in Brazil. Naphtha accounted, directly and indirectly, for approximately 42.7% of our consolidated cost of sales and services rendered in 2016.

Ethane and propane are the principal raw materials that we use to produce our basic petrochemical products in the Rio de Janeiro Complex and represent the principal production and operating cost of that Basic Petrochemicals Unit.

Ethane and propane accounted, directly and indirectly, for approximately 0.5% and 1.2%, respectively, of our consolidated cost of sales and services rendered in 2016.

Ethane is the principal raw material that we use to produce ethylene in the Mexico Complex and represents the principal production and operating cost of the Mexico Complex. Ethane accounted, directly and indirectly, for approximately 0.6% of our consolidated costs of sales and services rendered in 2016. Propylene is the principal raw material that we use to produce polypropylene in the United States and Europe and represents the principal production and operating cost of our USA and Europe Unit. We also purchase propylene in the Brazilian market for our Brazilian polypropylene plants. Propylene accounted, directly and indirectly, for approximately 16.8% of our consolidated costs of sales and services rendered in 2016.

In Brazil, we purchase the naphtha, used by our Basic Petrochemicals Unit at prices based on the Amsterdam-Rotterdam-Antwerp naphtha price and the ethane and propane at Mont Belvieu market prices. We purchase ethane used by our Mexico Unit at prices based on the Mont Belvieu purity ethane. We purchase the propylene used in Brazil and by our USA and Europe Unit at prices based on U.S. Gulf reference price, or the USG price. We purchase refinery off gas at a price related to imported natural gas price.

The Amsterdam-Rotterdam-Antwerp market price of naphtha fluctuates primarily based on changes in the U.S. dollar-based price of Brent crude oil on the Intercontinental Exchange based in London. The Amsterdam-Rotterdam-Antwerp naphtha price averaged US$385 per ton, down 17% from 2015, explained by lower oil prices. The decrease mainly reflects (i) the higher production and uncertainties concerning global supply; (ii) higher inventories, especially in the U.S. Gulf region; and (iii) lower demand for fuel production.

The Mont Belvieu prices of ethane averaged 20 cents per gallon, or US$146 per ton, increasing 7% from 2015, explained by the stronger demand resulting from logistics debottlenecking projects, which supported higher export volumes.

The U.S. Gulf (USG) price reference for propylene averaged US$759 per ton in 2016, or 12% lower than in 2015, due to the feedstock s higher supply in the year from propane dehydrogenation, or PDH, which, despite some operating difficulties in the second half of 2016, operated at higher capacity utilization rates than in the prior year.

The European price reference for propylene averaged US$727 per ton in 2016, or 23% lower than in 2015, due to limited supply during most of 2015, when low inventories and an above-normal number of unscheduled shutdowns led to price increases in that period. The price of naphtha, ethane, propane and propylene in U.S. dollars has been, and may continue to be, volatile. In addition, fluctuations of the U.S. dollar in the future may effectively increase our naphtha or natural gas costs in *reais*. Any increase in naphtha, ethane, propane or propylene costs would reduce our gross margin and negatively affect our overall financial performance to the extent we are unable to pass on these increased costs to our customers and could result in reduced sales volumes of our products.

We do not hedge against changes in the price of our principal raw materials, so we are exposed to fluctuations in the price of these primary raw materials.

Currently, we do not hedge our feedstock s price exposure. We observed a high historical correlation between our feedstock (most notably, naphtha) and our final products (polyethylene, polypropylene and PVC, among others). Historically, fluctuations in naphtha s price were followed by variations in the same direction in first- and second-generation petrochemical products. An eventual hedge solely in naphtha s price would break this natural protection, which could make our results more volatile. However, considering our ongoing process of feedstock diversification, with ethane and propane representing a more significant portion of our variable costs, the natural protection described above tends to be impaired. This occurs because ethane and propane have significantly lower correlation to the price of our final products, when compared to naphtha and propylene. In the past, when this scenario has materialized, we have not been able to pass on all of the corresponding increases in our feedstocks costs, which reduce our gross margin and net income. If this impairment of our natural protection continues and we experience significant volatility in the prices of our feedstocks or final product, there could be a material adverse effect on our results of operations.

We depend on Petrobras to supply us with a substantial portion of our naphtha, ethane, propane and propylene requirements.

Petróleo Brasileiro S.A. Petrobras, or Petrobras, is the only Brazilian supplier of naphtha and has historically supplied approximately 70% of the naphtha consumed by our Basic Petrochemicals Unit. Petrobras currently is also our primary supplier of ethane, propane and refinery off gas and has historically supplied the ethane, propane and refinery off gas consumed at our petrochemical complex located in Duque de Caxias in the State of Rio de Janeiro, or the Rio de Janeiro Complex, and our São Paulo Complex.

We are party to several propylene contracts with Petrobras refineries, which in 2016 were responsible for the supply of 36.5% of our propylene demand to produce polypropylene in Brazil. As a result of limited infrastructure in Brazil to allow the importation of propylene in large quantities and substantial costs associated with the storage and transportation of the product, we are highly dependent on the propylene supplied by Petrobras.

Table of Contents

Thus, our production volumes and net sales revenue would likely decrease and adversely affect our overall financial performance in the event of the following:

- significant damage to Petrobras refineries or to the port facilities through which Petrobras imports naphtha, or to any of the pipelines connecting our plants to Petrobras facilities, whether as a consequence of an accident, natural disaster, fire or otherwise; or
- any termination by Petrobras of the naphtha, ethane, propane or propylene supply contracts with our company, which provide that Petrobras may terminate the contracts for certain reasons described in Item 4. Information on the Company.

In addition, although regulatory changes have ended Petrobras monopoly in the Brazilian naphtha market and have allowed us to import naphtha, any restrictions imposed on the importation of naphtha into Brazil could increase our production costs. For a discussion of additional risks related to sole-source suppliers, see We rely on limited or sole-source suppliers for our raw materials.

We depend on propylene supplied by third parties in the United States and Europe.

Our reliance on third party suppliers poses significant risks to our results of operations, business and prospects. We rely upon third parties to supply our plants with propylene. We acquire propylene for our polypropylene plants in the United States under a variety of long-term supply agreements and through the spot market. As of December 31, 2016, we had long-term supply agreements with multiple suppliers. The pricing formulas for propylene under these supply agreements are generally based on market prices. A portion of the propylene supplied to our gulf coast plants is provided by a limited agreement that we formed with a leading basic petrochemicals producer, under which we acquire propylene produced by an ethylene facility of that producer in La Porte, Texas. Under the terms of the partnership agreement, the partnership has agreed to provide us with sufficient propylene to produce up to approximately 25% of our U.S. gulf coast plants current annual production capacity into early 2018, at prices calculated based on a cost-based formula that includes a fixed discount that declines until 2018.

We acquire propylene for our polypropylene plants in Germany under long-term supply agreements that provide for the supply of 91% of the propylene requirements of these plants. We have two main supply agreements in Germany. One will expire in September 2021 and is automatically renewable for consecutive one-year terms, unless cancelled by one of the parties, and the other expires in December 2021. The pricing formula for propylene under these supply agreements is based on market prices.

Delays in the availability of propylene of acceptable quality, or our inability to obtain such acceptable propylene in the quantities we need or at all, may adversely affect our revenue and results of operations.

We depend on ethane supplied by Pemex TRI in Mexico.

In Mexico, Braskem Idesa has entered into a long-term supply contract to purchase ethane from Pemex Transformación Industrial (successor of Pemex Gas y Petroquímica Básica), or Pemex TRI, a state-owned Mexican company, under competitive commercial conditions. Any termination by Pemex TRI of this supply contract could have a material adverse effect on our overall financial performance. The provisions for early termination by Pemex TRI include but are not limited to (i) material breach of our obligations or failure to cure any breach of the agreement or assignment and (ii) continuous occurrence of a force majeure event or emergency shutdown.

Thus, our production volumes and net sales revenue would likely decrease and adversely affect our overall financial performance in the event of the following:

significant damage to Pemex TRI s refineries or to the port facilities through which Pemex TRI would import ethane or to any of the pipelines connecting our plants to Pemex TRI s facilities, whether as a consequence of an accident, natural disaster, fire or otherwise; or

8

any termination by Pemex TRI of the ethane supply contract with our company, which provides that Pemex TRI may terminate the contracts for certain reasons described in Item 4. Information on the Company.

We rely on limited or sole-source suppliers for our raw materials.

We rely on Petrobras for most or all of our supply of naphtha, ethane, propane, refinery off gas and propylene in Brazil, few companies for our supply of propylene in our USA and Europe Unit, and Pemex TRI for our supply of ethane in Mexico. As a result, we are subject to substantial risks because of our reliance on these and other limited or sole-source suppliers, including the following risks:

if a supplier does not provide naphtha, ethane, propane, refinery off gas or propylene, as the case may be, that meet our or their specifications in sufficient quantities and with acceptable performance or quality on time or deliver when required, then sales, production, delivery, acceptance and revenue from our plants could be adversely affected;

if our relationship with a key supplier is adversely affected, for example, due to competitive pressures (or conflicting interests), we may be unable to obtain naphtha, ethane, propane or propylene, as the case may be, on advantageous financial terms;

if an interruption of supply of naphtha, ethane, propane, refinery off gas or propylene, as the case may be, occurs because a supplier changes its technology roadmap, suffers damage to its manufacturing facilities, decides to no longer provide those products or services, increases the price of those products or services significantly or imposes reduced delivery allocations on its customers, it could take us a considerable period of time to identify and qualify alternative suppliers;

some of our key suppliers are small companies with limited financial and other resources, and as a result, they may be more likely to experience financial and operational difficulties than larger, well-established companies, which increases the risk that they will be unable to deliver products as needed; and

if a key supplier is acquired or has a significant change in business, the production and sales of our systems and services may be delayed or adversely affected, or our development programs may be delayed or may be impossible to complete.

Delays in the availability of naphtha, ethane, propane, refinery off gas or propylene of acceptable quality, or our inability to obtain such acceptable naphtha, ethane, propane or propylene in the quantities we need or at all, may adversely affect our revenue and results of operations.

Our Polyolefins Unit and Vinyls Unit depend on our basic petrochemicals plants to supply them with their ethylene and propylene requirements.

Our Basic Petrochemicals Unit is the only supplier of ethylene to our Vinyls Unit, the only supplier of ethylene to the polyethylene plants and the principal supplier of propylene to the polypropylene plants of our Polyolefins Unit. Because the cost of storing and transporting ethylene is substantial and there is inadequate infrastructure in Brazil to permit the importing of large quantities of ethylene and propylene, our Polyolefins Unit in Brazil and our Vinyls Unit are highly dependent on the supply of these products by our basic petrochemicals plants. Consequently, our production volumes of, and net sales revenue from, polyolefins and vinyls products would decrease, and our overall financial performance would be negatively affected, in the event of the following:

- any significant damage to the facilities of our Basic Petrochemicals Unit through which ethylene or propylene is produced, or to the pipeline or other facilities that connect our polyolefins plants or vinyls plants to our basic petrochemicals plants, whether as a consequence of an accident, natural disaster, fire or otherwise;

- any significant reduction in the supply of naphtha to our Basic Petrochemicals Unit, as naphtha is the principal raw material used by our Basic Petrochemicals Unit in the production of ethylene and propylene; or any significant reduction in the supply of ethane or propane to our basic petrochemical plant in Rio de Janeiro, as ethane and propane are the principal raw materials used in the production of ethylene and propylene.

See also We manufacture products that are subject to risk of fire, explosions and other hazards below.

Any downgrade in the ratings of Brazil, our company or our debt securities would likely result in increased interest and other financial expenses related to our borrowings and debt securities and could reduce our liquidity.

Currently, Standard & Poor s Ratings Group, a division of McGraw Hill, Inc., or Standard & Poor s, and Fitch Ratings Ltd., or Fitch maintain ratings of our company on a global and national basis. Moody s Investors Service, Inc., or Moody s, only maintains ratings of our company on a global basis. On a global basis, we maintain an investment grade rating at: (i) Standard & Poor s of BBB- with negative outlook; (ii) Fitch Ratings of BBB- with stable outlook; and Moody s of Ba1 with stable outlook, the latter being higher than the sovereign rating. On a national basis, we maintain investment grade rating at: (i) Standard & Poor s as of brAAA with negative outlook and (ii) Fitch Ratings of AAA+ with stable outlook. Our credit rating is sensitive to any change in the Brazilian sovereign credit rating. The credit rating of the Brazilian federal government has been downgraded in 2015 and 2016 and is no longer investment grade. Any decision by these agencies to downgrade the ratings of our company or of our debt securities in the future would likely result in increased interest and other financial expenses relating to our borrowings and debt securities and the inclusion of financial covenants in the instruments governing new indebtedness, and could significantly reduce our ability to obtain such financing, on satisfactory terms or in amounts required by us, and our liquidity and would require us to post cash collateral pursuant to our obligations or to contract letters of credit to backstop guarantees provided by us in the context of the Mexican Project.

Some of our shareholders may have the ability to determine the outcome of corporate actions or decisions, which could affect the holders of our class A preferred shares and the ADSs.

Odebrecht S.A., or Odebrecht, directly or through its wholly-owned subsidiary Odebrecht Serviços e Participações S.A., or OSP, owns 38.3% of our outstanding share capital, including 50.1% of our voting share capital and Petrobras holds 36.1% of our outstanding share capital, including 47.0% of our voting share capital. Nominess of Odebrecht constitute a majority of the members of our board of directors. Under a shareholders agreement to which OSP and Petrobras are parties, which we refer to as the Braskem S.A. Shareholders Agreement, we may only undertake certain actions after Odebrecht and Petrobras have reached a consensus with respect to those actions. However, Odebrecht will have the sole power to approve the business plan of our company, through the board of directors, as described under Item 7. Major Shareholders and Related Party Transactions Major Shareholders Shareholders Agreements. As a result, Odebrecht has the ability to determine the outcome of most corporate actions or decisions requiring the approval of our shareholders or our board of directors in certain instances, with the consent of Petrobras which could affect the holders of our class A preferred shares and the American Depositary Shares, or ADSs.

We may face conflicts of interest in transactions with related parties.

We maintain trade accounts receivable and current and long-term payables with some of our affiliates and other related parties, including Petrobras, which is our domestic supplier of naphtha and other raw materials such as propylene, ethane, propane and refinery off gas, and Odebrecht Agroindustrial, which is one of our suppliers of ethanol. These accounts receivable and accounts payable balances result mainly from purchases and sales of goods, which are at prices and on terms equivalent to the average terms and prices of transactions that we enter into with third parties. These and other transactions between us and our affiliates could result in conflicting interests between our company and our shareholders.

We may make significant acquisitions which, if not successfully integrated with our company, may adversely affect our results of operations.

We may make significant acquisitions, which may involve risks, including the following:

- failure to obtain the requisite approval from the applicable antitrust regulators;

- failure of the acquired businesses to achieve expected results;
- possible inability to retain or hire key personnel of the acquired businesses;
- possible inability to achieve expected synergies and/or economies of scale; and
- unanticipated liabilities.

If we are unable to integrate or manage acquired businesses successfully, we may not realize anticipated cost savings, revenue growth and levels of integration, which may result in reduced profitability or operating losses.

We may face unforeseen challenges in the operation of our Mexico Complex which could result in this business unit failing to provide expected benefits to our company.

During the first half of 2016, we concluded the construction phase of an olefins complex, or the Mexico Complex, located in the Mexican state of Veracruz. For more information about this, which we refer to as the Mexico Complex, see Item 5. Operating and Financial Review and Prospects Capital Expenditures Joint Venture Mexico Complex.

Braskem Idesa S.A.P.I., or Braskem Idesa, our joint venture with Grupo Idesa, S.A. de C.V., or Idesa, to develop our Mexico Complex, required significant capital expenditure. Our ability to achieve the strategic objectives of this business unit will depend largely on its successful operation. Factors that could affect the operation of this business unit include:

- macroeconomic conditions in Mexico and demand for polyethylene;
- the occurrence of unforeseen technical and mechanical difficulties that may interrupt production or lead to unexpected downtime of the Mexico Complex s plants, as it is still in the ramp-up phase;
- a stable and continuous supply of ethane in the long term; and
- increased competition from domestic or foreign competitors and/or the emergence of new domestic or foreign competitors.

We cannot assure you that the Mexico Complex will provide the expected benefits to us. Any significant interruption could hinder or prevent the implementation of our business plan as originally conceived, and result in revenues and net income below expected.

Adjustments in tariffs on imports that compete with our products could cause us to lower our prices.

We currently benefit from tariffs imposed by the Brazilian government on imports that allow us to charge prices for our polyolefin and vinyl products in the domestic market that include a factor based on the tariffs levied on comparable imports of those products. However, the Brazilian government has in the past used import and export tariffs to effect economic policies, with the consequence that tariffs can vary. For example, in September 2012, the Brazilian government increased import duties on 100 products related to various industries, including an increase on the import tariff for polyethylene. In October 2012, it increased the import tariff for polyethylene from 14% to 20% and in October 2013, it reduced the import tariff for polyethylene to the previous level of 14%. Adjustments of tariffs could lead to increased competition from imports and cause us to lower our domestic prices, which would likely result in lower net sales revenue and could negatively affect our overall financial performance. Additionally, the products we export to the United States and Europe are subject to tariffs in the amount of 6.5% in each jurisdiction, subject to certain preferences. These tariffs generally favor our products produced locally and any future adjustments to these tariff structures could negatively impact our sales in these jurisdictions. Future trade agreements entered into by Brazil, the United States or the European Union could also lead to increased competition from imports and lower domestic prices.

Table of Contents

Our business is subject to stringent environmental regulations, and the imposition of new regulations could require significant capital expenditures and increase our operating costs.

We, like other petrochemical producers, are subject to stringent federal, state and local environmental laws and regulations concerning human health, the handling and disposal of solid and hazardous wastes and discharges of pollutants into the air and water. Petrochemical producers are sometimes subject to unfavorable market perceptions as a result of the environmental impact of their business, which can have an adverse effect on their results of operations.

Our operations in Brazil are subject to extensive federal, state and local laws, regulations, rules and ordinances relating to pollution, protection of the environment and the generation, storage, handling, transportation, treatment, disposal and remediation of hazardous substances and waste materials. The Brazilian government enacted an Environmental Crimes Law in 1998 that imposes criminal penalties on corporations and individuals causing environmental damage. Corporations found to be polluting can be fined up to R$50.0 million, have their operations suspended, be prohibited from government contracting, be required to repair damage that they cause and lose certain tax benefits and incentives. Executive officers, directors and other individuals may be imprisoned for up to five years for environmental violations.

Our operations in the United States, Germany and Mexico are subject to extensive U.S., German, European and Mexican federal, state and local laws, regulations, rules and ordinances relating to pollution, protection of the environment and the generation, storage, handling, transportation, treatment, disposal and remediation of hazardous substances and waste materials. U.S. environmental laws and regulations may impose liability on us for the conduct of third parties, or for actions that complied with applicable requirements when taken, regardless of negligence or fault. Of particular significance to us are (1) regulatory programs to be established to implement air quality standards under the National Ambient Air Quality Standards for ozone and fine particles promulgated by the U.S. Environmental Protection Agency, or the EPA, and (2) various legislative and regulatory measures in the United States which are under review, discussion or implementation to address greenhouse gas emissions. In Mexico, we adhere to the comprehensive responsibility program promoted by the Mexican National Chemical Industry Association (*Asociación Nacional de la Industria Química de Mexico* ANIQ), which is based on the responsible care standard used in the United States and Canada.

Costs and capital expenditures relating to environmental, health or safety matters are subject to evolving regulatory requirements and will depend on the timing of the promulgation and enforcement of specific standards which impose the requirements. Moreover, changes in environmental regulations could inhibit or interrupt our operations, or require modifications to our facilities. Accordingly, environmental, health or safety regulatory matters may result in significant unanticipated costs or liabilities.

We manufacture products that are subject to the risk of fire, explosions and other hazards.

Our operations are subject to hazards, such as fires, explosions and other accidents, associated with the manufacture of petrochemicals and the storage and transportation of feedstock and petrochemical products. These hazards can cause personal injury and loss of life, severe damage to or destruction of property and equipment and environmental damage. A sufficiently large accident at one of our plants or storage facilities could force us to suspend our operations temporarily and result in significant remediation costs and lost net sales revenue. See also Our Polyolefins Unit and Vinyls Unit depend on our basic petrochemicals plants to supply them with their ethylene and propylene requirements.

Although we maintain insurance coverage for losses due to fire damage and for losses of income resulting from shutdowns due to fire, explosion or electrical damage, those insurance proceeds may not be available on a timely basis and may be insufficient to cover all losses, which could have a material adverse effect on our financial performance.

12

Table of Contents

Unfavorable outcomes in pending or future litigation may reduce our liquidity and negatively affect our financial performance and financial condition.

We are, and in the future may be, involved in numerous tax, civil and labor disputes, among others, involving monetary claims. If unfavorable decisions are rendered in one or more of these lawsuits, we could be required to pay substantial amounts. For some of these lawsuits, we have not established any provision on our balance sheet or have established provisions only for part of the amounts in question, based on our judgments as to the likelihood of winning these lawsuits.

In July 2015, two putative class action lawsuits were filed against us and certain of our then-current and former officers and directors, or the Defendants, in the United States District Court for the Southern District of New York. The lawsuits were subsequently consolidated under the caption In re Braskem, S.A. Securities Litigation, No. 15-cv-5132. In November 2015, Boilermaker-Blacksmith National Pension Trust, or the Lead Plaintiff, filed a consolidated class action complaint, which asserted claims under Section 10(b) and Section 20(a) of the Exchange Act, on behalf of a putative class of purchasers of our American Depositary Receipt, or ADRs, from June 1, 2010 to March 11, 2015. In the operative complaint, the Lead Plaintiff alleges that the Defendants made misrepresentations or omissions that inflated the price of our stock in violation of U.S. securities laws. We filed a motion to dismiss on July 6, 2016. On March 31, 2017, the court ruled on the motion to dismiss, granting it in part and denying it in part. With respect to the remaining claims, the class action is now in the discovery stage. The parties are also currently engaged in settlement negotiations and have signed a proposed settlement agreement and submitted it to the U.S. court for preliminary approval on September 14, 2017. Under the terms of the proposed settlement, we would pay US$10million to resolve all claims of the settlement class consisting of purchasers of our ADRs during the period from July 15, 2010 through March 11, 2015, that arise out of or relate to the subject matter of the class action, with the exception of any such claims belonging to purchasers who file valid and timely requests to opt out of the settlement class. We have made no admission of any wrongdoing or liability as part of the proposed settlement, and it is subject to a number of conditions, including court approval. Furthermore, we may be named as a defendant in other legal actions, and we may be required, in accordance with any applicable legal and regulatory limits, to indemnify directors, officers and employees that are defendants in this securities class action and any other related actions that may arise in the future. This litigation has required and may continue to require significant time and attention in the future. For more information about our legal proceedings, see Item 8. Financial Information Legal Proceedings.

Labor unrest may materially and adversely affect our operations.

Labor unrest in our plants and facilities may have a material adverse effect on our financial condition or results of operations. For example, in August 2010, the unionized employees at our Neal, West Virginia plant went on strike. During the strike, the plant operated under the supervision of management until May 2011, when Braskem America entered into a new collective bargaining agreement. Although we believe that we maintain good relations with our employees, future labor actions, including strikes, could have a material adverse effect on our financial performance.

Natural disasters, severe weather and climate conditions could have a material adverse effect on our overall business.

Some of our facilities are located in places that could be affected by natural disasters, such as floods, earthquakes, hurricanes, tornados and other natural disasters, which could disrupt our operations or the operations of our customers and could damage or destroy infrastructure necessary to transport our products as part of the supply chain. Such events could require maintenance shutdowns, delay shipments of existing inventory or result in costly repairs, replacements or other costs, all of which could have a material adverse effect on our financial performance.

While our energy risk policy dictates that we purchase energy in advance at fixed prices through long-term contracts, the majority of Brazilian power generation capacity is provided by hydroelectric generation facilities. If the amount of water available to energy producers becomes scarce due to drought or diversion for other uses, the cost of energy may increase. Such conditions could have a material adverse effect on our sales and margins.

We could be materially adversely affected by the impacts of the Global Settlement.

Table of Contents

In the context of allegations of improper payments in connection with the so-called Operation Car Wash in Brazil, we engaged the Expert Firms to conduct the Investigation and report their findings. We have cooperated with governmental authorities in several jurisdictions, including the U.S. Department of Justice, or the DoJ, the U.S. Securities and Exchange Commission, or the SEC, Brazil s Federal Prosecutor s Office (*Ministério Público Federal*), or the MPF, and Switzerland s Office of the Attorney General, or the OAG. On December 14, 2016, we entered into a leniency agreement with the MPF, or the Leniency Agreement, which was ratified by the competent Brazilian court on June 6, 2017. On December, 21, 2016, we filed a plea agreement in the United States District Court for the Eastern District of New York under which we agreed to plead guilty to a one-count criminal information charging our company with conspiracy to violate the anti-bribery provisions of the U.S. Foreign Corrupt Practices Act, or the FCPA. On the same date, we consented to the entry of a final judgment in a civil action brought by the SEC based on civil violations of the anti-bribery, books and records and internal accounting controls provisions of the FCPA. The competent federal courts in the United States approved the DoJ and SEC resolutions on January 26, 2017 and February 28, 2017, respectively. In addition, on December 21, 2016, the OAG closed its investigation of these matters. We refer to these actions as the Global Settlement.

Under the Global Settlement, we agreed to pay to the governmental authorities in these jurisdictions an aggregate amount of approximately US$957 million (equivalent to approximately R$3.1 billion).

Of the total amount payable pursuant to the Global Settlement, we have already paid approximately R$1.3 billion, as follows:

- US$94.9 million (R$296.6 million) to the DoJ on February 8, 2017;
- US$65.0 million (R$206.5 million) to the SEC on April 27, 2017;
- CHF30.2 million (R$104.3 million) to the OAG on June 27, 2017; and
- R$736.4 million to the MPF on July 6, 2017.

The aggregate amount of approximately R$1.8 billion outstanding pursuant to the Global Settlement will be paid in the following manner:

- CHF64.3 million to the OAG in four equal annual and successive installments of CHF16.1 million due on June 30 of each year commencing in 2018; and
- approximately R$1.6 billion to the MPF in six equal annual installments, adjusted for inflation by the variation in the Broad Consumer Price Index (*Índice Nacional de Preços ao Consumidor Ampliado*), or IPCA, due on January 30 of each year commencing in 2018. As guarantee for payment of the outstanding installments, Braskem has provided fixed assets in an amount corresponding to one annual installment.

The Global Settlement may have a material adverse effect on our business, reputation, financial condition, financial instruments and operational results, as well as on the liquidity and price of our securities, including our class A preferred shares and ADSs. Furthermore, the negative publicity resulting from the Global Settlement, the facts made public through our plea agreement in the United States, and the facts that will be made public when the Leniency Agreement with the MPF is ultimately disclosed, could have a material adverse impact on our business, including reducing the demand for our products**,** our financial instruments and other effects that currently cannot be estimated or measured. In addition, other authorities with jurisdiction over our company may seek to impose additional monetary sanctions or fines or commence new investigations against us. Finally, as a result of the Global Settlement, we may be barred from entering into certain agreements with governmental authorities, and may be subject to increased operating costs in connection with our obligations to improve our governance and anti-corruption practices, including the cost of required external monitorship.

Under the terms of the Global Settlement, we are required to cooperate with these governmental authorities and improve our governance and anti-corruption compliance practices. We will also be subject to external monitorship for a period of three years, during which time the monitor will assess compliance with the Global Settlement, including the effectiveness of our internal controls, policies and procedures to reduce the risk of any anti-corruption violations. The monitorship period may be terminated early or extended for up to one year at the authorities discretion depending on our compliance with the Global Settlement. We have retained monitors pursuant to the provisions of the Global Settlement, and they have been approved by the relevant authorities. The monitors may recommend changes to our policies and procedures, which we must adopt unless they are unduly burdensome or otherwise inadvisable, in which case we may propose alternatives that the authorities may choose to accept. Operating under the oversight of the monitors will likely require the assumption of additional responsibilities by members of our management. We currently cannot estimate the costs that we are likely to incur in connection with compliance with the Global Settlement, including the implementation of the recommended changes, if any, to our policies and procedures as required by the monitors. However, the costs of the monitorship could be significant and could negatively impact our company by requiring the efforts of our management team, diverting attention from our ordinary business operations.

Compliance and Control Risks

We could be materially affected by violations of the U.S. Foreign Corrupt Practices Act, the Brazilian Anti-Corruption Law and similar anti-corruption laws.

We, our subsidiaries and our joint venture partners are subject to a number of anti-corruption laws, including Law No. 12,846/2013, or the Brazilian Anti-Corruption Law, which became effective on January 28, 2014, the U.S. Foreign Corrupt Practices Act, or the FCPA, and various other anti-corruption and anti-bribery laws of other jurisdictions.

The FCPA, the Brazilian Anti-Corruption Law and similar anti-bribery laws in other jurisdictions generally prohibit companies and their intermediaries from making improper payments to government officials or other persons for the purpose of obtaining or retaining business. Violations of these laws may result in criminal or civil sanctions, inability to do business with existing or future business partners, injunctions against future conduct, profit disgorgements, disqualifications from directly or indirectly engaging in certain types of businesses, the loss of business permits or other restrictions which could have a material adverse effect on our business, financial condition, results of operations or liquidity.

We are exposed to behaviors of our employees and non-employees that may be incompatible with our ethics and compliance standards, and failure to timely prevent, detect or remedy any such behavior and/or process vulnerabilities may have a material adverse effect on our results of operations and financial condition.

Our business, including our relationships with third parties, is guided by ethical principles. We have adopted a Policy on Compliance in Acting Ethically with Integrity and Transparency, and several internal policies designed to guide our management, employees and counterparties and reinforce our principles and rules for ethical behavior and professional conduct. We maintain an independent whistleblower channel (denominated Ethics Line) managed by a third party available for employees and non-employees (including third parties). Every whistleblower complaint is investigated and submitted for evaluation by our Ethics Committee.

We are subject to the risk that our employees, counterparties or any person doing business with us may engage in fraudulent activity, corruption or bribery, circumvent or override our internal controls and procedures or misappropriate or manipulate our assets for their personal or business advantage. In the event that we believe or have reason to believe that our employees or agents have or may have violated applicable anti-corruption laws, including the FCPA, we may be required to investigate or have outside counsel investigate the relevant facts and circumstances, which can be expensive and require significant time and attention from senior management. We have in place a robust Compliance and Anti-Corruption Program being implemented through every area of our company, including several processes for identifying, monitoring and mitigating these risks, but such program may not be completely effective.

As a result of the Investigation, we determined that material weaknesses in our internal control over financial reporting as of December 31, 2016 existed. We identified material weaknesses related to (i) our control environment and anti-corruption compliance controls and programs designed to prevent and detect violations of the FCPA and other applicable anti-corruption laws, (ii) the review and approval of reconciliation and manual payments, and (iii) the review of the ledger accounts used to record accruals and payments of commissions. These material weaknesses were identified primarily because a number of deficiencies in controls and errors were detected during the Investigation.

Table of Contents

We subsequently identified an additional material weakness related to (iv) the review and monitoring over in-transit inventory for naphtha imports processed by our subsidiary, Braskem Netherlands. This material weakness was identified during the financial statement audit performed for Braskem Netherlands. And we additionally identified a material weakness related to (v) classification between long and short-term debt obligations in Braskem s subsidiary, Braskem Idesa.

A material weakness is defined as a deficiency, or combination of deficiencies, in internal control over financial reporting, such that there is a reasonable possibility that a material misstatement of our annual or interim consolidated financial statements will not be prevented or detected on a timely basis.

We are currently implementing several remediation efforts to improve our governance and compliance systems. See Item 4. Information on the Company Compliance. However, such improvements may not be completely effective, and certain of our employees and non-employees may behave in a manner that is incompatible with our ethics and compliance standards. In addition, we may make accounting errors in our future financial reporting, and we cannot be certain that in the future additional material weaknesses in our internal control over financial reporting will not exist. Any failure real or perceived to follow our compliance principles or to comply with applicable governance or regulatory obligations could harm our reputation and image, limit our ability to obtain financing and otherwise have a material adverse effect on our results of operations and financial condition.

If we are unable to comply with the restrictions and covenants in the agreements governing our indebtedness, there could be a default under the terms of these agreements, which could result in an acceleration of payment of funds that we have borrowed and could affect our ability to make principal and interest payments on our debt obligations.

Any default under the agreements governing our indebtedness that is not cured or waived by the required lenders could result in the holders of any such indebtedness accelerating the payment of amounts outstanding, which could make us unable to pay principal and interest on those and other debt obligations. If we are unable to generate sufficient cash flow and are otherwise unable to obtain funds necessary to meet required payments of principal and interest on our indebtedness, or if we otherwise fail to comply with the various covenants in the agreements governing our indebtedness (including covenants in the project finance debt related to our Mexico Complex), we could be in default under the terms of such agreements. In the event of such default:

- the holders of such indebtedness could elect to declare all the funds borrowed thereunder to be due and payable, together with accrued and unpaid interest;

- the lenders under such agreements could elect to terminate their commitments thereunder and cease making further loans; and

- we could be forced into bankruptcy or liquidation.

Although our Mexico Complex is fully operational and Braskem Idesa has satisfied and continues to satisfy its debt service requirements and all other payment obligations under its US$3,194 million senior secured Syndicated Facility on a timely basis, certain defaults have occurred and are continuing thereunder. These defaults give the creditors thereunder the right to vote to accelerate their debt under this facility and exercise their remedies in respect of the collateral for the facility, including the Mexico Complex and the outstanding shares of Braskem Idesa. Braskem Idesa has submitted requests for waiver of these defaults to and is currently negotiating such waiver with the intercreditor agent for this facility. However, there can be no assurance that the intercreditor agent and the lenders will agree to extend such waiver, or if they agree to extend such waiver, whether the waiver will include additional obligations with which Braskem Idesa would be required to comply.

We may in the future need to obtain waivers under our other indebtedness to avoid being in default. If we breach any covenants under any of our debt instruments and seek a waiver, we may not be able to obtain a waiver from the required lenders. If this occurs, we would be in default under such agreements, the lenders could exercise their rights or remedies, as described above, and we could be forced into bankruptcy or liquidation.

Table of Contents

Risks Relating to Brazil

Brazilian political and economic conditions, and the Brazilian government s economic and other policies, may negatively affect demand for our products as well as our net sales revenue and overall financial performance.

The Brazilian economy has been characterized by frequent and occasionally extensive intervention by the Brazilian government and unstable economic cycles. The Brazilian government has often changed monetary, taxation, credit, tariff and other policies to influence the course of Brazil s economy. The Brazilian government s actions to control inflation and implement other policies have at times involved wage and price controls, blocking access to bank accounts, imposing capital controls and limiting imports into Brazil.

Our results of operations and financial condition may be adversely affected by factors such as:

- fluctuations in exchange rates;
- exchange control policies;
- interest rates;
- inflation;
- tax policies;
- expansion or contraction of the Brazilian economy, as measured by rates of growth in GDP;
- liquidity of domestic capital and lending markets; and
- other political, diplomatic, social and economic developments in or affecting Brazil.

Brazilian markets have been experiencing heightened volatility due to the uncertainties derived from the ongoing Car Wash investigation, which is being conducted by the Federal Prosecutor s Office, and its impact on the Brazilian economy and political environment. Certain members of the Brazilian government and of the legislative branch, as well as former senior officers of the state-owned oil company and our shareholder Petrobras have faced allegations of political corruption. These government officials and former senior officers allegedly accepted bribes by means of kickbacks on contracts granted by Petrobras to several infrastructure, oil and gas and construction companies, including our controlling shareholder Odebrecht S.A. We cannot currently predict how the Car Wash investigation and any future decisions and actions by authorities in relation to our shareholders, may impact our company. The profits of these kickbacks allegedly financed the political campaigns of political parties of the current federal, state and city governments that were unaccounted for or not publicly disclosed, as well as served to personally enrich the recipients of the bribery scheme. As a result of the ongoing Car Wash investigation, a number of senior politicians, including congressman and officers of the major state-owned companies in Brazil resigned or have been arrested. Senior elected officials and other public officials in Brazil are being investigated for allegations of unethical and illegal conduct identified during the Car Wash investigation.

The potential outcome of these investigations is uncertain, but they have adversely affected and we expect that they will continue to adversely affect the Brazilian markets and trading prices of securities issued by Brazilian issuers. We cannot predict whether the allegations will lead to further political and economic instability or whether new allegations against government officials or other companies in Brazil will arise in the future. In addition, we can neither predict the outcome of any such allegations nor their effect on the Brazilian economy. The development of those unethical conduct cases could have a material adverse effect.

In addition, the Brazilian economy continues to be subject to the effects of the outcome of Operation Car Wash. In May 12, 2016, the Brazilian Senate voted to begin its review of the impeachment proceedings against President Dilma Rousseff, who was suspended from office. After the legal and administrative process for the impeachment, Brazil s Senate removed President Dilma Rousseff from office on August 31, 2016 for infringing budgetary laws. Michel Temer, the former vice president, who has run Brazil since Ms. Rousseff s suspension in May 2016, was sworn in by the Senate to serve out the remainder of the presidential term until 2018. However, in May 2017, President Michel Temer was accused of alleged political corruption in connection with the ongoing Operation Car Wash. The resolution of the political and economic crisis in Brazil depends on the outcome of Operation Car Wash, including current investigations into President Michel Temer s alleged involvement, and approval of reforms that are expected to be promoted in due course. The President of Brazil has power to determine governmental policies and actions that relate to the Brazilian economy and, consequently, affect the operations and financial performance of businesses, including us. The impeachment proceedings against President Dilma Rousseff have adversely affected, and we expect that they, together with the potential for future impeachment proceedings against President Michel Temer, will continue to adversely affect the Brazilian markets and trading prices of securities issued by Brazilian issuers, including us. We cannot predict the effects of the recent and potential future impeachment proceedings and the current ongoing political uncertainties on the Brazilian economy.

Changes in industrial policy and related actions undertaken by the Brazilian government may negatively affect demand for our products as well as our net sales revenue and overall financial performance.

We currently benefit from certain industrial policies and related actions undertaken by the Brazilian government intended to strengthen the domestic economy and certain local industries. Some of these policies and actions have recently included reductions in payroll taxes for plastic manufacturers, a program to improve the competitiveness of Brazilian producers in the export markets by refunding the federal taxes levied on their export sale, intervention of the federal government to reduce incentives to imports at local ports, increases in import duties on certain products, including polyethylene, and the reduction in the rates of Social Integration Program (*Programa de Integração Social*), or PIS, a federal value-added tax, and Contribution for Social Security Financing (*Contribuição para Financiamento da Seguridade Social*), or COFINS, taxes on feedstock purchases by first- and second-generation petrochemical producers.

These taxes on feedstock purchase were set at a rate of 5.6% for naphtha and 9.25% for other feedstocks prior to June 2013, were lowered to 1% in 2015, increased to 3% in 2016 and 5% in 2017 and will be increased to 5.6% in 2018. We cannot predict or control which policies will be renewed or discontinued and whether future changes to Brazilian industrial policy will be proposed and enacted in the future. If industrial policies that benefit us expire, or policies detrimental to us are implemented, our business, results of operations and financial condition may be adversely affected.

Fluctuations in the real*/U.S. dollar exchange rate could increase inflation in Brazil, raise the cost of servicing our foreign currency-denominated debt and negatively affect our overall financial performance.*

The exchange rate between the *real* and the U.S. dollar and the relative rates of depreciation and appreciation of the *real* have affected our results of operations and may continue to do so.

The Brazilian currency has been devalued on several occasions. Throughout the last several decades, the Brazilian government has implemented various economic plans and various exchange rate policies, including sudden devaluations, periodic mini-devaluations (during which the frequency of adjustments has ranged from daily to monthly), exchange controls, dual exchange rate markets and a floating exchange rate system. From time to time, there have been significant fluctuations in the exchange rate between the Brazilian currency and the U.S. dollar and other currencies. The *real* depreciated by 8.9% against the U.S. dollar during 2012, by 14.6% during 2013, by 13.4% during 2014, by 47.0% during 2015 and appreciated by 16.5% during 2016.

Depreciation of the *real* relative to the U.S. dollar also could result in inflationary pressures in Brazil by generally increasing the price of imported products and services. On the other hand, the appreciation of the *real* against the U.S.

dollar may lead to a deterioration of the country s current account and the balance of payments and may dampen export-driven growth.

We had total foreign currency-denominated debt obligations, all of which were denominated in U.S. dollars, in an aggregate amount of R$18,176.3 million (US$5,577.1 million) as of December 31, 2016, representing 77.9% of our consolidated indebtedness, net of transaction costs. This indebtedness does not include (i) an aggregate amount of R$852.6 million (US$261.6 million) outstanding as of December 31, 2016 in connection with derivatives transactions [(including interest rate swaps, exchange rate swaps and currecny options) and (ii) an aggregate amount of R$10,437.8 million (US$3,202.7 million) outstanding as of December 31, 2016 in connection with the Braskem Idesa Financing (as defined elsewhere in this annual report), which includes an aggregate amount of R$302.6 million (US$92.8 million) outstanding as of December 31, 2016, related to a guarantee by Braskem S.A. of the Braskem Idesa Working Capital Facility (as defined elsewhere in this annual report). For more information regarding this facility, see Item 5. Operating and Financial Review and Prospects Indebtedness and Financing Strategy Short-Term Indebtedness. As of December 31, 2016, we had R$3,407.8 million (US$1,045.6 million) in foreign currency-denominated cash and cash equivalents, not including the aggregate amount of R$201.6 million (US$61.9 million) of Braskem Idesa s cash and cash equivalents.

A significant depreciation of the *real* in relation to the U.S. dollar or other currencies could increase our financial expenses as a result of foreign exchange losses that we must record and could reduce our ability to meet debt service requirements of our foreign currency-denominated obligations. To enable us to more efficiently manage the effects of exchange rate fluctuations on our results, in 2013 we decided to designate part of our U.S. dollar-denominated liabilities as a hedge for our future exports.

The prices of naphtha, our most important raw material, and of some of our other raw materials, are denominated in or linked to the U.S. dollar. Naphtha accounted, directly and indirectly, for 42.7% of our consolidated cost of sales and services rendered in 2016. When the *real* depreciates against the U.S. dollar, the cost in *reais* of our U.S. dollar-denominated and U.S. dollar-linked raw materials increases, and our operating income in *reais* may decrease to the extent that we are unable to pass on these cost increases to our customers.

The Brazilian government s actions to combat inflation may contribute significantly to economic uncertainty in Brazil and reduce demand for our products.

Historically, Brazil has experienced high rates of inflation. Inflation, as well as government efforts to combat inflation, had significant negative effects on the Brazilian economy, particularly prior to 1995. The inflation rate, as measured by the General Price Index Internal Availability (*Índice Geral de Preços Disponibilidade Interna*), or the IGP-DI, reached 2,708% in 1993. Although inflation rates have been substantially lower since 1995 than in previous periods, inflationary pressures persist. Inflation rates, as measured by the IGP-DI, were 8.1% in 2012, 5.5% in 2013, 3.8% in 2014, 10.7% in 2015 and 7.2% in 2016. The Brazilian government s measures to control inflation have often included maintaining a tight monetary policy with high interest rates, thereby restricting availability of credit and reducing economic growth. Inflation, actions to combat inflation and public speculation about possible additional actions also may contribute to economic uncertainty in Brazil and to heightened volatility in the Brazilian securities markets.

Brazil may experience high levels of inflation. Increasing prices for petroleum, the depreciation of the *real* and future governmental measures seeking to maintain the value of the *real* in relation to the U.S. dollar may trigger increases in inflation in Brazil. Periods of higher inflation may slow the rate of growth of the Brazilian economy, which would lead to reduced demand for our products in Brazil and decreased net sales revenue. Inflation is also likely to increase some of our costs and expenses, which we may not be able to pass on to our customers and, as a result, may reduce our profit margins and net income. In addition, high inflation generally leads to higher domestic interest rates, and, as a result, the costs of servicing our *real*-denominated debt may increase, causing our net income to be reduced. Inflation and its effect on domestic interest rates can, in addition, lead to reduced liquidity in the domestic capital and lending markets, which could adversely affect our ability to refinance our indebtedness in those markets. Any decline in our net sales revenue or net income and any deterioration in our financial condition would also likely lead to a decline in the market price of our securities, including class A preferred shares and the ADSs.

Fluctuations in interest rates could raise the cost of servicing our debt and negatively affect our overall financial performance.

Our financial expenses are affected by changes in the interest rates that apply to our floating rate debt. As of December 31, 2016, we had, among other debt obligations, R$1,525.2 million of loans and financing that were subject to the Long-Term Interest Rate (*Taxa de Juros de Longo Prazo*), or TJLP; R$1,736.6 million of loans and financing that were subject to the Interbank Deposit Certificate (*Certificado de Depósito Interbancário*), or CDI, rate; R$602.6million of loans and financing that were subject to the Special System for Settlement and Custody (*Sistema Especial de Liquidação e Custódia*), or SELIC; and R$2,571.7 million of loans and financing that were subject to the London Interbank Offered Rate, or LIBOR.

The TJLP includes an inflation factor and is determined quarterly by the Central Bank. In particular, the TJLP, the CDI and the SELIC rate have fluctuated significantly in the past in response to the expansion or contraction of the Brazilian economy, inflation, Brazilian government policies and other factors. See Item 11. Quantitative and Qualitative Disclosures about Market Risk. A significant increase in any of these interest rates could adversely affect our financial expenses and negatively affect our overall financial performance.

Brazilian government exchange control policies could increase the cost of servicing our foreign currency-denominated debt, adversely affect our ability to make payments under our foreign currency-denominated debt obligations and impair our liquidity.

The purchase and sale of foreign currency in Brazil is subject to governmental control. Many factors could cause the Brazilian government to institute more restrictive exchange control policies, including the extent of Brazil s foreign currency reserves, the availability of sufficient foreign exchange on the date a payment is due, the size of Brazil s debt service burden relative to the economy as a whole, Brazil s policy towards the International Monetary Fund and political constraints to which Brazil may be subject. A more restrictive policy could increase the cost of servicing, and thereby reduce our ability to pay, our foreign currency-denominated debt obligations and other liabilities.

Our foreign-currency debt denominated in U.S. dollars represented an aggregate of 77.9% of our indebtedness on a consolidated basis as of December 31, 2016, including transaction costs. This indebtedness does not include (i) the aggregate amount of R$852.6million (US$261.6 million) outstanding as of December 31, 2016 in connection with derivatives; and (ii) the aggregate amount of R$10,437.8 million (US$3,202.7 million) outstanding as of December 31, 2016 in connection with the Braskem Idesa Financing, which includes the aggregate amount of R$302.6 million (US$92.8 million) outstanding as of December 31, 2016 related to the Braskem Working Capital Facility, for which Braskem S.A. is guarantor. For more information regarding this facility, see Indebtedness and Financing Strategy Short-Term Indebtedness. If we fail to make payments under any of these obligations, we will be in default under those obligations, which could reduce our liquidity as well as the market price of our securities, including class A preferred shares and the ADSs.

Changes in tax laws may result in increases in certain direct and indirect taxes, which could reduce our gross margin and negatively affect our overall financial performance.

The Brazilian government implements from time to time changes to tax regimes that may increase our and our customers tax burdens. These changes include modifications in the rate of assessments and, on occasion, enactment of temporary taxes, the proceeds of which are earmarked for designated governmental purposes. We cannot predict the changes to Brazilian tax law that may be proposed and enacted in the future. However, future changes in Brazilian tax law may result in increases in our overall tax burden, which could reduce our gross margin and negatively affect our overall financial performance.

Risks Relating to Mexico

Political conditions in Mexico could materially and adversely affect Mexican economic policy and, in turn, our operations.

Political events in Mexico may significantly affect Mexican economic policy and, consequently, our operations. On December 1, 2012, Mr. Enrique Peña Nieto, a member of the Revolutionary Institutional Party (*Partido Revolucionario Institucional*, or PRI), formally assumed office for a six-year term as the President of Mexico. As of the date of this annual report, no single political party has a majority in either chamber of the Mexican Congress. The absence of a clear majority and the lack of alignment between the legislature and the administration could result in deadlock and prevent the timely implementation of political and economic reforms, which in turn could have an adverse effect on Mexican economic policy. We cannot assure you that the current political situation or future developments in Mexico, over which we have no control, will not have an adverse effect on our business, financial condition or results of operations. Further, we cannot assure you that any new government policies will not adversely affect our business, financial condition or results of operations.

Political and economic conditions and government policies in Mexico and elsewhere may have a material impact on our operations.

A deterioration in Mexico s economic condition, social instability, political unrest or other adverse social developments in Mexico could adversely affect our business and financial condition. These events could also lead to increased volatility in the financial markets, thereby affecting our ability to maintain financial liquidity and service our debt. Additionally, the Mexican government recently cut spending in response to a downward trend in international crude oil prices, and it may cut spending in the future. These cuts could adversely affect the Mexican economy and, consequently, our business, financial condition, operating results and prospects.

In the past, Mexico has experienced several periods of slow or negative economic growth, high inflation, high interest rates, currency devaluation and other economic problems. These problems may worsen or reemerge, as applicable, in the future and could adversely affect our business and ability to service our debt. A worsening of international financial or economic conditions, such as a slowdown in growth or recessionary conditions in Mexico s trading partners, including the United States, or the emergence of a new financial crisis, could have adverse effects on the Mexican economy, our financial condition and our ability to service our debt.

Furthermore, our long-term supply agreement to purchase ethane from Pemex TRI, a state-owned Mexican company, could be terminated or jeopardized by them as a result of expropriation measures or change in laws regulations by the Mexican government. Any termination or interruption of this supply agreement could have a material adverse effect on our results of operations or financial condition.

Developments in other countries could adversely affect the Mexican economy, our financial performance and the price of our shares.

The Mexican economy and the market value of Mexican companies may be, to varying degrees, affected by economic and market conditions globally, in other emerging market countries and major trading partners, in particular the United States. In recent years, economic conditions in Mexico have become increasingly correlated with economic conditions in the United States as a result of the North American Free Trade Agreement, or NAFTA, increased economic activity between the two countries, and the remittance of funds from Mexican immigrants working in the United States to Mexican residents. Therefore, adverse economic conditions in the United States, the termination of, or modifications to, NAFTA or other related events could have a significant adverse effect on the Mexican economy. We cannot assure you that events in other emerging market countries, in the United States or elsewhere will not adversely affect our financial performance.

Mexico has experienced a period of increasing criminal activity, which could affect our operations.

In recent years, Mexico has experienced a period of increasing criminal activity, primarily due to the activities of drug cartels and related criminal organizations. In addition, the development of the illicit market in fuels in Mexico has led to increases in theft and illegal trade in the fuels that Pemex TRI, our principal supplier in Mexico, produces. In response, the Mexican government has implemented various security measures and strengthened its military and police forces aimed at decreasing incidents of theft and other criminal activity directed at petrochemical facilities and petrochemical products. Despite these efforts, criminal activity continues to exist in Mexico, some of which may target our facilities and products, including thefts of our products while transported by truck or rail, or those of Pemex TRI and other suppliers. These activities, their possible escalation and the violence associated with them may have a negative impact on our financial condition and results of operations.

21

Risks Relating to Our Equity and Debt Securities

Holders of our class A preferred shares or the ADSs may not receive any dividends or interest on shareholders equity.

According to our by-laws and Brazilian corporate law, we must generally pay our shareholders at least 25% of our annual net income as dividends or interest on shareholders equity, as calculated and adjusted under Brazilian GAAP (which, for this purpose, is identical to IFRS). This adjusted net income may be capitalized, used to absorb losses or otherwise retained as allowed under Brazilian GAAP and may not be available to be paid as dividends or interest on shareholders equity. The Brazilian Corporation Law allows a publicly traded company like ours to suspend the mandatory distribution of dividends in any particular year if our board of directors informs our shareholders that such distributions would be inadvisable in view of our financial condition or cash availability. Holders of our class A preferred shares or the ADSs may not receive any dividends or interest on shareholders equity in any given year if our board of directors makes such a determination or if our operations fail to generate net income.

Our class A preferred shares and the ADSs have limited voting rights and are not entitled to vote to approve corporate transactions, including mergers or consolidations of our company with other companies, or the declaration of dividends.

Under the Brazilian Corporation Law and our by-laws, holders of our class A preferred shares and, consequently, the ADSs are not entitled to vote at meetings of our shareholders, except in very limited circumstances. These limited circumstances directly relate to key rights of the holders of class A preferred shares, such as modifying basic terms of our class A preferred shares or creating a new class of preferred shares with superior rights. Holders of preferred shares without voting rights are entitled to elect one member and his or her respective alternate to our board of directors and our fiscal council, depending on specific circumstances provided in the Brazilian Corporation Law. Holders of our class A preferred shares and the ADSs are not entitled to vote to approve corporate transactions, including mergers or consolidations of our company with other companies, or the declaration of dividends. However, if we do not pay dividends for three consecutive years, holders of our class A preferred shares and the ADSs will be granted voting rights. See Item 10. Additional Information Description of Our Company s By-laws Voting Rights.

Holders of the ADSs may find it difficult to exercise even their limited voting rights at our shareholders meetings.

Under Brazilian law, only shareholders registered as such in our corporate books may attend our shareholders meetings. All class A preferred shares underlying the ADSs are registered in the name of the depositary. ADS holders may exercise the limited voting rights with respect to our class A preferred shares represented by the ADSs only in accordance with the deposit agreement relating to the ADSs, which provides that voting rights are only available to ADS holders at our discretion. There are practical limitations upon the ability of ADS holders to exercise their voting rights due to the additional steps involved in communicating with ADS holders. For example, we are required to publish a notice of our shareholders meetings in certain newspapers in Brazil. To the extent that holders of our class A preferred shares are entitled to vote at a shareholders meeting, they will be able to exercise their voting rights by attending the meeting in person or voting by proxy. By contrast, holders of the ADSs will receive notice of a shareholders meeting by mail from the depositary following our notice to the ADR depository requesting the ADR depository to do so. To exercise their voting rights, ADS holders must instruct the depositary on a timely basis. This noticed voting process will take longer for ADS holders than for holders of class A preferred shares. If it fails to receive timely voting instructions for all or part of the ADSs, the depositary will assume that the holders of those ADSs are instructing it to give a discretionary proxy to a person designated by us to vote their ADSs, except in limited circumstances.

In the limited circumstances in which holders of the ADSs have voting rights, they may not receive the voting materials in time to instruct the depositary to vote the class A preferred shares underlying their ADSs. In addition, the depositary and its agents are not responsible for failing to carry out the voting instructions of the holders of the ADSs or for the manner of carrying out those voting instructions. Accordingly, holders of the ADSs may not be able to exercise their voting rights, and they will have no recourse if the class A preferred shares underlying their ADSs are not voted as requested.

Table of Contents

If holders of the ADSs exchange them for class A preferred shares, they may risk temporarily losing, or being limited in, the ability to remit foreign currency abroad and certain Brazilian tax advantages.

The Brazilian custodian for the preferred shares underlying the ADSs must obtain an electronic registration number with the Central Bank to allow the depositary to remit U.S. dollars abroad. ADS holders benefit from the electronic certificate of foreign capital registration from the Central Bank obtained by the custodian for the depositary, which permits it to convert dividends and other distributions with respect to the class A preferred shares into U.S. dollars and remit the proceeds of such conversion abroad. If holders of the ADSs decide to exchange them for the underlying preferred shares, they will only be entitled to rely on the custodian s certificate of registration with the Central Bank for five business days after the date of the exchange. Thereafter, they will be unable to remit U.S. dollars abroad unless they obtain a new electronic certificate of foreign capital registration in connection with the preferred shares, which may result in expenses and may cause delays in receiving distributions. See Item 10. Additional Information Exchange Controls.

Also, if holders of the ADSs that exchange the ADSs for our Class A preferred shares do not qualify under the foreign investment regulations, they will generally be subject to less favorable tax treatment of dividends and distribution on, and the proceeds from any sale of, our preferred shares. See Item 10. Additional information Exchange Controls and Item 10. Additional Information Taxation Brazilian Tax Considerations.

Restrictions on the movement of capital out of Brazil may impair the ability of holders of our shares, ADSs and debt securities to receive payments on their respective obligations or guarantees and may restrict our ability to make payments in U.S. dollars.

In the past, the Brazilian economy has experienced balance of payment deficits and shortages in foreign exchange reserves, and the government has responded by restricting the ability of Brazilian or foreign persons or entities to convert *reais* into foreign currencies. The government may institute a restrictive exchange control policy in the future. Any restrictive exchange control policy could prevent or restrict our access to U.S. dollars, and consequently our ability to meet our U.S. dollar obligations under our shares, ADSs and the guarantees we granted pursuant to our outstanding senior notes, and could also have a material adverse effect on our business, financial condition and results of operations. We cannot predict the impact of any such measures on the Brazilian economy.

The foreign exchange policy of Brazil may affect the ability of Braskem to make money remittances outside Brazil in respect of our equity securities or debt securities.

Under current Brazilian regulations, Brazilian companies are not required to obtain authorization from the Central Bank in order to make payments under guarantees in favor of foreign persons, such as the holders of our shares, ADSs or the outstanding senior notes. We cannot assure you that these regulations will continue to be in force in the event that Braskem is required to perform its payment obligations under its shares, ADSs or the guarantees under our outstanding senior notes. If these regulations or their interpretation are modified and an authorization from the Central Bank is required, Braskem would need to seek an authorization from the Central Bank to transfer the amounts under such obligations out of Brazil or, alternatively, make such payments with funds held by Braskem outside Brazil. We cannot assure you that such an authorization will be obtained or that such funds will be available. If such authorization is not obtained, we may be unable to make payments to holders of our shares, ADSs and/or the applicable senior notes in U.S. dollars. If we are unable to obtain the required approvals, if needed for the payment of amounts owed by Braskem through remittances from Brazil, we may have to seek other lawful mechanisms to effect payment of amounts due under the shares, ADSs or the senior notes. However, we cannot assure you that other remittance mechanisms will be available in the future, and even if they are available in the future, we cannot assure you that payment on the outstanding senior notes would be possible through such mechanism.

Holders of the ADSs may face difficulties in protecting their interests because we are subject to different corporate rules and regulations as a Brazilian company and our shareholders may have fewer and less well-defined rights.

Holders of the ADSs are not direct shareholders of our company and are unable to enforce the rights of shareholders under our by-laws and the Brazilian Corporation Law.

Our corporate affairs are governed by our by-laws and the Brazilian Corporation Law, which differ from the legal principles that would apply if we were incorporated in a jurisdiction in the United States, such as the State of Delaware or New York, or elsewhere outside Brazil. Even if a holder of ADSs surrenders its ADSs and becomes a direct shareholder, its rights as a holder of the class A preferred shares underlying the ADSs under the Brazilian Corporation Law to protect its interests relative to actions by our board of directors may be fewer and less well-defined than under the laws of those other jurisdictions.

Although insider trading and price manipulation are crimes under Brazilian law and are the subject of continuously evolving regulations promulgated by the CVM, the Brazilian securities markets are not as highly regulated and supervised as the U.S. securities markets or the markets in some other jurisdictions. In addition, rules and policies against self-dealing or for preserving shareholder interests may be less well-defined and enforced in Brazil than in the United States and certain other countries, which may put holders of our class A preferred shares and the ADSs at a potential disadvantage. Corporate disclosures also may be less complete or informative than for a public company in the United States or in certain other countries.

Holders of the ADSs may face difficulties in serving process on or enforcing judgments against us and other persons.

We are a corporation (*sociedade por ações*) organized under the laws of Brazil, and all of our directors and executive officers and our independent public accountants reside or are based in Brazil. Most of our assets and those of these other persons are located in Brazil. As a result, it may not be possible for holders of the ADSs to effect service of process upon us or these other persons within the United States or other jurisdictions outside Brazil or to enforce against us or these other persons judgments obtained in the United States or other jurisdictions outside Brazil. In addition, because a substantial portion of our assets and all of our directors and officers reside outside the United States, any judgment obtained in the United States against us or any of our directors or officers may not be collectible within the United States. Because judgments of U.S. courts for civil liabilities based upon the U.S. federal securities laws may only be enforced in Brazil if certain conditions are met, holders may face greater difficulties in protecting their interests in the case of actions by us or our directors or executive officers than would shareholders of a U.S. corporation.

Judgments of Brazilian courts enforcing Braskem s obligations under our equity securities or the guarantees would be payable only in reais.

If proceedings are brought in the courts of Brazil seeking to enforce our obligations under our shares, ADSs, the guarantees under our outstanding senior notes or our other indebtedness, we would not be required to discharge our obligations in a currency other than *reais*. Any judgment obtained against us in Brazilian courts in respect of any payment obligations under such shares, ADSs, guarantees or other indebtedness would be expressed in reais. We cannot assure you that this amount in *reais* will afford the holders of the shares, ADSs, senior notes or our other indebtedness full compensation of the amount sought in any such litigation.

Actual or anticipated sales of a substantial number of class A preferred shares could decrease the market prices of our class A preferred shares and the ADSs.

Sales of a substantial number of our class A preferred shares could negatively affect the market prices of our class A preferred shares and the ADSs. If substantial sales of shares are made through the securities markets by our controlling shareholders or other class A preferred shares, the market price of our class A preferred shares and, by extension, the ADSs may decrease significantly. As a result, holders of the ADSs may not be able to sell the ADSs at or above the price they paid for them.

Holders of the ADSs or class A preferred shares in the United States may not be entitled to the same preemptive rights as Brazilian shareholders have, pursuant to Brazilian legislation, in the subscription of shares resulting from capital increases made by us.

Under Brazilian law, if we issue new shares in exchange for cash or assets as part of a capital increase, subject to certain exceptions, we must grant our shareholders preemptive rights at the time of the subscription of shares, corresponding to their respective interest in our share capital, allowing them to maintain their existing shareholding percentage. We may not legally be permitted to allow holders of ADSs or class A preferred shares in the United States to exercise any preemptive rights in any future capital increase unless (1) we file a registration statement for an offering of shares resulting from the capital increase with the U.S. Securities and Exchange Commission, or the SEC, or (2) the offering of shares resulting from the capital increase qualifies for an exemption from the registration requirements of the Securities Act. At the time of any future capital increase, we will evaluate the costs and potential liabilities associated with filing a registration statement for an offering of shares with the SEC and any other factors that we consider important in determining whether to file such a registration statement. We cannot assure the holders of the ADSs or class A preferred shares in the United States that we will file a registration statement with the SEC to allow them to participate in any of our capital increases. As a result, the equity interest of such holders in our company may be diluted.

Brazilian tax laws may have an adverse impact on the taxes applicable to the disposition of our ADSs and preferred shares.

According to Law No. 10,833, enacted on December 29, 2003, if a nonresident of Brazil disposes of assets located in Brazil, the transaction will be subject to taxation in Brazil, even if such disposition occurs outside Brazil or if such disposition is made to another nonresident. Dispositions of our ADSs between nonresidents, however, are currently not subject to taxation in Brazil. Nevertheless, in the event that the concept of disposition of assets is interpreted to include the disposition between nonresidents of assets located outside Brazil, this tax law could result in the imposition of withholding taxes in the event of a disposition of our ADSs made between nonresidents of Brazil. Due to the fact that as of the date of this annual report Law No. 10,833/2003 has no judicial guidance as to its application, we are unable to predict whether an interpretation applying such tax laws to dispositions of our ADSs between nonresidents could ultimately prevail in Brazilian courts. See Item 10. Additional Information Taxation Brazilian Tax Considerations.

The relative volatility and liquidity of the Brazilian securities markets may adversely affect holders of our class A preferred shares and the ADSs.

The Brazilian securities markets are substantially smaller, less liquid and more volatile than major securities markets in the United States and other jurisdictions, and may be regulated differently from the manner in which U.S. investors are accustomed. Factors that may specifically affect the Brazilian equity markets may limit the ability of holders of the ADSs to sell class A preferred shares underlying ADSs at a price and at a time when they wish to do so and, as a result, could negatively impact the market price of the ADSs themselves.

Economic developments and investor perceptions of risk in other countries, including both in developed or emerging market economies, may adversely affect the trading price of Brazilian securities, including our common shares and ADSs, as well as any outstanding debt securities.

The market value of securities of Brazilian issuers is affected in varying degrees by economic and market conditions in other countries, including in developed countries, such as the United States and certain European countries, and in emerging market countries. Although economic conditions in such countries may differ significantly from economic conditions in Brazil, the reaction of investors to developments in these other countries may have an adverse effect on the market value of securities of Brazilian issuers. The price of shares traded in the Brazilian capital markets, for instance, has been historically subject to fluctuation of interest rates in the United States and the variation in the main U.S. stock exchanges. Moreover, crises in other emerging countries may diminish investor interest in securities of Brazilian issuers, including our common shares and ADSs and our debt securities. This could adversely affect the market price of our common shares, ADSs and outstanding debt securities and could also make it more difficult for us to access capital markets, affecting our ability to finance our operations on acceptable terms.

Recently, heightened volatility in the Brazilian market was due to, among other factors, uncertainties regarding adjustments to the implication of U.S. elections, U.S. monetary policy, the so-called BREXIT and their consequences on international financial markets, increased aversion to risk in emerging countries, and uncertainties regarding macroeconomic and political conditions. On January 20, 2017, Donald Trump became the President of the United States. We have no control over and cannot predict the effects of Donald Trump s administration or policies. In addition, we are exposed to disruption and volatility of global financial markets due to their effects on the economic and financial environment, particularly in Brazil, such as economic downturn, increased unemployment rate, decreased purchasing power of consumers and unavailability of credit.

These disruptions or volatility in global financial markets may increase even further the negative effects on the Brazilian economic and financial environment, adversely affecting us.

Because Braskem Finance Limited has no operations of its own, holders of our outstanding senior notes issued by Braskem Finance Limited must depend on Braskem to provide Braskem Finance Limited with sufficient funds to make payments on these notes when due.

Braskem Finance Limited, a wholly-owned subsidiary of Braskem incorporated in the Cayman Islands, has no operations other than the issuing and making payments on its senior notes and other indebtedness ranking equally with these senior notes, and using the proceeds therefrom as permitted by the documents governing these issuances, including lending the net proceeds of the senior notes and other indebtedness incurred by Braskem Finance Limited to Braskem and subsidiaries of Braskem. Accordingly, the ability of Braskem Finance Limited to pay principal, interest and other amounts due on the outstanding senior notes issued by it and other indebtedness will depend upon our financial condition and results of operations and our subsidiaries that are creditors of Braskem Finance Limited. In the event of an adverse change in our financial condition or results of operations and our subsidiaries that are creditors of Braskem Finance Limited, these entities may be unable to service their indebtedness to Braskem Finance Limited, which would result in the failure of Braskem Finance Limited to have sufficient funds to repay all amounts due on or with respect to the outstanding senior notes.

Payments on Braskem s guarantees will be junior to Braskem s secured debt obligations and effectively junior to debt obligations of Braskem s subsidiaries and jointly controlled companies.

The outstanding senior notes are fully guaranteed by Braskem on an unsecured basis. The Braskem guarantees will constitute senior unsecured obligations of Braskem. The guarantees will rank equal in right of payment with all of Braskem s other existing and future senior unsecured indebtedness. Although the guarantees will provide the holders of the senior notes with a direct, but unsecured claim on Braskem s assets and property, payment on the guarantees will be subordinated to secured debt of Braskem to the extent of the assets and property securing such debt.

Upon any liquidation or reorganization of Braskem, any right of the holders of the notes, through enforcement of Braskem s guarantees (i) to participate in the assets of Braskem, including the capital stock of its subsidiaries and jointly controlled entities, will be subject to the prior claims of Braskem s secured creditors, and (ii) to participate in the assets of Braskem s subsidiaries and jointly controlled entities, and will be subject to the prior claims of the creditors of such subsidiaries and jointly controlled entities. The indentures relating to the outstanding senior notes include a covenant limiting the ability of Braskem and its subsidiaries to create or suffer to exist liens, although this limitation is subject to significant exceptions.

As of December 31, 2016, Braskem had (1) consolidated corporate debt, net of transaction costs, of R$23,331.1 million (US$7,158.7 million), and (2) consolidated debt related to our Mexico Complex of R$10,437.8 million (US$3,202.7 million). Of the consolidated corporate debt, R$4,403.5 million (US$1,351.1 million) was unsecured debt of Braskem S.A., R$2,867.1 million (US$879.7 million) was secured debt of Braskem S.A., R$16,060.5 million (US$4,927.9 million) was debt of Braskem s subsidiaries and special purpose entities (other than Braskem Idesa S.A.P.I.). The Braskem Idesa Working Capital Facility in the aggregate amount of R$302.6 million (US$92.8 million) outstanding as of December 31, 2016 was secured by Braskem S.A.,.

Braskem conducts a portion of its business operations through subsidiaries and jointly controlled companies. In servicing payments to be made on its guarantees of the outstanding senior notes, Braskem may rely, in part, on cash flows from its subsidiaries and jointly controlled companies, mainly in the form of dividend payments and interest on shareholders equity. The ability of these subsidiaries and jointly controlled entities to make dividend payments to

Braskem will be affected by, among other factors, the obligations of these entities to their creditors, requirements of Brazilian corporate and other law, and restrictions contained in agreements entered into by or relating to these entities. In the event that these subsidiaries and jointly controlled entities fail to make dividend payments to Braskem due to insufficient cash flows, Braskem may be required to utilize its own cash flow to service payments on its outstanding senior notes.

Braskem s obligations under the guarantees under the outstanding senior notes are subordinated to certain statutory preferences.

Under Brazilian law, Braskem s obligations under the guarantees under the outstanding senior notes are subordinated to certain statutory preferences. In the event of a liquidation, bankruptcy or judicial reorganization of Braskem, such statutory preferences, including post-petition claims, claims for salaries, wages, social security, taxes and court fees and expenses and claims secured by collateral, among others, will have preference over any other claims, including claims by any investor in respect of the guarantees. In such event, enforcement of the guarantees may be unsuccessful, and holders of the outstanding senior notes may be unable to collect amounts that they are due under the outstanding senior notes.

Brazilian bankruptcy laws may be less favorable to holders of our shares, ADSs and outstanding senior notes than bankruptcy and insolvency laws in other jurisdictions.

If we are unable to pay our indebtedness, including our obligations under the shares, ADSs and guarantees under the outstanding senior notes, then we may become subject to bankruptcy proceedings in Brazil. The bankruptcy laws of Brazil currently in effect are significantly different from, and may be less favorable to creditors than, those of certain other jurisdictions. For example, holders of our outstanding debt securities may have limited voting rights at creditors meetings in the context of a court reorganization proceeding. In addition, any judgment obtained against us in Brazilian courts in respect of any payment obligations under the guarantees normally would be expressed in the *real* equivalent of the U.S. dollar amount of such sum at the exchange rate in effect (1) on the date of actual payment, (2) on the date on which such judgment is rendered, or (3) on the date on which collection or enforcement proceedings are started against us. Consequently, in the event of our bankruptcy, all of our debt obligations that are denominated in foreign currency, including the guarantees, will be converted into *reais* at the prevailing exchange rate on the date of declaration of our bankruptcy by the court. We cannot assure you that such rate of exchange will afford full compensation of the amount invested in our outstanding debt securities plus accrued interest.

ITEM 4. INFORMATION ON THE COMPANY

According to IHS we are the largest producer of thermoplastic resins in the Americas, based on annual production capacity of our 29 plants in Brazil, six plants in the United States, two plants in Germany and four plants in Mexico as of December 31, 2016. We are the only producer of ethylene, polyethylene and polypropylene in Brazil. We produce a diversified portfolio of petrochemical and thermoplastic products and have a strategic focus on thermoplastic resins, including polyethylene, polypropylene and PVC. We are also the ninth largest Brazilian company, based on net revenue in 2016, according to the magazine *Revista Exame Maiores e Melhores.* We recorded net sales revenue of R$47,664.0 million and a net loss of R$729.2 million during the year ended December 31, 2016.

As of December 31, 2016, our business operations were organized into five business units, which corresponded to our principal production processes, products and services. Our business units were as follows:

- our Basic Petrochemicals Unit, which includes our production and sale of basic petrochemicals at the petrochemical complex located in Camaçari in the State of Bahia, or the Northeastern Complex, the petrochemical complex located in Triunfo in the State of Rio Grande do Sul, or the Southern Complex, the petrochemical complex located in Capuava in the State of São Paulo, or the São Paulo Complex and the petrochemical complex located in Duque de Caxias in the State of Rio de Janeiro, or the Rio de Janeiro Complex, and our supply of electricity produced at these complexes to second generation producers, including producers owned or controlled by us. This segment accounted for net sales revenue of R$25,062.6 million, or 42.6% of our consolidated net sales revenue of all reportable segments, including net sales to our other business units;

- our Polyolefins Unit, which includes the production and sale of polyethylene, including the production of green polyethylene from renewable resources, and polypropylene produced by our company in Brazil. This segment accounted for net sales revenue of R$20,307.4 million, or 34.5% of our consolidated net sales revenue of all reportable segments, including net sales to our other business units;

- our USA and Europe Unit, which includes our production, operations and sale of polypropylene in the United States and Germany. This segment accounted for net sales revenue of R$8,896.1 million, or 15.1% of our consolidated net sales revenue of all reportable segments, including net sales to our other business units;

- our Mexico Unit, which includes our production, operations and sale of ethylene, HDPE and LDPE in Mexico. This segment accounted for net sales revenue of R$1,586.9 million, or 2.7% of our consolidated net sales revenue of all reportable segments, including net sales to our other business units;

- our Vinyls Unit, which includes our production and sale of PVC and caustic soda. This segment accounted for net sales revenue of R$3,016.4 million, or 5.1% of our consolidated net sales revenue of all reportable segments, including net sales to our other business units;

Approximately 43.4%, 48.9% and 48.0% of our net sales revenue in 2014, 2015 and 2016, respectively, was derived from our Brazilian operations, and 56.6%, 51.1% and 52.0% of our net sales revenue in 2014, 2015 and 2016 was derived from our international operations (including exports from Brazil). We expect this process of internationalization to continue, especially with the ramp up of our Mexican operations.

Strategy of Our Company

Our strategic objective is to satisfy our customers in the plastics value chain and the chemical industry in Brazil and the Americas, while maximizing return on the capital invested by shareholders.

Table of Contents

The key elements of our strategy include:

Differentiation of Our Business. We recognize the cyclical nature of the markets for our petrochemical products and believe that, by focusing on relationships with our local customers, we can foster customer loyalty even during periods of lower demand. For instance, we offer our local customers more flexible delivery options and credit terms than importers, which typically offer deliveries only through port facilities financed through letters of credit. Our growth strategy is centered on increasing the consumption of our products, enabling customers to substitute non-plastic materials with thermoplastic resins. We are seeking to establish close, long-term relationships with our customers and are committed to providing technological support and solutions to our customers, through our research and/or development centers, which include the following: (1) Innovation and Technology Center in Triunfo, Rio Grande do Sul, Brazil; (2) Innovation and Technology Center in Pittsburgh, Pennsylvania, United States; (3) Renewable Chemicals Research Center in Campinas, São Paulo, Brazil; (4) Process Technology Development Center in Mauá, São Paulo, Brazil; (5) European Technical Center in Wessling, Bavaria, Germany; and (6) Mexican Technical Center in Nanchital, Vera Cruz, Mexico, which develop processes, products and applications for many industrial sectors and which, as of December 31, 2016, collectively had 302 employees.

In addition, in order to maintain our leadership position in the industry, we intend to improve the productivity and competitiveness of our current operations, maintain high standards of safety indicators and ensure maximum operational performance in terms of reliability, production optimization, cost reduction opportunities, investment discipline and improvements in our industrial processes.

Acquisition of Feedstocks at Competitive Prices and Diversification of Feedstock. In order to obtain feedstocks at competitive prices, we are constantly seeking to diversify our feedstock profile and to negotiate purchases of feedstocks at competitive prices.

As a result of rising natural gas production and related production of natural gas liquids, several companies have announced plans to build PDH plants, which would produce on-purpose propylene. We have secured an approximately 15-year propylene agreement with Enterprise Products Partners L.P., or Enterprise Products, which is currently building a PDH plant in Texas with an annual capacity of 750,000 tons. We expect this agreement with an established producer to provide us with a competitive, long-term supply of propylene, using shale gas and other nontraditional sources as its feedstock. This plant is expected to commence operations by the end of 2017. Under this arrangement, the pricing of these contracts will be based on market prices for propane and other market costs.

With respect to the diversification of our feedstock profile, in April 2016 we commenced commercial operations of our Mexico Complex, which includes a cracker using ethane as feedstock and three integrated polyethylene plants with annual capacity of 1.05 million tons. Developed through a joint venture with Idesa, Braskem Idesa has entered into a long-term supply contract to purchase ethane from Pemex TRI, under competitive commercial conditions.

In March 2016, our board of directors approved a project with an expected investment of R$380 million to enable the use of up to 15% of ethane as raw material in the Northeastern Complex in Brazil. This project will modernize this industrial unit and improve the port infrastructure. We expect to complete this modernization in the second half of 2017. Furthermore, we entered into a long-term ethane supply agreement with a U.S. company with pricing based on the Mont Belvieu market prices.

Expansion in Selected International Markets. As part of the continuous evaluation of our business and plans, we regularly consider a range of strategic options and transactions. From time to time, we consider a variety of potential strategic transactions to expand our presence in the global petrochemicals market. We plan to expand the production capacity of our business units during the next several years by constructing new facilities (greenfield projects) with access to competitive feedstock sources independently or in conjunction with third parties and/or through the acquisition of petrochemical producers that currently compete with us or produce complementary products.

During 2016, we progressed studies on a project to build a new polypropylene plant at our site in La Porte, Texas, or the La Porte Project, which was approved by our board of directors on June 21, 2017.With an approved investment of up to US$675 million, the La Porte Project will add 450 kt of annual polypropylene production capacity to our portfolio, with startup expected in 2020.

The La Porte Project is aligned with our strategy to diversify our feedstock profile and expand geographically in the Americas, and it will strengthen our leadership position in polypropylene production in the United States.

New Business Opportunities. *We seek to pursue new business opportunities by developing new and specialized products and technologies, including the following:*

We have expanded and converted one of our polyethylene production lines in Bahia to produce metallocene-based linear low density polyethylene. This resin has distinctive characteristics for the flexible packaging industry, including greater resistance to impact and punctures, higher polish and greater transparency. This production line commenced operations in the fourth quarter of 2014;

In January 2017, we commenced production of UTEC®, our Ultra High Molecular Weight Polyethylene (UHMWPE) produced at our plant in La Porte, Texas. UTEC is an engineered polymer with advanced mechanical properties, such as high abrasion resistance, impact strength and low coefficient of friction and is developed and produced through our proprietary technologies. UTEC is a self-lubricating, high-strength, lightweight machinable product used for semi-finished goods in a vast array of applications and industries. It is eight times lighter than steel and lasts ten times longer than High-Density Polyethylene (HDPE);

We are continuously evaluating opportunities to improve our existing products and to act as partner or supplier in connection with the manufacture of new value-added products; and

We are seeking a strong position in the technological development of chemicals from renewable resources and/or using production processes that generate fewer emissions by investing in research, development and technological innovation.

History and Development of Our Company

Our business began when the Odebrecht Group (comprised of Odebrecht S.A. and its subsidiaries) and Mariani Group acquired control of Copene, a raw materials petrochemical complex in Camaçari, in July 2001, and then subsequently integrated their assets in the petrochemical sector with Copene. From 2001 to 2004, we underwent a corporate reorganization and merged many recently acquired companies. In addition, we acquired Polialden in 2005 and Politeno in 2006.

Through a partnership with Petrobras, we began consolidating the Southern Complex in Brazil in March 2007 with the acquired petrochemical assets from the Ipiranga group. In November 2007, we signed an agreement with Petrobras and Odebrecht, which required them to contribute part of their assets in the petrochemical sector to Braskem. In September 2008, Ipiranga Petroquímica, Petroquímica Paulínia and the spun-off portion of Ipiranga Química were merged into our company. In May 2009, our merger with Triunfo was approved.

In January 2010, we announced the acquisition of Quattor in order to strengthen the Brazilian petrochemical sector and establish ourselves among the five largest and most competitive petrochemical companies in the world. In February 2010, we announced the acquisition of the polypropylene assets of Sunoco Chemicals, the fourth largest producer of this resin in the United States. This acquisition represented an important step towards strengthening our internationalization strategy, which combines our growth in the U.S. market with alternative access to competitive raw materials and main consumer markets. As a result of this acquisition, we became a leader of thermoplastic resins in the Americas, consolidating our position as a major player in the international petrochemical market and the third largest global player in the polypropylene industry. In 2010, Braskem inaugurated its green ethylene plant in Triunfo, Rio Grande do Sul, becoming the world leader in biopolymers and launched the brand I m green™, which identifies Braskem s products made from renewable sources.

In July 2011, we announced the acquisition of Dow Chemical s polypropylene business, including four plants (two plants in the United States and two plants in Germany). The U.S. assets, located in Freeport and Seadrift, Texas, have a combined annual production capacity of 545,000 tons, which represented a 50% increase in annual capacity polypropylene production in the United States. The German assets, located in the cities of Wesseling and Schkopau, have a combined annual production capacity of 545,000 tons. This acquisition represented an important step in the consolidation of our international strategy, positioning us as the largest producer of polypropylene in the United States.

The following discussion highlights the important developments in our business since January 1, 2017.

Beginning of Operations of Our Mexico Unit

During April 2016, Braskem Idesa commenced commercial operations of the Mexico Complex. As a result of the commencement of operations of the Mexico Complex, we commenced recording the results of our Mexico Unit as a separate segment in our financial statements as of dates and for periods ended after January 1, 2016. For more information about the Mexico Complex and the Mexico Unit, see Item 4. Information on the Company Mexico Unit.

Global Settlement

In December 2016, we entered into a global settlement with the MPF, the DoJ, the SEC, and the OAG with regard to certain matters under investigation, which we refer to as the Global Settlement. The Global Settlement was reached at the conclusion of an independent internal investigation into the allegations of improper payments in connection with the so-called Operation Car Wash in Brazil. Under the Global Settlement, we agreed to pay to the governmental authorities in these jurisdictions an aggregate amount of approximately US$957 million (equivalent to approximately R$3.1 billion based on the fixed exchange rate of R$3.27 to US$1.00) and to be subject to external monitorship for a period of three years. For more information regarding the Global Settlement, see Item 8. Financial Information Legal Proceedings Global Settlement.

Sale of quantiQ

On January 10, 2017, we entered into an agreement with GTM do Brasil Comércio de Produtos Químicos LTDA under which we sold 100% of our ownership interest in quantiQ for an aggregate amount of R$550 million. On January 30, 2017, the Administrative Council for Economic Defense (*Conselho Administrativo de Defesa Econômica*), or CADE, Brazil s antitrust agency, approved the sale of quantiQ. The transaction was consummated on April 3, 2017.

Table of Contents

Our Corporate Structure

The following chart presents our simplified ownership structure and the corporate structure of our principal subsidiaries as of the date of this annual report. The percentages in bold italics represent the direct and indirect percentage of the voting share capital owned by each entity, and the percentages not in bold italics represent the direct and indirect percentage of the total share capital owned by each entity.

Basic Petrochemicals Unit

As of December 31, 2016, according to IHS, our Basic Petrochemicals Unit s facilities had one of the largest annual production capacities of all first generation producers in Latin America. Including net sales to our other business units, our Basic Petrochemicals Unit generated net sales revenue of R$25,062.6 million in 2016, or 42.6% of the net sales revenue of all reportable segments. Net sales revenue generated by internal sales to our other business units was R$19,490.2 million during 2016, representing 77.8% of the net sales revenue of our Basic Petrochemicals Unit.

Our Basic Petrochemicals Unit is comprised of the basic petrochemicals operations conducted by our company in the Northeastern Complex, the Southern Complex, the São Paulo Complex and the Rio de Janeiro Complex.

Our Basic Petrochemicals Unit produces:

- olefins, such as ethylene, polymer and chemical grade propylene, butadiene and butene-1;

- BTX products (1);

- fuels, such as automotive gasoline, liquefied petroleum gas, or LPG, ethyl tertiary butyl ether, or ETBE, and methyl tertiary butyl ether, or MTBE;

- intermediates, such as cumene;

- aliphatics, aromatics and hydrogenates solvents; and

- specialties such as isoprene, dicyclopentadiene, or DCPD, piperylene, nonene, tetramer, polyisobutylene, or PIB, and hydrocarbon resins.

The products of our Basic Petrochemicals Unit are used primarily in the manufacture of intermediate second generation petrochemical products, including those manufactured by our Polyolefins Unit and our Vinyls Unit. Our Basic Petrochemicals Unit also supplies other second generation producers in each of the petrochemical complexes in which we operate and other companies located outside of these complexes, and renders services to those producers. In 2016, 78.2% of our Basic Petrochemicals Unit s net sales revenue (including intra-company sales) was derived from the sale of basic petrochemicals, 7.0% from the sale of fuels, 8.7% from the resale of naphtha and condensate, 2.7% from the sale of intermediates and 3.5% from the sale of utilities and services. In 2016, 43.9% of our Basic Petrochemicals Unit s net sales revenue from sales of basic petrochemicals was derived from sales made to our Polyolefins and Vinyls Units.

Products of Our Basic Petrochemicals Unit

Our other business units and third-party petrochemical producers use ethylene and propylene produced by our Basic Petrochemicals Unit to produce second generation products such as polyethylene, polypropylene and PVC. We also sell butadiene, a variety of aromatics, including BTX products, and intermediates, such as cumene, to third-party petrochemical producers for use as raw materials in the production of a variety of second generation products, including synthetic rubber, elastomers, resins, nylon fibers, ethyl benzene (which is used to make styrene monomer/polystyrene), linear alkyl benzene, purified terephthalic acid, dimethyl terephthalate, bisphenol A, a feedstock for the production of polycarbonate resins, phthalic anhydride, plasticizers and paint.

The following table sets forth the sales volume of basic petrochemicals by our Basic Petrochemicals Unit (excluding our intra-company sales) for the periods indicated.

	Year Ended December 31,		
	2016	**2015**	**2014**
	(thousands of tons)		
Domestic sales:			
Ethylene	511.9	485.8	499.6
Propylene	291.3	246.1	208.9
Cumene	194.5	206.0	211.6
Butadiene	198.5	220.1	210.0

BTX products(1)	676.9	631.5	594.9
Others	1,214.0	956.7	942.6
Total domestic sales of basic petrochemicals	3,087.1	2,746.2	2,667.6.
Total export sales of basic petrochemicals	1,318.2	1,584.9	1,559.8
Total sales of basic petrochemicals	4,405.3	4,331.1	4,227.4

(1) Includes benzene, toluene and para-xylene.

Table of Contents

In addition, we had the following intra-company sales:

	Year Ended December 31,		
	2016	2015	2014
	(thousands of tons)		
Ethylene	2,856.5	2,793.5	2,704.3
Propylene	1,022.0	987.3	859.5

Production Facilities of Our Basic Petrochemicals Unit

We believe that the technological processes we use at our basic petrochemicals plants are among the most advanced in the world. Our Basic Petrochemicals Unit currently owns and operates:

- five major basic petrochemicals units in the Northeastern Complex (two olefins units, two aromatics units and one utilities unit);
- five major basic petrochemicals units in the Southern Complex (two olefins units, one green ethylene unit, one aromatics unit and one utilities unit);
- three basic petrochemicals units in the São Paulo Complex (one olefins unit, one aromatics unit and one utilities unit); and
- two basic petrochemicals units in the Rio de Janeiro Complex (one olefins unit and one utilities unit).

We define the term unit to mean several production lines that are linked together to produce olefins, aromatics or utilities.

The table below sets forth the primary products of our Basic Petrochemicals Unit, annual production capacity as of December 31, 2016 and annual production for the years presented.

Primary Products	Annual Production Capacity	Production For the Year Ended December 31,		
		2016	2015	2014
	(in tons)			
Olefins:				
Ethylene	3,952,000	3,459,861	3,357,078	3,237,886
Propylene	1,585,000	1,400,466	1,389,796	1,306,636
Butadiene	480,000	411,688	389,272	374,827
Aromatics:				
BTX products(1)	1,367,000	1,000,489	981,570	951,265

(1) Consists of benzene, toluene and para-xylene.

Raw Materials of Our Basic Petrochemicals Unit

Naphtha

Naphtha is the main raw material that we use to produce our basic petrochemical products and represents the principal production and operating cost of our Basic Petrochemicals Unit. We also use condensate as a raw material in our basic petrochemical units in the Southern Complex.

The price of naphtha that we purchase varies primarily based on changes in the U.S. dollar-based international price of crude oil. Naphtha accounted for 57.0% of the total cost of sales of our Basic Petrochemicals Unit during 2016.

Table of Contents

The following table shows the average Amsterdam-Rotterdam-Antwerp market price of naphtha for the periods indicated.

	2017	2016	2015	2014
Average(1)	US$ 455.38	US$ 385.41	US$ 461.89	US$ 836.23
Month ended:				
January	500.00	317.83	396.91	918.58
February	498.00	293.00	502.13	913.65
March	459.00	351.07	504.86	911.40
April	468.00	379.00	525.61	925.63
May	435.00	403.00	550.86	937.84
June	401.00	417.00	538.07	952.45
July	425.00	380.00	472.37	935.59
August	457.00	369.00	403.38	865.81
September		396.00	411.66	841.36
October		441.00	430.26	711.52
November		416.00	419.18	628.94
December		462.00	387.41	491.98

(1) The information in the Average row represents the mean average monthly naphtha prices during each respective year.

Source: IHS.

Supply Contracts and Pricing of the Basic Petrochemicals Unit

Naphtha

The following table shows the distribution of the naphtha purchases by our Basic Petrochemicals Unit for the periods indicated by geographic location of the suppliers.

	Year Ended December 31,		
	2016	2015	2014
Brazil	62.2%	55.5%	69.8%
Algeria	15.6%	19.7%	10.2%
United States of America	1.7%	4.5%	
Venezuela	5.3%	9.9%	9.0%
Others	15.2%	10.4%	11.0%
Total	100.0%	100.0%	100.0%

Supply Contracts with Petrobras

On December 23, 2015, we and Petrobras entered into a new five-year Naphtha Purchase Agreement. This contract replaced the naphtha supply contract between our company and Petrobras for the supply of naphtha to our basic petrochemicals plants located in the Northeastern Complex and superseded the naphtha supply contract between our company and Petrobras for the supply of naphtha to our basic petrochemicals plants located in the Southern Complex, Northeastern Complex and São Paulo Complex. The new contract will expire in December 2020.

Under the terms of this new agreement:

- Petrobras has agreed to sell and deliver naphtha, for a period of five years, to our basic petrochemicals plants in the Northeastern, Southeastern and the Southern Complex exclusively for our use as a raw material;

we are required to purchase a minimum monthly volume of naphtha;

we provide Petrobras with a firm commitment order for naphtha each month, together with an estimate of the volume of naphtha that we will purchase over the following six months;

we may request volumes of naphtha that exceed a monthly firm commitment order, which Petrobras may supply at its discretion;

the price we pay for naphtha is equal to 102.1% of ARA;

the contract will be amended in the event that unforeseen extraordinary events occur that cause a disruption in the economic-financial equilibrium of the contract;

beginning in January 2018, either party can renegotiate the contract upon the occurrence of certain market events;

either party may terminate the contract, without prior notice, in the event of: (1) failure to cure any breach of the contract following a 30-day grace period; (2) a force majeure event that continues for more than 90 days; (3) transfer or offer as a guaranty all or part of either party s rights and obligations under the contract to a third party without the other party s consent; (4) an alteration of ownership or corporate purposes that conflicts with the purpose of the contract; (5) dissolution; or (6) failure to comply with the compliance obligations of the contract; and

Petrobras may terminate the contract, without prior notice, in the event of our bankruptcy or liquidation.

Supply Arrangements with SONATRACH

La Société Nationale pour la Recherche, la Production, le Transport, la Transformation et la Commercialisation des Hydrocarbures, or SONATRACH (the Algerian national oil company), is one of our suppliers of imported naphtha and condensate. We have imported naphtha supplied by SONATRACH since 2002. On an annual basis, we negotiate the minimum and maximum volumes of naphtha and condensate that we will purchase from SONATRACH. In the event that we were unable to renew our supply arrangements with SONATRACH, we believe that we could purchase sufficient quantities of naphtha from other suppliers to meet the supply needs of our basic petrochemicals plants.

Other Supply Contracts

As part of our strategy to diversify our sources of supply of naphtha, we are acquiring naphtha under annual supply arrangements with international suppliers.

Spot Market Purchases of Naphtha

In addition to our supplies of naphtha under the agreements described above, we purchase naphtha on the spot market from time to time from foreign suppliers located in Africa, Europe, North America and Latin America.

Ethane and Propane

Ethane and propane are the principal raw materials that we use to produce our basic petrochemical products in the Rio de Janeiro Complex and represent the principal production and operating cost of the basic petrochemical unit in the Rio de Janeiro Complex. The price of ethane and propane that we purchase varies primarily based on changes in the U.S. dollar-based international price of these feedstocks.

In December 2000, we and Petrobras entered into an ethane and propane supply agreement. The initial term of this contract expires in January 2021 and this agreement is automatically renewable for one two-year period, unless either party notifies the other party in writing, at least one year prior to the expiration of the contract, that it does not intend to renew this agreement. Under the terms of this agreement, Petrobras agrees to sell and deliver ethane and propane to our basic petrochemical plant in the Rio de Janeiro Complex exclusively for use as a raw material;

Table of Contents

we are required to purchase and Petrobras is required to deliver a minimum annual volume of ethane and/or propane;

we agree to provide Petrobras with a firm commitment order for ethane and propane each month, together with an estimate of the volume of ethane and propane that we will purchase over the immediately succeeding four months;

the price for ethane and propane is based on the USA Mont Belvieu price; and

Petrobras may terminate the contract, without prior notice, in the event of: (1) our failure to cure any breach of the contract following a 60-day grace period; (2) a force majeure event that continues for more than 365 days; (3) we transfer or offer as a guaranty all or part of our rights and obligations under the contract to a third party without Petrobras consent; and (4) the dissolution, bankruptcy or liquidation of RioPol.

Refinery Off Gas

In January 2005, we and Petrobras entered into an agreement for the purchase and sale of a steam of refinery off gas, from which we separate ethylene and propylene. This agreement provides that we and Petrobras will negotiate the renewal of this agreement prior to its expiration in 2020 and that, in the event that Petrobras does not intend to renew this agreement, it must notify us at least two years prior to the expiration of this agreement and must perform under the terms and conditions of this agreement until 2028. Under the terms of this agreement, which represents 100% of our light refinery hydrocarbon supply:

Petrobras agrees to sell and deliver refinery off gas to our basic petrochemical plant in the São Paulo Complex exclusively for use as raw materials;

we are required to purchase a minimum daily volume of refinery off gas;

the price for refinery off gas is based on a variety of market indices;

the contract will be amended in the event that unforeseen extraordinary events occur that cause a disruption in the economic-financial equilibrium of the contract; and

Petrobras may terminate the contract, without prior notice, in the event of: (1) our failure to cure any breach of the contract following a 30-day grace period; (2) a force majeureevent that prevents the execution of the contract; (3) we transfer or offers as a guarantee all or part of its rights, obligations and credits under the contract to a third party without Petrobras consent, unless the third party is a member of our economic group; (4) the dissolution or bankruptcy of Braskem S.A; and (5) a change of entity type, merger, sale, spin-off or any other corporate reconstruction of Braskem S.A that conflicts with or impedes the execution of contract s purpose.

Electricity

To supply our industrial operations in Brazil, which represents 86% of the global Braskem s electric consumption, we self-generate approximately 20% of our electrical energy consumption. Approximately 32% of our demand is supplied by Companhia Hidrelétrica do São Francisco, or CHESF, a Brazilian government-owned electric power generation company, pursuant to a power purchase agreement. Approximately 93% of the 68% remaining energy is supplied under long-term contracts with several suppliers in the free energy market (Mercado Livre de Energia) and 7% is supplied by regulated market.

In the Bahia Complex, we self-generate approximately 36% of the energy consumption, and about 42% of the demand is supplied by CHESF. The remaining energy is supplied under long-term contracts in the free energy market (*Mercado Livre de Energia*) from several companies.

In the Alagoas Complex, approximately 76% of the energy consumption is supplied by CHESF. About 13% of the demand is delivered by Eletrobras Alagoas, another Brazilian government-owned electric power distribution company. The remaining energy is supplied under long-term contracts in the free energy market from several companies.

In the Southern Complex, we self-generate approximately 31% of the energy consumption, and the remaining energy is acquired from several suppliers primarily under long-term contracts in the free energy market.

In the São Paulo Complex, we self-generate approximately 11% of the energy consumption, and the remaining energy is acquired primarily under long-term contracts in the free energy market from several companies.

In the Rio de Janeiro Complex, all the energy consumption is acquired primarily under long-term contracts in the energy free market from several companies.

Natural Gas

Natural gas is supplied to our industrial operations in Brazil under long-term contracts in the regulated market by companies that have government licenses and exclusivity to deliver in each state. The natural gas consumed by our operations in Brazil in 2016 represented 61% of our total consumption.

In the Bahia Complex, natural gas is supplied by Bahiagás, which represents approximately 45% of our consumption in Brazil.

In the Alagoas Complex, natural gas is supplied by Gás de Alagoas S.A. (Algás), which represents approximately 21% of our consumption in Brazil.

In the Rio Grande do Sul Complex, natural gas is supplied by SULGAS, which represents approximately 14% of our consumption in Brazil.

In the São Paulo Complex, natural gas is supplied by the Companhia de Gás de São Paulo Comgás, which represents approximately 16% of our consumption in Brazil.

In the Rio de Janeiro Complex, natural gas is supplied by CEG, which represents approximately 4% of our consumption in Brazil.

Others

In the Southern Complex we also buy methanol to produce MTBE and ethanol to produce the green polyethylene. Methanol is imported and price is based in international market quotations. Ethanol is bought in the domestic market from several producers. In the Bahia Complex, we also buy ethanol to produce ETBE.

Sales and Marketing of Our Basic Petrochemicals Unit

We sell 70% of our basic petrochemical products in Brazil to third-party petrochemical producers. We sell the remainder of our basic petrochemical products to customers in the United States, Europe, South America and Asia.

As is common with other first generation petrochemical producers, our Basic Petrochemicals Unit has a high concentration of sales to a limited number of customers. Net sales to our Basic Petrochemicals Unit s 10 largest customers (excluding intra-company sales) accounted for 22.2% of our Basic Petrochemicals Unit s total net sales revenue during the year ended December 31, 2016.

Table of Contents

The following table sets forth our net sales revenue derived from domestic and export sales, excluding inter-company sales, by our Basic Petrochemicals Unit for the years indicated:

	For the Year Ended December 31,		
	2016	2015	2014
	(in millions of *reais*)		
Net sales revenue:			
Domestic sales	R$ 8,201.7	R$ 7,523.5	R$ 8,459.5
Export sales	5,572.3	4,944.2	5,389.8
	13,744.0	R$ 12,467.7	R$ 13,849.3

Domestic Sales of Basic Petrochemicals

As part of our commercial strategy, our Basic Petrochemicals Unit focuses on developing long-term relationships with our customers and entering into long-term supply contracts that provide for minimum and maximum quantities to be purchased and monthly deliveries. We determine the domestic prices that we charge for ethylene by reference to Western European contract prices. We determine the domestic prices that we charge for propylene based on a formula under which 50% of the price is determined generally by reference to Northwest Europe prices and the remaining 50% is determined by reference to the North American contract prices. We determine the domestic price of butadiene by reference to the U.S. Gulf contract price. We set the domestic prices of our BTX products, including benzene, para-xylene and toluene by reference to United States, contract or spot market prices. We set the domestic prices of solvents by reference to international market prices, and we determine the domestic prices for our other olefins and aromatics products with reference to several international market indicators.

Export Sales of Basic Petrochemicals

We export basic petrochemicals mainly to customers in the United States and in Europe and we set the price on international references bases in accordance with which region or country.

We are focused on maintaining our leading position in the Brazilian market, while continuing to use our exports to protect our operations and adjust the imbalances between demand and production. Export net sales of our Basic Petrochemicals Unit represented 15% of our Basic Petrochemicals Unit s net sales revenue during 2016.

Additionally, we have applied our expertise in commodities trading to increase our resale operations of naphtha and oil derivatives in the international markets. In order to meet our crackers naphtha requirements (in terms of timing, pricing and quality), we maintain an excess supply of naphtha and resell the surplus on the spot market. During 2016, we recorded average resale operations of R$180 million per month.

Competition

Our basic petrochemical customers, which are mostly second generation petrochemical producers with plants located in the Brazilian petrochemical complexes, would have difficulty obtaining their feedstocks from other sources at lower prices due to the high cost of transportation of these products, as well as other logistical difficulties. In addition, because Brazil produces sufficient quantities of olefins to meet domestic demand, imports of these products are generally sporadic and usually related to scheduled plant maintenance shutdowns or to meet unsatisfied domestic demand.

During the past several years, as the relative cost of naphtha and gas as feedstocks for petrochemical crackers has diverged, many crackers using gas as a feedstock have become low-cost producers in the global markets and have seen their margins improve substantially as compared to naphtha crackers, such as our company. However, as gas crackers are able to produce fewer of the co-products and byproducts that naphtha crackers generate, such as propylene, butadiene and BTX products, and in smaller quantities, the prices of these products in the international markets have increased. As a result of the increased prices available for these co-products and byproducts, our net sales revenue from export sales of these products increased, and we believe that this increase in net sales revenue from exports of these products will continue in future periods in which the relative competitiveness of cracker feedstocks is disrupted. Competition in the international markets for these products is primarily based on the price of delivered products and competition has increased since mid-2008 as the balance between supply and demand was disrupted due to the impact of the global economic downturn on consumers of these products. In the international markets for our basic petrochemical products, we compete with a large number of producers, some of which are substantially larger and have substantially greater financial, manufacturing, technological and marketing resources than our company.

Polyolefins Unit

As of December 31, 2016, our polyolefins production facilities had the largest annual production capacity of all second generation producers of polyolefins products in Latin America. Our Polyolefins Unit generated net sales revenue of R$20,307.4 million during 2016, or 34.5% of our consolidated net sales revenue.

Our Polyolefins Unit is comprised of the operations conducted by our company at nine polyethylene plants and five polypropylene plants located in the Northeastern Complex, the Southern Complex, the São Paulo Complex and the Rio de Janeiro Complex.

Products of Our Polyolefins Unit

Our Polyolefins Unit produces:

- polyethylene, including LDPE, LLDPE, HDPE, ultra-high molecular weight polyethylene, or UHMWPE, EVA and green polyethylene from renewable resources; and
- polypropylene.

We manufacture a broad range of polyolefins for use in consumer and industrial applications, including:

- plastic films for food, agricultural and industrial packaging;
- bottles, shopping bags and other consumer goods containers;
- automotive parts;
- engineering and infra-structure goods; and
- household appliances.

Table of Contents

The following table sets forth a breakdown of the sales volume of our Polyolefins Unit by product line and by market for the years indicated.

	Year Ended December 31, 2016	2015	2014
	(thousands of tons)		
Domestic sales*:			
Polyethylene (1)	1,705.46	1,705.87	1,743.0
Polypropylene	1,105.68	1,126.9	1,204.0
Other			20.3
Total domestic sales	2,811.14	2,832.8	2,967.4
Total export sales	1,590.48	1,307.1	1,112.5
Total Polyolefins Unit sales	4,401.62	4,139.9	4,079.9

(1) Includes EVA, UHMWPE and Green PE.
(*) Unaudited.

We provide technical assistance to our customers to meet their specific needs by adapting and modifying our polyethylene and polypropylene products. In particular, we develop customized value-added polypropylene compounds for use by our customers in their specialized applications. We believe that the variety of technological processes at our polyolefins plants provides us with a competitive advantage in meeting our customers needs.

Production Facilities of Our Polyolefins Unit

As of December 31, 2016, our Polyolefins Unit owned 14 production facilities. Our Polyolefins Unit operates five plants located in the Southern Complex, three plants located in the Northeastern Complex, four plants located in the São Paulo Complex and two plants located in the Rio de Janeiro Complex.

The table below sets forth for each of our primary polyolefins products, our annual production capacity as of December 31, 2016 and annual production for the years presented.

Primary Products	Annual Production Capacity (in tons)	Production For the Year Ended December 31, 2016	2015	2014
		(in tons)		
Polyethylene:				
LDPE/EVA(1)	970,000	720,240	645,072	616,849
HDPE/LLDPE/UHMWPE(2)	2,085,000	1,988,228	2,003,747	1,890,974
Polypropylene(3)	1,840,000	1,592,474	1,510,363	1,592,491

(1) Represents capacity and production at five production lines with swing line capacity capable of producing two types of resins.

(2) Represents capacity and production at eight production lines with swing line capacity capable of producing two types of resins. Capacity varies depending on actual production demands.

(3) Represents capacity and production at five plants.

In September 2010, we commenced production of ethylene at a new plant located in the Southern Complex that produces green ethylene using sugar cane ethanol received through the Santa Clara Terminal as its primary raw material. This plant has an annual production capacity of 200,000 tons of ethylene.

During 2014, we converted and expanded, by 25,000 tons, one of our polyethylene lines in the state of Bahia to produce metallocene-based LLDPE. This project began its operations in January 2015.

Raw Materials of Our Polyolefins Unit

Ethylene and Propylene

The most significant direct costs associated with our production of polyethylene and polypropylene are the costs of purchasing ethylene and propylene, which together accounted for 85% of our Polyolefins Unit s total variable cost of production during 2016. During 2016, our Polyolefins Unit purchased all of its ethylene requirements and approximately 63% of its propylene requirements from our Basic Petrochemicals Unit.

Propylene Contracts with Petrobras and its Subsidiaries

We hold multiple propylene contracts with Petrobras refineries, which in 2016 were responsible for the supply of 36.5% of our propylene demand to produce polypropylene. These supply contracts have initial terms expiring at various dates between May 2021 and April 2028, and are priced based on international references to assure competitiveness of feedstock. In 2016, Braskem entered into an agreement with Petrobras for a 5-year propylene supply contract with REFAP, a subsidiary of Petrobras. This supply contract is also priced based on international references.

Petrobras may terminate these contracts, without prior notice, in the event of: (1) our failure to cure any breach of the contract following a 30-day grace period; (2) a force majeure event occurs, although some of these contracts require that the force majeure event continues for more than 180 days; (3) we transfer or offer as a guaranty all or part of its rights and obligations under the contract to a third party without Petrobras consent; (4) an alteration of Braskem management or corporate purposes that conflicts with the purpose of the contract; (5) the dissolution, bankruptcy or liquidation of Braskem; and (6) a change of entity type, merger, sale, spin-off or any other corporate reconstruction of Braskem that conflicts with or impedes the execution of contract s purpose.

Ethanol Supply Contracts

We hold multiple ethanol contracts with major producers of ethanol to supply our new facility that produces ethylene using sugar cane ethanol. These supply contracts have initial terms expiring at various dates between May 2017 and July 2018. Under these contracts, we are or will be required to purchase an annual supply of ethanol sufficient to meet approximately 70% of the capacity of this ethylene plant. The price that we pay under these contracts is or will be determined by reference to the monthly price of combustible hydrated alcohol as published by the Center for Advanced Studies in Applied Economics of the Superior School of Agriculture (*Centro de Estudos Avançados em Economia Aplicada da Escola Superior de Agricultura* CEPEA/ESALQ).

We also purchase ethanol on the spot market from time to time to supplement the supplies that we obtain under these contracts. The price that we pay for ethanol under most of these contracts is determined by reference to market indexes.

Other Materials and Utilities

Our Polyolefins Unit uses butene and hexane as raw materials in the production of HDPE and LLDPE. Butene is supplied by our Basic Petrochemicals Unit, and we import hexane from suppliers located in South Africa.

Our Unipol® polyethylene plants in the Northeastern Complex and Rio de Janeiro Complex use catalysts supplied by Univation Technologies. Our HDPE plant in the São Paulo Complex uses catalysts supplied by W.R. Grace & Co. The catalysts for our swing line LLDPE/HDPE plants are purchased from Basell Polyolefins Company N.V., or

Basell. We produce our own catalysts for our HDPE slurry plants in the Southern and Northeastern Complexes, and we purchase the inputs that we need to produce these catalysts from various suppliers at market prices. Our polypropylene plants use catalysts primarily supplied by Basell, while we import certain catalysts from suppliers in the United States and Europe.

In general, we believe that there are sufficient alternative sources available at reasonable prices for each of these other inputs used in our polyolefins production process such that the loss of any single supplier would not have a material adverse effect on our operations.

Table of Contents

Sales and Marketing of Our Polyolefins Unit

Our Polyolefins Unit sells polyethylene and polypropylene products to approximately 2,000 customers worldwide. We have a diversified product mix that allows us to serve a broad range of end users in several industries. The customers of our Polyolefins Unit generally are third generation petrochemical producers that manufacture a wide variety of plastic-based consumer and industrial goods.

Net sales revenue to the 10 largest customers of our Polyolefins Unit accounted for 20.8% of our Polyolefins Unit s total net sales revenue during 2016. No customer of our Polyolefins Unit accounted for more than 2.9% of our total net sales revenue in 2016, 2015 or 2014.

The following table sets forth our net sales revenue derived from domestic and export sales by our Polyolefins Unit for the years indicated:

	For the Year Ended December 31,		
	2016	2015	2014
	(in millions of *reais*)		
Net sales revenue:			
Domestic sales	R$ 13,903.1	R$ 14,032.1	R$ 14,098.6
Export sales:			
South America (excluding Brazil)	3,286.5	2,806.5	2,421.1
Europe	1,750.3	1,675.4	872.1
North America	82.4	866.5	896.4
Asia	879.7	446.9	189.4
Other	405.4	158.6	24.6
Total export sales	6,404.3	5,953.9	4,403.6
	R$ 20,307.4	R$ 19,986.2	R$ 18,502.2

Domestic Sales

We are focused on developing long-term relationships with our customers. Given the cyclical nature of the markets for our polyolefins products, we believe that we can strengthen customer loyalty during periods of reduced demand for polyethylene or polypropylene by providing a reliable source of supply to these customers during periods of high demand. We work closely with our customers to determine their needs, to provide technical assistance and to coordinate the production and delivery of our products. Customers submit annual proposals giving their estimated monthly requirements for the upcoming year for each of our polyolefins products, including technical specifications, delivery terms and proposed payment conditions. We evaluate these proposals on a monthly basis to make any required adjustments and to monitor and attempt to ensure adequate supply for each customer.

In addition to direct sales of polyolefins to our customers, our Polyolefins Unit sells products in Brazil through exclusive independent distributors. Our Polyolefins Unit is served by five distributors, through which we distribute our products pursuant to formal agreements and spot market transactions.

We have selected our distributors based on their ability to provide full service to their customers, including the ability to prepare our products on a customized basis. These distributors sell our polyethylene and polypropylene products to manufacturers with lower volume requirements and are able to aggregate multiple orders for delivery to customers that would otherwise be uneconomical for us to serve. Furthermore, by serving smaller customers through a network of distributors, our account managers focus their efforts on delivering high quality service to a smaller number of large, direct customers.

Export Sales

Our volume of polyolefins export sales has generally varied based upon the level of domestic demand and the total production availability for our products. Our Polyolefins Unit has sales office in Argentina, Chile, Peru and Colombia. These offices are used to consolidate our marketing efforts in South America, one of our key markets outside of Brazil for this business unit. Our Polyolefins Unit also uses our European, Mexican and U.S. sales force in order to improve the profitability of our sales. In each of these regions, we have specific commercial strategies in connection with exports coming from Brazil, which complements our local product availability.

We have established a strategic position in the polyolefins business in South America and Europe through regular direct sales, local distributors and agents who understand their respective markets. Our strategy to increase our presence in these foreign markets is intended, among other things, to reduce our exposure to the cyclicality of the international spot market for polyolefins through the development of long-term relationships with customers in neighboring countries. Our local presence in Europe allows us to further enhance our position in that market and sell our Polyolefins Unit products through our USA and Europe Unit.

The main focus of our Polyolefins Unit is to maintain our leading position in the Brazil and South America reinforcing our commitment to the plastic industry chain in the region, maintaining our position as a leader in polyolefins through a continued local presence and regular product supply.

Prices and Sales Terms

We determine the domestic prices for polyethylene by reference to North American spot prices and our domestic prices for polypropylene by reference to Southeast Asia spot prices. Our customers in Brazil may pay in full on delivery or elect credit terms that require payment in full within three to 60 days following delivery. We charge interest based on prevailing market rates to our Brazilian customers that elect to pay on credit.

Over the last few years, some Brazilian states have encouraged imports of polyethylene and polypropylene, as well as final products made from these polymers, by providing state tax benefits on imported goods. However, on January 1, 2013, federal legislation took effect reducing the maximum state-level value-added tax on sales and services (*Imposto sobre Circulação de Mercadorias e Serviços*), or ICMS, tax that states can charge from a rate of 12% to 4% on interstate sales of imported raw materials and other goods that are not wholly or partially manufactured in Brazil. As a result, Brazilian states are less able to attempt to attract imports at local ports by offering tax benefits in the form of reduced ICMS tax rates. For more information, see Item 5. Operating and Financial Review and Prospects Principal Factors Affecting Our Results of Operations Effects of Brazilian Industrial Policy Import Tariffs at Local Ports.

In addition, besides our strategic sales to South America, Europe, Mexico and the United States, our Polyolefins Unit generally conducts export sales to buyers in Asia and Africa through the international spot market. Our customer base in these markets consists primarily of trading houses and distributors. Pricing is based on international spot market prices. We make all sales in these markets with letters of credit.

Competition

We are the only producer of polyethylene and polypropylene in Brazil. We compete with polyolefins producers worldwide. In 2016, Brazilian polyethylene and polypropylene imports declined by 0.4% and represented 27% of Brazilian polyolefin consumption.

We compete for export sales of our polyolefins products in other countries in Latin America and in the North American, Asian and European markets. We compete with a variety of resin producers, some of which have greater financial, research and development, production and other resources than our company. Our competitive position in the export markets that we serve is primarily based on customer relationship, product differentiation (mainly on renewable polyethylene), raw material costs, selling prices, product quality and customer service and support.

Table of Contents

USA and Europe Unit

Our USA and Europe Unit includes:

the operations of Braskem America, which consist of five polypropylene plants in the United States and one Ultra High Molecular Weight Polyethylene UTEC® plant and

the operations of two polypropylene plants in Germany.

As of December 31, 2016, our USA and Europe Unit s facilities had the largest annual polypropylene production capacity in the United States. Our USA and Europe Unit generated net sales revenue of R$8,896.1 million during 2016, or 15.1% of net sales revenue of all reportable segments.

In June 2014, we announced the construction of an UHMWPE production facility in our La Porte, Texas site, which began producing UTEC in 2017. We believe the production of specialized UHMWPE at this new plant complements our existing portfolio of products and will enable us to access new markets and to develop close relationships with new and existing clients.

Products of Our USA and Europe Unit

Our USA and Europe Unit produces polypropylene. The sales volume of polypropylene by this unit was approximately 2,008,473 tons in 2016, 1,973,274 tons in 2015 and 1,862,600 tons in 2014. For a description of the uses of our polypropylene products, see Polyolefins Unit.

Production Facilities of our USA and Europe Unit

The table below sets forth the annual production capacity as of December 31, 2016 of the USA and Europe Unit s polypropylene plants in the United States and Germany and the annual production for the years presented.

	Annual	Production		
	Production	For the Year Ended December 31,		
Plant	**Capacity**	**2016**	**2015**	**2014**
		(in tons)		
United States	1,570,400	1,413,607	1,434,671	1,317,800
Germany	545,000	593,569	532,357	537,876

Raw Materials of Our USA and Europe Unit

Propylene

The most significant direct cost associated with the production of polypropylene by our USA and Europe Unit is the cost of purchasing propylene.

We acquire propylene for our polypropylene plants in the Unites States under a variety of long-term supply agreements and through the spot market. As of December 31, 2016, we had long-term supply agreements with multiple suppliers. The pricing formulas for propylene under these supply agreements are generally based on market prices. A portion of the propylene supplied to our gulf coast plants is provided by a limited partnership that we formed with a leading basic petrochemicals producer, under which we acquire propylene produced by an ethylene facility of that producer in Texas. Under the terms of the partnership agreement, the partnership has agreed to provide us with sufficient propylene to produce up to approximately 25% of our U.S. gulf coast plants current annual production capacity into early 2018, at prices calculated based on a cost-based formula that includes a fixed discount that declines until 2018.

As a result of rising natural gas production and related production of natural gas liquids, several companies have announced plans to build PDH plants, which would produce on-purpose propylene. We have secured a long-term propylene agreement of approximately 15 years with one such company, Enterprise Products, which is currently building a PDH plant in Texas with an annual capacity of 750,000 tons. We expect this agreement with an established producer to provide us with a competitive, long-term supply of propylene, using shale gas and other nontraditional sources as its feedstock. This plant is expected to commence operations by the end of 2017. Under this arrangement, the pricing of these contracts will be based on market prices for propane and other market costs.

In June 2012, we acquired the propylene splitter assets at Sunoco s Marcus Hook refinery, which we are currently using to convert refinery grade propylene to polymer grade propylene for use at our Marcus Hook polypropylene plant.

We acquire propylene for our polypropylene plants in Germany under long-term supply agreements that provide for the supply of 91% of the propylene requirements of these plants. We have two main supply agreements. One of these supply agreements will expire in September 2021, and is automatically renewable for consecutive one-year terms, unless cancelled by one of the parties, and the other supply agreement expires in December 2021. The pricing formula for propylene under these supply agreements is based on market prices.

Sales and Marketing of Our USA and Europe Unit

Our USA and Europe Unit sells polypropylene products to approximately 375 customers. We have a diversified product mix that allows us to serve a broad range of end users in several industries. The customers of our USA and Europe Unit generally are third generation petrochemical producers that manufacture a wide variety of plastic-based consumer and industrial goods.

Net sales revenue to the 10 largest customers of our USA and Europe Unit accounted for 37.8% of our USA and Europe Unit s total net sales revenue in 2016, 33.4% in 2015 and 50.4% in 2014, respectively.

The following table sets forth our net sales revenue derived from sales of our USA and Europe Unit for the years indicated:

	For the Year Ended December 31,		
	2016	**2015**	**2014**
		(in millions of *reais*)	
Net sales revenue:			
USA and Europe	R$ 8,896.1	R$ 8,240.0	R$ 7,934.3

Approximately 40% of the sales of polypropylene by the USA and Europe Unit are made under long-term supply agreements with our customers. These supply contracts generally have an initial two-year term and are automatically renewable for one-year periods unless one party notifies the other of its intention not to renew. These contracts also provide for minimum and maximum quantities to be purchased and monthly deliveries.

We market the remainder of the polypropylene production of the USA and Europe Unit through (1) our direct sales force that seeks to establish supply relationships with customers, (2) a select number of distributors authorized to represent the Braskem brand in the U.S. and European markets, (3) resellers that trade these products under private labels in the North American and European markets, and (4) traders that resell these products in the export markets.

Competition

The USA and Europe Unit is largely a commodities business and competes with local, regional, national and international companies, some of which have greater financial, research and development, production and other resources than our company. Although competitive factors may vary among product lines, our competitive position is primarily based on raw material and production costs, selling prices, product quality, product technology, manufacturing technology, access to new markets, proximity to the market and customer service and support.

Our primary competitors for sales in the polypropylene industry in North America are other large international petrochemical companies. In general, demand is a function of economic growth in North America and elsewhere in the world.

Our primary competitors for sales in the polypropylene industry in Europe are other large international petrochemical companies. In general, demand is a function of economic growth in Europe and elsewhere in the world.

Mexico Unit

Braskem and Idesa, one of Mexico s leading petrochemical groups, formed Braskem Idesa S.A.P.I. in April 2010, with Braskem holding 75% of the total share capital and Idesa holding the remaining 25%, to develop, construct and operate the Mexico Complex, located in the Mexican state of Veracruz. During April 2016, Braskem Idesa commenced commercial operations of the Mexico Complex. As a result of the commencement of operations of the Mexico Complex, we commenced recording the results of our Mexico business unit as a separate segment in our financial statements as of dates and for periods ended after January 1, 2016.

Products of Our Mexico Unit

Our Mexico business unit produces ethylene, HDPE and LDPE at our Mexico Complex. We use all of the ethylene produced by our Mexico Complex as raw material for the production of polyethylene by this complex. The sales volume of polyethylene by this unit was approximately 430,283 tons in 2016. As with our Polyolefins Unit, our Mexico Complex manufactures a broad range of polyethylene grades for use in consumer and industrial applications, including plastic films for food and industrial packaging, bottles, shopping bags and other consumer goods containers, automotive parts, and household appliances.

Technologies selected for the Mexico Unite are proven and considered stated of the art with excellent track records in the petrochemical market and provides a competitive advantage to provide technical assistance to our customers to meet their specific needs by adapting and modifying our polyethylene products.

Production Facilities of Our Mexico Unit

Our Mexico Unit operates four plants located in the Mexico Complex, consisting of:

- an ethylene cracker, with an annual production capacity of 1,050,000 tons of ethylene, which commenced operations in March 2016;
- two high density polyethylene plants, with a combined annual production capacity of 750,000 tons, which commenced operations in April 2016; and
- a low density polyethylene plant, with an annual production capacity of 300,000 tons, which commenced operations in June 2016.

Plant	Annual Production Capacity	Production For the Year Ended December 31, 2016	2015	2014
		(in tons)		
Mexico (Polyethylene)	1,050,000	471,109	0	0

47

Raw Materials of Our Mexico Unit

Ethane

Ethane is the principal raw material that we use to produce ethylene in the Mexico Complex and represent the principal production and operating cost of the Mexico Complex. The price of ethane that we purchase varies based on changes in the U.S. dollar-based international reference price of these feedstocks.

Ethylene

All of the ethylene produced by our Mexico Complex is used by the polyethylene plants in our Mexico Complex.

Other Materials and Utilities

Our Mexico Unit uses hexene as raw materials in the production of HDPE. We import hexene for the Mexico Complex from suppliers located in the United States.

Our Mexico Unit uses catalysts supplied by Ineos Europe Limited.

Supply Contracts of the Mexico Unit

Ethane

Braskem Idesa is party to an ethane supply agreement with Pemex TRI, a subsidiary of Petróleos Mexicanos, or Pemex, dated February 19, 2010, pursuant to which Pemex TRI will provide, and Braskem Idesa will purchase, 66,000 barrels per day of ethane to the Mexico Complex for a period of 20 years at prices based on the Mont Belvieu purity ethane. Under this agreement, any daily amount rejected by Braskem Idesa must be purchased in installments in subsequent deliveries until the deficit has been resolved. This contract commenced in June 2015 and will expire in 2035 and is renewable for three five-year periods, with prior notice at least two years prior to the expiration of the agreement that it intends to renew this agreement. Pemex TRI may terminate the contract in the event of: (1) a failure to pay that continues for more than 180 days after notice, or (2) an emergency stoppage in operations or force majeure event that continues for more than 48 months.

Since July 2015, Braskem Idesa has been required to purchase, and Pemex TRI has been required to deliver, the minimum daily volume of ethane provided under the supply agreement.

Electricity

The Mexico Complex has its own power generation plant consisting of one gas turbine and two steam turbines, which generates more than 100% of the Mexico Complex s energy consumption. In addition, the Mexico Complex is also connected to the high-voltage power grid of Comisión Federal de Electricidad (the Mexican government-owned power supplier) as a back-up power source and to sell excess power on the spot market. The Mexico complex generates all of its requirements of steam and its water requirements are supplied by the Comisión Nacional del Agua (the Mexican government-owned water commission) under an agreement that expires in 2029 and is subject to renewal.

In general, we believe that there are sufficient alternative sources available at reasonable prices for each of these other inputs used in our polyethylene production process such that the loss of any single supplier would not have a material adverse effect on our operations.

Sales and Marketing of Our Mexico Unit

Our Mexico Unit sells polyethylene products to approximately 300 customers in the Mexican market. We have a diversified product mix that allows us to serve a broad range of end users in several industries. The customers of our Mexico Unit generally are third generation petrochemical producers that manufacture a wide variety of plastic-based consumer and industrial goods. Net sales revenue to the 10 largest customers of our Mexico Unit accounted for approximately 41.0% of our Mexico Unit s total net sales revenue in 2016.

Domestic Mexican Sales

In the first full year operation of our Mexico Complex since its start up, we have been focused on penetrating the domestic market and obtaining the customer approval of our products. Other priority is to develop long-term relationships with our customers and, given the cyclical nature of the markets for our polyethylene products, we believe that we can strengthen customer loyalty during periods of reduced demand for polyethylene by providing a reliable source of supply to these customers during periods of high demand. We work closely with our customers to determine their needs, to provide technical assistance and to coordinate the production and delivery of our products.

Considering our Mexico Complex s logistical infrastructure and logistics centers by region, we are able to project customer demand by region. Thus, we can anticipate and plan our production and logistics in order to make the products available on time and at the points of shipment. As our products portfolio can adjust to the nature of the demand of the Mexican market, we have greater flexibility to adapt and better serve the market.

In addition to direct sales of polyethylene to our customers, our Mexico Unit sells products in Mexico through independent distributors. Our Mexico Unit is served by five distributors, through which we distribute our products pursuant to formal agreements and spot market transactions.

We have selected our distributors based on their ability to provide full service to their customers, including the ability to prepare our products on a customized basis. These distributors sell our polyethylene products to manufacturers with lower volume requirements and are able to aggregate multiple orders for delivery to customers that would otherwise be uneconomical for us to serve. Furthermore, by serving smaller customers through a network of distributors, our account managers focus their efforts on delivering high quality service to a smaller number of large, direct customers.

Export Sales

The main focus of our Mexico Unit is to maintain our leading position in the Mexico market while continuing to export in order to manage the relationship between our production capacity and domestic demand for our products. We believe that our continued presence in export markets is essential to help manage any overcapacity in the Mexican market. The excess volume is primarily exported to United States, Europe and Central America, using our existing sales force and complementing our portfolio in those regions, together with products exported from Brazil. In order to use the already established Braskem sales channels in the United States and Europe, the strategy of exports of the Mexico unit production, for these regions, is to develop and retain customers, in order to seek a greater added value in exports, especially considering the competitive logistics for United States. This new polyethylene complex reinforces our position with polyethylene customers worldwide, which enhances our position in North America.

Prices and Sales Terms

We determine the Mexican domestic prices for polyethylene by reference to North American prices. Our customers in Mexico may pay in full on delivery or elect credit terms that require payment in full within up to 60 days following delivery.

Our Mexico Unit s export sales consist initially of volumes to Asia, Europe and the United States through traders and distributors. Pricing is based on international spot market prices. We make all sales in these markets with letters of credit. As discussed under Export Sales above, since the beginning of 2017, the Mexico Unit has been focused on export sales directly to customers in the United States and Europe, so the netback price of exports has been increasing.

Table of Contents

Competition

We have the largest annual production capacity of polyethylene in Mexico. We compete in Mexico with a subsidiary of Pemex and with importers of polyethylene, primarily producers located in the United States and South America. We compete for export sales of our polyethylene products in other countries in Latin America and in markets in the United States, Asia and Europe. Our export business is a commodities business and we compete with a variety of resin producers, some of which have greater financial, research and development, production and other resources than our company. Our competitive position in the export markets that we serve is primarily based on raw material costs, selling prices, product quality and customer service and support.

Vinyls Unit

We are the leading producer of PVC in Brazil, based on sales volumes in 2016. As of December 31, 2016, our PVC production facilities had the second largest annual production capacity in Latin America. Our Vinyls Unit generated net sales revenue of R$3,016.4 million in 2016, or 5.1% of our net sales revenue of all reportable segments.

Our Vinyls Unit is the only vertically integrated producer of PVC in Brazil. Our PVC production is integrated through our production of chlorine, ethylene and other raw materials. Our Vinyls Unit also manufactures caustic soda, which is used by producers of aluminum, paper and chlorine.

In 2016, we had an approximate 51.6% share of the Brazilian PVC market, based on sales volumes of our Vinyls Unit.

Products of Our Vinyls Unit

The following table sets forth a breakdown of the sales volume of our Vinyls Unit by product line for the years indicated.

	For the Year Ended December 31,		
	2016*	2015*	2014*
	(thousands of tons)		
PVC	528.3	529.5	659.5
Caustic soda	442.5	435.7	478.1
Other(1)	112.1	114.5	126.7
Total domestic sales	1,083.0	1,079.7	1,252.2
Total export sales	122.7	65.4	12.1
Total Vinyls Unit sales	1,205.7	1,145.1	1,264.4

(1) Includes chlorine, hydrogen, caustic soda flake and sodium hypochlorite.
(*) Unaudited.

Production Facilities of Our Vinyls Unit

We own five vinyls production facilities. Two of our facilities are located in the Northeastern Complex, and three others are located in the State of Alagoas.

Table of Contents

The table below sets forth for each of our primary vinyls products, our annual production capacity as of December 31, 2016 and annual production for the years presented.

Primary Products	Annual Production Capacity	Production For the Year Ended December 31, 2016	2015	2014
		(in tons)		
PVC(1)	710,000	593,914	542,297	633,942
Caustic Soda(2)	539,000	453,171	436,185	448,062

(1) Represents capacity and production at three plants.
(2) Represents capacity and production at two plants.

Raw Materials of Our Vinyls Unit

Ethylene

The most significant direct cost associated with the production of PVC is the cost of ethylene, which accounted for 49.9% of our Vinyls Unit s total cost of sales in 2016. Our Basic Petrochemicals Unit supplies all of the ethylene required by our Vinyls Unit.

Electricity

Electric power is a significant cost component in our production of chlorine and caustic soda. Electric power accounted for 17.2% of our Vinyls Unit s total cost of sales in 2016. Our Vinyls Unit obtains its electric power requirements from various generators under long-term power purchase agreements. Our caustic soda plants at Camaçari and Alagoas and our PVC plant at Camaçari purchase their electric power requirements from CHESF under a long-term contract that expires in 2037. Companhia Energética de Alagoas S.A., or CEAL, distributes electric power to our PVC plants in Alagoas. The power purchase agreement with CEAL is renewable contracts with automatic rolling one-year extensions. These agreements provide us with the option to purchase our total electric power requirements based on an annual estimate. The price terms of this contract are based upon tariffs regulated by the Brazilian National Electrical Energy Agency (*Agência Nacional de Energia Elétrica*).

Salt

We used approximately 798,000 tons of salt during 2016. Salt accounted for 0.5% of our Vinyls Unit s total cost of sales in 2016. We have exclusive salt exploration rights at a salt mine located near our Alagoas plant. We estimate that the salt reserves of this mine are sufficient to allow us to produce chlorine at expected rates of production for approximately 35 to 45 years. We enjoy significant cost advantages when compared to certain of our competitors due to the low extraction costs of rock salt (particularly compared to sea salt), and low transportation costs due to the proximity of the salt mine to our production facility.

Sales and Marketing of Our Vinyls Unit

Net sales revenue to our 10 largest Vinyls Unit customers accounted for 40.8% of our Vinyls Unit s total net sales revenue during 2016. One customer accounted for 8.6% of our Vinyl Unit s total sales revenue in 2016, 9.7% in 2015 and 9.4% in 2014.

There is a structural link between the PVC and caustic soda markets because caustic soda is a byproduct of the production of chlorine required to produce PVC. When demand for PVC is high, greater amounts of caustic soda are produced, leading to an increase in supply and generally lower prices for caustic soda. Conversely, when demand for PVC is low, prices for caustic soda tend to rise.

We make most of our sales of PVC and caustic soda directly to Brazilian customers without the use of third-party distributors. However, our Vinyls Unit maintains contractual relationships through five distribution centers, that provide logistical support, located in Paulínia and Barueri, both in the State of São Paulo, Joinville in the State of Santa Catarina, Extrema in the State of Minas Gerais and Araucaria in the State of Paraná. In addition, we operate twelve warehouse facilities for PVC, on a non-exclusive basis, and six terminal tank facilities for caustic soda strategically located along the Brazilian coast to enable us to deliver our products to our customers on a just-in-time basis. Our Vinyls Unit develops its business through close collaboration with its customers, working together to improve existing products as well as to develop new applications for PVC. Our marketing and technical assistance groups also advise customers and potential customers that are considering the installation of manufacturing equipment for PVC end products.

In addition, our Vinyls Unit supplies the Brazilian market with emulsion PVC and other copolymers with higher value by imports from Colombia under a long-term contract with Mexichem. Our primary customers operate in the laminated, shoe and automobile sectors. These products represented 3% of our consolidated sales volume in 2016.

Prices and Sales Terms

We determine the domestic prices for our PVC resins with reference principally to the prices paid by third generation producers in Brazil for imports of PVC, which generally reflect the Northeast Asian spot market price. Delivery time, quality and technical service also affect the levels of sales of PVC resins. We establish our domestic price for caustic soda based on North American spot market prices. Approximately 70.2% of our caustic soda sales in 2016 were made pursuant to agreements that are generally for one- to three-year terms and may include minimum and maximum prices.

Competition

PVC

We and Unipar (formerly Solvay) are the only two producers of PVC in Brazil. Unipar s total Brazilian installed annual production capacity is 300,000 tons, compared to our annual production capacity of 710,000 tons. Unipar s Brazilian production facilities are located in São Paulo, which is closer to the primary PVC market in Brazil than our facilities. However, we believe that our vertically integrated production capabilities, our modern PVC suspension plants, our strong relationship with our customers and our technical assistance programs enable us to make up for any competitive disadvantage due to distance and compete effectively with Unipar.

We also compete with Unipar s Argentine production facilities and other importers of PVC. Unipar has a PVC plant in Argentina in addition to its plants in Brazil. Imports accounted for approximately 19.8% of Brazilian PVC consumption in 2016. Domestically produced PVC is currently competitively priced with imported PVC, considering that our price is based on international market.

In addition, wfe compete with other producers of thermoplastics that manufacture the same PVC products or substitutes for products in our PVC product line. Thermoplastic resins, principally polyethylene and polypropylene, are used in certain applications as substitutes for PVC. Wood, glass and metals also are used in some cases as substitutes for PVC.

Caustic Soda

The three largest Brazilian producers of caustic soda, including Braskem, accounted for 96.8% of Brazilian production in 2016. Our company and another international petrochemical company operate in this market throughout Brazil, while the other domestic producers of caustic soda generally operate on a local or regional basis. Imports accounted for 38.1% of Brazil s total caustic soda consumption in 2016.

Our principal competitors in the caustic soda market elsewhere in South America are other international petrochemical companies operating in Brazil and producers located on the U.S. Gulf Coast.

Technology, Research and Development

Technology Licenses

Our Basic Petrochemicals Unit uses engineering process technology under non-exclusive arrangements from a variety of sources for specific production processes. We have entered into several non-exclusive agreements with a number of leading petrochemical companies to use certain technology and catalysts for our Polyolefins Unit. Some of the license agreements used by our Polyolefins Unit allow us to use the licensed technology in both existing and future plants. We have entered into several non-exclusive agreements with a number of leading petrochemical companies to use technology for our Vinyls Unit. We have entered into several non-exclusive agreements with a number of leading petrochemical companies to use certain technology and catalysts for the polypropylene production of our USA and Europe Unit. Some of the license agreements used by our USA and Europe Unit allow us to use the licensed technology in both existing and future plants. If any of the arrangements or licenses under which we use third-party technology were terminated or are no longer available to us, we believe that we would be able to replace this technology with comparable or better technology from other sources.

Our Mexico Unit has improvements and technical service agreements with its licensors for technology updates and to support the Mexico Unit s operations. Over next 10 years, we will pay will pay royalties corresponding to the license fee value for HDPE units, while we paid a one-time license fee for our LDPE units.

We do not pay any continuing royalties under any of the arrangements or licenses used by our Basic Petrochemicals Unit or our Vinyls Unit. Most of the license agreements used by our Polyolefins Unit or our USA and Europe Unit do not require us to pay any continuing royalties. Under the license agreements that require continuing royalty payments, we pay royalties on a quarterly basis based on the volume of the products produced using the licensed technology.

Research and Development

Our ability to compete in the markets that we serve depends on our ability to integrate new production processes developed by our company and third parties in order to lower our costs and offer new thermoplastic products. In addition, our relationships with our customers are enhanced by our ability to develop new products and customize existing products to meet their needs.

We develop projects through our research and/or development centers: (1) Innovation and Technology Center in Triunfo, Rio Grande do Sul, Brazil; (2) Innovation and Technology Center in Pittsburgh, Pennsylvania, United States; (3) Renewable Chemicals Research Center in Campinas, São Paulo, Brazil; (4) Process Technology Development Center in Mauá, São Paulo, Brazil; (5) European Technical Center in Wessling, Bavaria, Germany; and (6) Mexican Technical Center in Nanchital, Vera Cruz, Mexico, which develop processes, products and applications for many industrial sectors and which, as of December 31, 2016, collectively had 302 employees. Through these centers, we coordinate and maintain our research and development programs, which include the operation of (1) pilot plants, (2) catalysis, polymerization and polymer sciences laboratories, and (3) process engineering and research for renewable sources. Our investments in research and development, which are classified as expenses, totaled R$162.0 million in 2016, R$169.6 million in 2015 and R$128.1 million in 2014.

Braskem continues its efforts to develop solutions for products from renewable raw materials through internal projects and partnerships with Amyris and Michelin for isoprene production and with Genomatica for butadiene production.

In September 2016, we partnered with Made In Space, a leading developer of 3D printers for operation in zero gravity and an accredited NASA supplier. Made In Space developed the Additive Manufacturing Facility, the first commercial 3D printer permanently located outside of Earth. Currently installed in the International Space Station, this equipment uses biobased polyethylene resin produced at our plant in Triunfo, Rio Grande do Sul to fabricate various parts.

Maintenance

Most of our maintenance is performed by third-party service providers. For example, we have contracts with Construtora Norberto Odebrecht, or CNO, a subsidiary of our controlling shareholder Odebrecht, Asea Brown Boveri

Ltd., Cegelec Ltda., Rip Serviços Industriais S.A., Cl Engenharia Ltda. and other service providers to perform maintenance for our basic petrochemical plants in the Northeastern Complex and in the Southern Complex. We also perform some of our ordinary course maintenance with our small team of maintenance technicians, which also coordinate the planning and execution of maintenance services performed by third parties.

Table of Contents

Basic Petrochemicals Plants

Regular basic petrochemicals plant maintenance requires complete plant shutdowns from time to time, and these shutdowns usually take approximately 30 to 45 days to complete. We occasionally undertake brief shutdowns of the basic petrochemical operations at our basic petrochemical plants that do not materially affect our production output, primarily for maintenance purposes, catalyst regeneration and equipment cleaning. In addition, because we have two independent olefins units and two independent aromatics units at the Northeastern Complex and two independent olefins units at the Southern Complex, we may continue production of basic petrochemicals at these complexes without interruption, even while we perform certain maintenance services.

The next scheduled general maintenance shutdown of:

[the Rio de Janeiro Complex s olefins unit is scheduled to occur in 2017;

the Southern Complex s olefins 2 and aromatics 2 units are scheduled to occur in 2018;

the Northeastern Complex s aromatics 1 and olefins 1 units in 2019;

the Southern Complex s olefins 1 and aromatics 1 units are scheduled to occur in 2020;

the São Paulo Complex s olefins and aromatics units are scheduled to occur in 2020; and

the Northeastern Complex s olefins 2 and aromatics 2 units are scheduled to occur in 2022.

Plants of Our Polyolefins, Vinyls and USA and Europe Units

We have a regular maintenance program for each of our polyolefins plants. Production at each of our polyolefins plants generally is shut down for seven to 20 days every two to three years to allow for regular inspection and maintenance. In addition, we undertake other brief shutdowns for maintenance purposes that do not materially affect our production of polyolefins. We coordinate the maintenance cycles of our polyolefins plants with those of our basic petrochemicals plants. While our basic petrochemicals facilities must be shut down for up to 30 days for maintenance, our polyolefins facilities may be shut down for shorter periods because these facilities are less complex to operate and maintain than our basic petrochemicals plants. Similarly, plants of our USA and Europe Unit attempt to coordinate their maintenance cycles with the routines of their largest suppliers.

We have a regular maintenance program for each of our vinyls plants. Our Camaçari and Alagoas PVC plants are generally shut down for 15 to 20 days every two years to allow for regular inspection and maintenance. Our caustic soda and chlorine plant in Alagoas shuts down once a year for three days of maintenance in different parts of the plant. Our caustic soda and chlorine plant in Camaçari does not require prolonged maintenance shutdowns and is shut down for two or three days each year.

Environmental Regulation

In each of the countries in which we operate, our operations are subject to federal, state and local laws and regulations governing the discharge of effluents and emissions into the environment and the handling and disposal of industrial waste and otherwise relating to the protection of the environment.

Our consolidated annual expenditures on environmental control were R$325.3 million in 2016, R$221.9 million in 2015 and R$190.0 million in 2014. Our consolidated environmental expenses relate to our continuous control and monitoring policies, and we do not expect to have any material future environmental liabilities. However, our environmental compliance costs are likely to increase as a result of the projected increase in our production capacity and projected increases in unit costs for treatment and disposal of industrial waste, as well as the cost of compliance with future environmental regulations.

We had established a provision for recovery of potential environmental liabilities in the amount of R$254.0 million as of December 31, 2016.

Compliance with Environmental Laws in Brazil

The Brazilian government enacted an Environmental Crimes Law in 1998 that imposes criminal penalties on corporations and individuals causing environmental damage. Corporations found to be polluting can be fined up to R$50.0 million, have their operations suspended, be prohibited from government contracting, be required to repair damage that they cause and lose certain tax benefits and incentives. Executive officers, directors and other individuals may be imprisoned for up to five years for environmental violations.

Our operations are in compliance in all material respects with applicable Brazilian environmental laws and regulations currently in effect. Some environmental studies that we have commissioned have indicated instances of environmental contamination at certain of our plants. In addition, we and certain executive officers of our company and of our subsidiaries have received notices from time to time of minor environmental violations and are or have been subject to investigations or legal proceedings with respect to certain alleged environmental violations. These environmental issues, and any future environmental issues that may arise, could subject us to fines or other civil or criminal penalties imposed by Brazilian authorities. We are addressing all environmental issues of which we are aware, and we believe that none of these issues will have a material adverse effect on our business, financial condition or results of operations.

Operating Permits

Under Brazilian federal and state environmental laws and regulations, we are required to obtain operating permits for our manufacturing facilities. If any of our environmental licenses and permits lapse or are not renewed or if we fail to obtain any required environmental licenses and permits, we may be subject to fines ranging from R$500 to R$50.0 million, and the Brazilian government may partially or totally suspend our activities and impose civil and criminal sanctions on our company or both.

Each State in which we operate has its own environmental standards and state authorities in each state have issued operating permits that must be renewed periodically. Additionally, all projects for the installation and operation of industrial facilities in the Northeastern Complex, Southern Complex, São Paulo Complex and Rio de Janeiro Complex are subject to approval by various environmental protection agencies, which must approve installed projects prior to their commencement of operations and must renew such approval periodically thereafter. State authorities have issued operating permits for all of our plants, as follows: the Northeastern Complex (State of Bahia); Southern Complex (State of Rio Grande do Sul), São Paulo Complex and Cubatão, Santo André, Mauá and Paulínia plants (State of São Paulo), Rio de Janeiro Complex (State of Rio de Janeiro) and our Alagoas plants (State of Alagoas). We are in possession of all necessary permits and do not expect to have difficulty in renewing any of them.

Industrial Waste

Companhia Riograndense de Saneamento, or Corsan, a state-owned sanitation company, operates an integrated system for liquid effluents treatment, or Sitel, in the Southern Complex. Sitel treats wastewater generated by our company and the other petrochemical producers at the Southern Complex at a liquid effluents treatment station located in the Southern Complex. This treatment station also includes a system for the collection of contaminated wastewater and disposal after treatment. We treat wastewater generated by our company at the Rio de Janeiro Complex at a liquid effluents treatment station located in the Rio de Janeiro Complex. This treatment station also includes a system for the collection and disposal of contaminated wastewater. Hazardous solid waste is co-processed in cement kilns or incinerated and other kinds of solid waste are disposed of in landfills at facilities approved by our company.

We treat wastewater generated by our company at the São Paulo Complex at a liquid effluents treatment station located in the São Paulo Complex. This treatment station also includes a system for the collection and disposal of contaminated wastewater. Hazardous waste generated at the São Paulo Complex is incinerated in cement kilns and other kinds of solid waste are disposed of in landfills.

In our Bahia facilities, all wastewater is transported to Cetrel, a wastewater treatment facility. Solid waste is incinerated in cement kilns or incinerators and the remaining waste is disposed of in landfills.

Additionally, we have a series of recycling programs that includerecycling of solid waste and wastewater. We recycle or reuse 26.2% of the solid waste generated by our facilities and 22.9% of the water used in our production processes.

In our Alagoas Complex, organochlorines waste is incinerated producing steam and wastewater. All wastewater is treated at a treatment station located in the complex. Solid waste is separated and disposed of in landfills.

Asbestos

Our largest chlor-alkali plant located in Alagoas previously used asbestos cell technology to produce chlorine and caustic soda. Such technology can no longer be used in new petrochemical production facilities under Brazilian legislation and the global trend has been to ban this technology. As a result, in November 2016, we concluded our shift to newer diaphragm technology and banned asbestos technology from our plants.

Compliance with Environmental Laws in the United States

Our operations in the United States are subject to U.S. federal, state and local laws and regulations governing the discharge of effluents and emissions into the environment; the generation, storage, handling, management, transportation and disposal of hazardous waste, industrial waste and other types of waste; the use, storage, and handling of various types of products and materials; and the protection of human health, safety and the environment. In many instances, specific permits must be obtained for particular types of operations, emissions or discharges. For example, our facilities in Texas, Pennsylvania and West Virginia are required to maintain various permits relating to air quality and treatment of industrial wastewater, and to comply with regulatory requirements relating to waste management. We are in possession of necessary permits to operate our facilities. We believe that our operations in the United States are in compliance in all material respects with applicable U.S. federal, state and local environmental laws and regulations currently in effect.

As with the U.S. petrochemical industry generally, compliance with existing and anticipated laws and regulations increases the overall cost of operating our U.S. plants, including operating costs and capital costs to construct, maintain and upgrade equipment and facilities. These laws and regulations have required, and are expected to continue to require us to make, expenditures of both a capital and an expense nature.

The Clean Air Act, which was last amended in 1990, requires the United States Environmental Protection Agency, or the EPA, to set National Ambient Air Quality Standards, or the NAAQS, for pollutants considered harmful to public health and the environment. The Clean Air Act requires periodic review of the science upon which the standards are based and the standards themselves. NAAQS for ozone and fine particulate matter (referred to as PM2.5), promulgated by the EPA have resulted in identification of nonattainment areas throughout the country, including certain areas within Texas, Pennsylvania and West Virginia, where Braskem America operates facilities. As a result of these nonattainment designations by the EPA, state or local air pollution control agencies are required to apply permitting and/or control requirements intended to reduce emissions of ozone precursors (nitrogen oxides and volatile organic compounds), and fine particles (including PM2.5 precursors), in order to demonstrate attainment with the applicable NAAQS. Such requirements may include imposition of offset requirements, and could result in enhanced emission control standards. In addition, in 2015 the EPA reevaluated the sufficiency of the current PM2.5 NAAQS. This reevaluation could result in more stringent ambient standards, which could in turn translate into additional state-specific requirements to further reduce allowable emission rates for PM2.5 or its precursor pollutants. In October 2016, the EPA lowered the primary and secondary NAAQS for ozone from 0.075 ppm to 0.070 ppm. Such state-specific requirements would become applicable, if at all, following a multi-year process. Regulations implementing this change will likely not be promulgated for several years.

In addition to permitting and/or control requirements that may result from the implementation of the NAAQS at the state or local level, the EPA may promulgate new or revised federal New Source Performance Standards or National Emission Standards for Hazardous Air Pollutants that would apply directly to certain facility operations and may require the installation or upgrade of control equipment in order to satisfy applicable emission limits and/or operating standards under these regulatory programs. The EPA s currently-proposed regulations in this area would not specifically apply to Braskem America s operations.

Table of Contents

Additionally, there are various legislative and regulatory measures to address greenhouse gas emissions which are in various stages of review, discussion or implementation by Congress and the EPA. In October 2015, the EPA finalized new regulations (known as the Clean Power Plan) aimed at lowering greenhouse gas emissions from existing, new and reconstructed electric generating units. In February 2016, the Supreme Court stayed implementation of the Clean Power Plan pending judicial review. While it is currently not possible to predict the final impact, if any, that these regulations may have on Braskem America or the U.S. petrochemical industry in general, they could result in increased utility costs to operate our facilities in the United States. In addition, future regulations limiting greenhouse gas emissions of carbon content of products, which target specific industries such as petrochemical manufacturing could adversely affect our ability to conduct Braskem America s business and also may reduce demand for its products. The EPA s currently-proposed regulations in this area would not specifically apply to Braskem America s operations.

Environmental Regulation in Germany and the European Union

Our operations in Germany are subject to German federal, state and local laws and regulations governing the discharge of effluents and emissions into the environment and the handling and disposal of industrial waste and otherwise relating to the protection of the environment and waste management. Our operations in Germany are in compliance in all material respects with applicable German federal, state and local environmental laws and regulations currently in effect.

As with the petrochemical industry in the European Union generally, compliance with existing and anticipated German laws and regulations increases the overall cost of operating our European business, including operating costs and capital costs to construct, maintain and upgrade equipment and facilities. These laws and regulations have required, and are expected to continue to require us to make expenditures of both a capital and an expense nature.

At our Schkopau and Wesseling, Germany facilities, we are required to maintain air, radiation, waste water and waste management permits from the German government and local agreements relating to the treatment of industrial wastewaters. We are in possession of all necessary permits.

Furthermore, our Wesseling, Germany facility is subject to existing European greenhouse gas regulations and a cap and trade program relating to emissions. We have purchased sufficient carbon dioxide emissions permits for its operations until 2018, provided it operates under normal business conditions. We will purchase any additional permits that may be required on the emission trade market. We are not aware of any new environmental regulations that would affect our European operations. Accordingly, we cannot estimate the potential financial impact of any future European Union or German environmental regulations.

Environmental Regulation in Mexico

Our operations in Mexico are subject to several environmental laws and regulations concerning human health, the handling and disposal of solid and hazardous wastes and discharges of pollutants into the air, soil and water. Under Mexican law, Braskem Idesa is required to obtain environmental and operating permits for the operation of its Mexico Complex. We believe that our operations in Mexico are in compliance in all material respects with applicable Mexican federal, state and local environmental laws and regulations currently in effect.

Property, Plant and Equipment

Our properties consist primarily of petrochemical production facilities in:

Camaçari in the State of Bahia;

Triunfo in the State of Rio Grande do Sul;

Duque de Caxias in the State of Rio de Janeiro;

São Paulo, Paulínia, Cubatão, Santo André and Mauá in the State of São Paulo;

Table of Contents

Maceió and Marechal Deodoro in the State of Alagoas;

the United States in La Porte, Freeport and Seadrift, Texas, Marcus Hook, Pennsylvania, Neal, West Virginia;

Germany in Schkopau and Wesseling; and

Coatzacoalcos in Mexico.

For more information, see note 13 to our consolidated financial statements included elsewhere in this annual report.

Our principal executive offices are located in São Paulo in the State of São Paulo, and we have an administrative support office in the City of Salvador in the State of Bahia. We also have equity interests in investments located in other parts of the country. We own all our production facilities, but we generally rent our administrative offices.

The following table sets forth our properties as of December 31, 2016 by location of facilities, products produced and size of plant.

Type of Product or Service	**Location of Facilities**	**Size of Plant (in hectares)(1)**
Basic petrochemicals	Triunfo	152.8
Basic petrochemicals	Santo André	74.1
Basic petrochemicals	Camaçari	65.5
Basic petrochemicals	Duque de Caxias	53.0
Basic petrochemicals	Mexico	23.6
Polypropylene	Paulínia	39.7
Polyethylene	Triunfo	30.5
Polyethylene	Camaçari	24.5
Polyethylene	Cubatão	17.6
Polyethylene	Santo André	15.8
Polyethylene	Duque de Caxias	15.0
Polyethylene	Mexico	14.9
Polypropylene	La Porte, Texas	87.0
Polypropylene	Neal, West Virginia	27.1
Polypropylene	Mauá	15.8
Polypropylene	Duque de Caxias	15.0
Polypropylene	Camaçari	13.2
Polypropylene	Triunfo	10.0
Polypropylene	Marcus Hook, Pennsylvania	6.9
Polypropylene	Freeport, Texas	8.9
Polypropylene	Seadrift, Texas	2.5
Polypropylene	Schkopau, Germany	3.7
Polypropylene	Wesseling, Germany	26.0

Caustic soda/chlorine	Maceió	15.0
PVC/caustic soda/chlorine	Camaçari	12.6
PVC	Marechal Deodoro	186.7
Distribution Center	Vila Prudente/Capuava	3.2

(1) One hectare equals 10,000 square meters.

We believe that all of our production facilities are in good operating condition. As of December 31, 2016, the consolidated net book value of our property, plant and equipment was R$29,336.7 million.

Table of Contents

The following properties are mortgaged or pledged to secure certain of our financial transactions: (1) our basic petrochemicals plant and our polyethylene plant located in the Southern Complex; (2) our chlor-alkali plant and PVC plant located in the Northeastern Complex; (3) our basic petrochemicals plant and our polyethylene plant located in São Paulo Complex; (4) our chlor-alkali plant and PVC plant located in the State of Alagoas; (5) our basic petrochemicals plant, our polyethylene plant and our polypropylene plant located in the Rio de Janeiro Complex; and (6) our basic petrochemical plant and our polyethylene plants located in Mexico.

Insurance

In addition to the policies described below for our Brazilian and international operations, we maintain other insurance policies for specific risks, including directors and officers liability coverage, workers compensation, employers practice liability, automotive, marine cargo and charterer s liability insurance, among others.

We do not anticipate having any difficulties in renewing any of our insurance policies and believe that our insurance coverage is reasonable in amount and consistent with industry standards applicable to chemical companies operating globally.

Operations in Brazil, the United States and Germany

We carry insurance for all our plants against material damage and consequent business interruption through comprehensive all risk insurance policies.

The all risks insurance program for our plants provides for a total replacement value of US$27.8 billion for property damage. This insurance program is underwritten through separate policies in Brazil, Mexico, the United States and Germany by large insurance companies. These policies are in place until October 2018.

Set forth is a table with additional information related to our all risk insurance policies.

Policy / Region US$ bn	Value at risk - Property Damage	Combined Damage and Interruption Limit	Property Business	Comments
Brazil	21.7	3.375		Limit increased from US$ 2 bn to US$ 3.375 bn.
Mexico	4.4	3.153		Natural Hazard Limit increased from US$ 1.5 bn to US$ 2bn.
USA and Germany	1.7	0.33		Limit increased from US$ 250 million to US$ 330 million; Limit for flood and wind and named storm of US$ 300 million in the aggregate and US$ 200 million per event.

Our policies provide coverage for losses that arise from accidents relating to fire, explosion and machinery breakdown, among others, and consequential business interruption, with maximum indemnity periods ranging from 12 to 33 months, depending on the plant and/or coverage.

As part of our program, we also have third-party liability insurance for our operations, which cover losses for damages caused to third parties from our operations and products, including environmental damage caused by pollution. These policies have a maximum aggregate limit of US$300 million for Brazil, the United States and Germany.

Table of Contents

The material damage insurance for our plants provides coverage for losses due to accidents resulting from fire, explosion and machinery breakdown, among others. This coverage has a maximum indemnification limit of US$2 billion per event (combined material damage and business interruption coverage) for the Brazilian plants and US$250 million (combined material damage and business interruption coverage, excluding flood and earthquake damages, which have an indemnity limit of US$200 million per event) for our plants in the United States and Germany. Our policies have deductibles ranging from US$250,000 to US$20 million, depending on the plant and/or coverage.

The business interruption coverage under our policies provides coverage for losses resulting from interruptions due to any material damage covered by the property policy. The losses are covered with maximum indemnity periods ranging from 12 to 24 months and deductibles ranging from 45 to 90 days, depending on the plant and/or coverage.

As a part of our insurance program, we also have a third-party liability policy for our operations, which covers losses for damages caused to third parties from our operations and products, including sudden environmental pollution. This policy has a maximum indemnification limit of US$300 million per occurrence subject to a US$250,000 deductible.

Operations in Mexico

We have an insurance program in force for our operation in Mexico, which is comparable to existing programs for large companies in the industry throughout the world. This program includes: (1) property and business interruption coverage up to an aggregate amount of US$3,153 million, (2) terrorism coverage up to a limit of US$1,212 million, (3) marine cargo coverage up to a limit per shipment of US$6 million, (4) general liability with indemnity limit of US$210 million per event and (5) pollution liability with a maximum indemnification limit of US$50 million.

Compliance

We have adopted a Policy on Compliance in Acting Ethically with Integrity and Transparency, and several internal policies designed to guide our management, employees and counterparties and reinforce our principles and rules for ethical behavior and professional conduct. We maintain an Ethics Line managed by a third party available for employees and non-employees. Every whistleblower complaint is investigated and submitted for evaluation by our Ethics Committee.

Following our discovery of vulnerabilities in our internal controls in connection with the Investigation, we have designed and implemented remediation efforts to improve and evolve our Global Governance and Compliance system, including a series of efforts designed to ensure that every vulnerability that permitted the occurrence of the material weaknesses in our internal control over financial reporting described in Item 15. Controls and Procedures is mitigated. We expect such measures to be implemented and producing the desired effects by the end of 2017. We have taken the following measures, among others: (a) established the Compliance Committee (as defined below), (b) hired a Chief Compliance Officer (as defined below) and increased staffing and resources for our Internal Controls, Risk Management, Compliance and Internal Audit departments, (c) created an Internal Audit department, (d) incorporated anti-corruption clauses in our contracts with third-parties, (e) adopted the Policy on Compliance in Acting Ethically with Integrity and Transparency, (f) developed and implemented training programs for our directors, senior management and other employees, (g) enhanced vendor data, due diligence, procurement and payment procedures and associated controls, and (h) redesigned our process for monitoring in-transit inventory of raw materials, including naphtha. Furthermore, we implemented a new set of controls in the fourth quarter of 2016 that improved the processes in connection with manual journal entries, monitoring of payments of commissions and ledger accounts. We have also taken actions to implement controls within the process of posting entries in the inventory and trade payable balance accounts for naphtha imports processed by Braskem Netherlands. Finally, we have improved the internal controls of monitoring of debits obligations in Braskem Idesa. We believe that these steps, taken together, will provide additional supervision, approval and review of accounting transactions and will enable us to better prevent and detect potential issues in our internal controls. For more information, see Item 6. Directors, Senior Management and Employees Directors and Senior Management and Item 15. Controls and Procedures.

60

Table of Contents

ITEM 4A. UNRESOLVED STAFF COMMENTS

Not Applicable.

Table of Contents

ITEM 5. OPERATING AND FINANCIAL REVIEW AND PROSPECTS

The following discussion of our financial condition and results of operations should be read in conjunction with our audited consolidated financial statements as of December 31, 2016 and 2015 and for the three years ended December 31, 2016, included in this annual report, as well as with the information presented under Presentation of Financial and Other Information and Item 3. Key Information Selected Financial and Other Information.

The following discussion contains forward-looking statements that involve risks and uncertainties. Our actual results may differ materially from those discussed in the forward-looking statements as a result of various factors, including those set forth in Cautionary Statement with Respect to Forward-Looking Statements and Item 3. Key Information Risk Factors.

Overview

Our results of operations for the years ended December 31, 2016, 2015 and 2014 have been influenced, and our results of operations will continue to be influenced, by a variety of factors, including:

- Brazil s GDP, which contracted 3.6% in 2016, as compared to a contraction of 3.8% in 2015 and growth of 0.1% in 2014, which affects the demand for our products and, consequently, our domestic sales volume;

- the U.S. GDP, which expanded 1.6% in 2016, as compared to growth of 2.6% in 2015 and 2.4% in 2014, which affects the demand for our products and, consequently, our domestic sales volume;

- Europe s GDP, which expanded 1.7% in 2016, as compared to growth of 2.0% in 2015 and 0.9% in 2014, which affects the demand for our products and, consequently, our domestic sales volume;

- the expansion of global production capacity for the products that we sell and the growth rate of the global economy;

- the international market price of naphtha, our principal raw material, expressed in U.S. dollars, which has a significant impact on the cost of producing our products and which has been volatile during the three years ended December 31, 2016, fluctuating in a range between US$293 and US$462 per ton during 2016, US$387 and US$551 per ton during 2015 and US$492 and US$952 per ton during 2014;

- the average domestic prices of our principal products expressed in U.S. dollars, which fluctuate to a significant extent based on international prices for these products and which also have a high correlation to our raw material costs;

- our crackers capacity utilization rates, which increased in 2016 as result of the improvements in processes and the investments made over recent years, as well as our capacity to export any surplus not absorbed by

Brazil s domestic market;

government industrial policy;

sales outside Brazil, which remained stable at R$23.1 billion in 2016 from R$23.2 billion in 2015;

changes in the *real*/U.S. dollar exchange rate, including the appreciation of the *real* against the U.S. dollar by 16.5% in 2016, as compared to depreciation of 47.0% in 2015 and 13.4% in 2014;

the level of our outstanding indebtedness, fluctuations in benchmark interest rates in Brazil, which affect our interest expenses on our *real*-denominated floating rate debt and financial income on our cash and cash equivalents, and fluctuations in the LIBOR rate, which affect our interest expenses on our U.S. dollar-denominated floating rate debt;

- the inflation rate in Brazil, which was 7.2% in 2016, 10.7% in 2015 and 3.8% in 2014, in each case, as measured by the IGP-DI, and the effects of inflation on our operating expenses denominated in *reais* and our *real*-denominated debt that is indexed to take into account the effects of inflation or bears interest at rates that are partially adjusted for inflation; and

- the tax policies and tax obligations.

Our financial condition and liquidity is influenced by various factors, including:

- our ability to generate cash flows from our operations and our liquidity;

- prevailing Brazilian and international interest rates and movements in exchange rates, which affect our debt service requirements;

- our ability to continue to be able to borrow funds from international and Brazilian financial institutions and to sell our debt securities in the international and Brazilian securities markets, which is influenced by a number of factors discussed below;

- our capital expenditure requirements, which consist primarily of maintenance of our operating facilities, expansion of our production capacity and research and development activities; and

- the requirement under Brazilian Corporate law and our by-laws that we pay dividends on an annual basis in an amount equal to at least 25% of our adjusted net income, unless our board of directors deems it inconsistent with our financial position and the decision of our board of directors is ratified by our shareholders.

Financial Presentation and Accounting Policies

Presentation of Financial Statements

We have prepared our audited consolidated financial statements as of December 31, 2016 and 2015 and for each of the years ended December 31, 2016, 2015 and 2014 in accordance with IFRS.

Our consolidated financial statements have been prepared in accordance with IFRS 10 (Consolidated Financial Statements).

Operating Segments and Presentation of Segment Financial Data

We believe that our organizational structure as of December 31, 2016 reflected our business activities and corresponded to our principal products and production processes. As of December 31, 2016, we had six production business units and reported our results by six corresponding segments to reflect this organizational structure:

Basic Petrochemicals This segment includes (1) our production and sale of basic petrochemicals at the Northeastern Complex, the Southern Complex, ,the São Paulo Complex and the Rio de Janeiro Complex, and (3) our supply of utilities produced at these complexes to second generation producers, including some producers owned or controlled by our company.

Polyolefins This segment includes the production in Brazil and sale of polyethylene, including the production of green polyethylene from renewable resources, and polypropylene by our company.

USA and Europe This segment includes the operations of our five polypropylene plants in the United States and the operations of our two polypropylene plants in Germany.

Mexico This segment includes the operations of our polyethylene plants in the Mexican state of Veracruz.

Vinyls This segment includes our production and sale of PVC and caustic soda.
We have included a reconciliation of the results of operations of our segments, as they existed as of December 31, 2016, to our consolidated results of operations under Results of Operations below.

Significant accounting policies

The presentation of our financial condition and results of operations in conformity with IFRS requires us to make certain judgments and estimates regarding the effects of matters that are inherently uncertain and that impact the carrying value of our assets and liabilities. Actual results could differ from these estimates. In order to provide an understanding about how we form our judgments and estimates about certain future events, including the variables and assumptions underlying the estimates, and the sensitivity of those judgments to different variables and conditions, we have included comments related to the following significant accounting policies under IFRS:

Impairment of property, plant and equipment and non-financial assets. Our goodwill based on expected future profitability as of December 31, 2016 was R$2,058.9 million. The recoverable value of property, plant and equipment and other noncurrent assets including intangible assets (other than goodwill based on expected future profitability) are reviewed for impairment whenever events or changes in circumstances indicate that the carrying amount may not be recoverable. The recoverable value of goodwill based on expected future profitability is reviewed for impairment on an annual basis. An impairment loss is recognized for the amount by which the asset s carrying amount exceeds its recoverable amount. The recoverable amount is the higher of (1) an asset s fair value less costs to sell; and (2) its value in use. For the purposes of assessing impairment, assets are grouped at the lowest level for which there are separately identifiable cash flows that can be cash-generating units or operating segments. Non-financial assets other than goodwill that suffered an impairment are reviewed for possible reversal of the impairment at each reporting date. Our impairment tests of goodwill consider the operations at (1) the Southern Complex in the Basic Petrochemicals Unit, (2) the Polyolefins Unit and (3) the Vinyls Unit.
At the end of 2016, Braskem conducted this test using the value in use method (discounted cash flow) and did not identify any loss, as shown in the table below:

	Allocated goodwill	Cash flow (CF)	Book value (i)	CF/Book value
CGU and operating segments				
CGU - UNIB - South	926,854	7,312,051	1,991,908	3.7
Operating segment - Polyolefins	939,667	26,858,040	5,144,650	5.2
Operating segment - Vinyls	192,353	3,282,147	2,979,167	1.1

(i) This item includes, in addition to goodwill, the long-lived assets and working capital of each operating segment.
The assumptions adopted to determine the discounted cash flow are described in note 3.4(b) to our audited consolidated financial statements. We used a WACC of 13.08% per annum for our Basic Petrochemicals Unit and our Polyolefins Unit and an adjusted WACC of 14.4% per annum for the Vinyls Unit, which was adopted for the 5 years of the projection and to reflect the tax incentive described in note 29(a). To calculate the perpetuity of this business unit, the same discount rate adopted by the other business units was used. The WACC adopted for 2015 was 13.91% per annum. The inflation rate adopted for perpetuity was 4.7%.

Given the potential impact on cash flows of the discount rate and perpetuity , Braskem conducted a sensitivity analysis based on changes in these variables, with cash flows shown in the table below:

64

	+0.5% on discount rate	-0.5% on perpetuity
CGU and operating segments		
CGU - UNIB - South	6,978,365	6,951,557
Operating segment - Polyolefins	25,752,618	25,663,810
Operating segment - Vinyls	3,160,037	3,167,252

The main assumptions used for projecting cash flows are related to the projections for macroeconomic indicators, international prices and global and local demand in the countries where Braskem has production plants.

The macroeconomic indicators are provided by a widely recognized consulting firm and include items such as: exchange, inflation and interest rates, as well as other indicators.

The prices of key petrochemical products are obtained from projections formulated by an international consulting firm. However, the final prices take into consideration meetings of specific internal committees and the knowledge of our experts in the formulation of price references for each market. For the projected period, most of the prices projected internally were more conservative than those originally projected by the international consulting firm.

As in the case of prices, global demand projections also are contracted from a specific consulting firm and, in the markets where we operate directly, are taken into account in determining local demand.

In the Vinyls Unit, which main product is PVC, the amount of projected cash flow exceeded the book value of the assets by 10%. The main variables affecting this business are related to fluctuations in the exchange rate, international spreads (especially those related to the prices of naphtha, PVC and caustic soda) and local demand in Brazil. Fluctuations in these variables that differ from our projections could lead to cash flow that is lower than the value of the assets. As a result, a reduction in the PVC spread in *reais* (taking into consideration the combined effect of exchange rates and international prices) of 4.3% or a reduction in local demand of 12.2% would result in a cash flow equivalent to the book value of the assets.

We did not record any impairment charges in the years ended December 31, 2016, 2015 and 2014. As of December 31, 2016, we do not believe that any of our cash generating units were at risk of impairment.

Valuation of derivative instruments. We use swaps, non-deliverable forwards and other derivative instruments to manage risks from changes in foreign exchange, interest rates and commodities prices. We record these instruments at their estimated fair market value based on market quotations for similar instruments, and based on standard mark-to-market practices, which take into account reliable market curves for interest rates, foreign exchange rates and commodities prices.

Deferred Income Tax and Social Contribution. We recognize deferred income tax and social contribution assets and liabilities based on the differences between the financial statement carrying amounts and the tax basis of assets and liabilities using prevailing tax rates. We regularly review any deferred income tax and social contribution assets for recoverability and reduce their carrying value based on our historical taxable income, projected future taxable income and the expected timing of any reversals of existing temporary differences. If one of our subsidiaries operates at a loss or is unable to generate sufficient future taxable income, or if there is a material change in the actual effective tax rates or the time period within which the underlying temporary differences become taxable or deductible, we evaluate the need to reduce partially or completely the carrying value of our deferred income tax and social contribution assets.

Provisions and Contingencies. We are currently involved in numerous judicial and administrative proceedings, as described under Item 8. Financial Information Legal Proceedings, and in notes 22 and 23 to our audited consolidated financial statements. We record accrued liabilities for provisions that we deem probable of creating an adverse effect on our results of operations or financial condition. For the main contingencies that we deem possible of creating an adverse effect on our results of operations or financial condition, we disclose relevant information regarding the proceedings in accordance with IAS 37. Additionally, the contingencies assumed in a business combination for which an unfavorable outcome is considered possible are recognized at their fair value on the acquisition date. We believe that these judicial and administrative proceedings are properly recognized or disclosed in our financial statements.

Pension plans. For defined benefit plans that we sponsor, we calculate our funding obligations based on calculations performed by independent actuaries using assumptions provided by the plan s management, such as interest rates investment returns, and levels of inflation, and provided by the actuaries, such as mortality rates and future employment levels. Collectively, these assumptions directly impact our liability for accrued pension costs and the amounts we record as pension costs, although individual assumptions are not expected to be material.

Useful life of long-lived assets. We recognize the depreciation of long-lived assets based on their estimated useful life, which in turn is based on industry practices and previous experience. However, the actual useful life can vary based on the current state of technologies at each unit. The useful life of the long-lived asset also affects the impairment testing. We do not believe that there are any indications of material change in the estimates and assumptions used in the calculation or the impairment losses of long-lived assets. However, if the actual results are not consistent with the estimates and assumptions used in the future cash flows estimating the fair value of the assets, we could be exposed to potentially significant losses.

Valuation of assets and liabilities in business combinations. We have entered into certain business combinations that we have accounted for in accordance with IFRS. In this regard, we hire and supervise the specialized service providers to evaluate the fair value of the assets acquired and liabilities assumed. We allocate the cost of the entity acquired to the assets acquired and liabilities assumed, on a fair value basis, estimated at the date of acquisition. Any difference between the cost of the acquisition and the fair value of the assets acquired and liabilities assumed is recorded as goodwill or a gain on bargain purchase. We exercise significant judgment in the process of identifying the tangible and intangible assets and liabilities, valuing such assets and liabilities in determining the remaining useful life. Assumptions used to value those assets and liabilities include estimates of discounted cash flows or discount rates and may result in a difference between the estimated and actual values. If the actual results are not consistent with the estimates and assumptions used, we could be exposed to potentially significant losses.

Principal Factors Affecting Our Results of Operations

Growth of Brazil s GDP and Domestic Demand for Our Products

Our sales in Brazil represented 51.7% of our net sales revenue in the year ended December 31, 2016. Thus, we are significantly affected by economic conditions in Brazil. Our results of operations and financial condition have been, and will continue to be, affected by the growth rate of Brazilian GDP because our products are used in the manufacture of a wide range of consumer and industrial products.

The following table sets forth the growth rates of Brazilian GDP and domestic apparent consumption for polyethylene, polypropylene and PVC for the periods presented.

	Year Ended December 31,				
	2016	**2015**	**2014**	**2013**	**2012**
Brazilian GDP	(3.6)%	(3.8)%	0.1%	3.0%	1.9%
Brazilian consumption of polyethylene	(1.3)%	(3.2)%	0.6%	8.0%	1.3%
Brazilian consumption of polypropylene	1.1%	(8.3)%	(2.6)%	4.6%	3.8%
Brazilian consumption of PVC	(2.3)%	(16.0)%	(2.3)%	12.5%	0.9%

Source: Brazilian government and Tendencias Consultoria.

Brazilian GDP growth has fluctuated significantly, and we anticipate that it will likely continue to do so. Our management believes that economic growth in Brazil should positively affect our future net sales revenue and results of operations. However, continued low growth or a recession in Brazil would likely reduce our future net sales revenue and have a negative effect on our results of operations.

Table of Contents

In 2014, the Brazilian economy continued to face challenges, registering low GDP growth. The decrease in consumer confidence, demonstrated by the deceleration of consumption, and weaker external demand affected most economic sectors, including the industrial and services sectors, which registered decreased growth as compared to 2013. As a result, Brazilian consumption volumes of thermoplastic resins declined by 2.6% for polypropylene and 2.3% for PVC. Brazilian consumption volumes of polyethylene remained stable.

In 2015, Brazil was affected by the continued political crisis, lower-than-expected GDP growth in China (6.9%, the lowest in 25 years), declines in international commodity prices and weakening currencies in emerging economies, led by the *real*. Key sectors in the Brazilian economy, such as services, construction and infrastructure, experienced a slowdown which affected the labor market by reducing income levels and consequently household spending and investment. According to the IBGE, Brazil s GDP contracted 3.8% in 2015. As a result, Brazilian consumption volumes of thermoplastic resins declined by 3.2% for polypropylene, 3.8% for polyethylene and 16.0% for PVC.

In 2016, indicators for economic growth in Brazil were weaker than expected, with negative GDP growth for the year, primarily due to lower borrowing as a result of higher levels of debt held by households and businesses. These factors, combined with the persistent bottlenecks contributing to Brazil cost and the prolonged political and institutional crisis, affected the country s economy, which resulted in lower demand for resins in the Brazilian market. As a result, Brazilian consumption volumes of thermoplastic resins declined by 2.3% for PVC and 1.3% for polyethylene.

Brazil s Macroeconomic Environment

The following table shows data inflation, interest rates and the U.S. dollar exchange rate for and as of the periods indicated.

	December 31,			
	2016	**2015**	**2014**	**2013**
Real growth in gross domestic product	(3.6)%	(3.8)%	0.1%	2.3%
Inflation (IGP-M)(1)	7.2%	10.5%	3.7%	5.5%
Inflation (IPCA)(2)	6.2%	10.7%	6.4%	5.9%
CDI rate(3)	13.6%	14.1%	11.6%	9.8%
LIBOR rate(4)	0.9%	0.6%	0.3%	0.2%
Depreciation of the real vs. U.S. dollar	4.3%	41.8%	9.0%	10.5%
Period-end exchange rate US$1.00	R$ 3.259	R$ 3.905	R$ 2.656	R$ 2.343

Sources: Fundação Getúlio Vargas, the Central Bank and Bloomberg

(1) Inflation (IGP-M) is the general market price index measured by the Fundação Getúlio Vargas.
(2) Inflation (IPCA) is a broad consumer price index measured by the Instituto Brasileiro de Geografia e Estatística.
(3) The CDI rate is average of inter-bank overnight rates in Brazil (as of the last date of the respective period).
(4) Three-month U.S. dollar LIBOR rate as of the last date of the period. The LIBOR rate is the London inter-bank offer rate.

Effects of Fluctuations in Exchange Rates between the* Real *and the U.S. Dollar

Our results of operations and financial condition have been, and will continue to be, affected by the rate of depreciation or appreciation of the *real* against the U.S. dollar because:

a substantial portion of our net sales revenue is denominated in or linked to U.S. dollars;

our costs for some of our raw materials, principally naphtha and certain catalysts required in our production processes, are incurred in U.S. dollars or are linked to U.S. dollars;

we have operating expenses, and make other expenditures, that are denominated in or linked to U.S. dollars; and we have significant amounts of U.S. dollar-denominated liabilities that require us to make principal and interest payments in U.S. dollars.

Virtually all of our sales are of petrochemical products for which there are international market prices expressed in U.S. dollars. We generally attempt to set prices that take into account (1) the international market prices for our petrochemical products, and (2) in Brazil, variations in the *real*/U.S. dollar exchange rate. As a result, although a significant portion of our net sales revenue is denominated in *reais*, substantially all of our products are sold at prices that are based on international market prices that are quoted in U.S. dollars.

Fluctuations in the *real* will affect the cost of naphtha and other U.S. dollar-linked or imported raw materials. The price of naphtha, raw material, is linked to the U.S. dollar. The pricing formula included in the contract with Petrobras under which we purchase naphtha for our basic petrochemical plants in the Northeastern Complex and in the Southern Complex includes a factor that adjusts the price to reflect the *real*/U.S. dollar exchange rate.

The depreciation of the *real* against the U.S. dollar generally increases the production cost for our products and we generally attempt to increase the Brazilian prices for our products in *reais* (to the extent possible in light of then-prevailing market conditions in Brazil), which may result in reduced sales volumes of our products. To the extent that our price increases are not sufficient to cover the increased costs for raw materials, our operating margin decreases. Conversely, the appreciation of the *real* against the U.S. dollar generally decreases the production cost for our products and we generally decrease the Brazilian prices for our products in *reais*, which may result in increased sales volumes of our products. In periods when the *real*/U.S. dollar exchange rate is highly volatile, there is usually a lag between the time when the U.S. dollar appreciates or depreciates and the time when we are able to pass on increased costs, or are required to pass on reduced costs, in *reais* to our customers in Brazil. These pricing discrepancies decrease when the *real*/U.S. dollar exchange rate is less volatile.

Braskem can enter into financial derivatives transactions to mitigate exchange rate risk associated with exposure to costs in *reais*. Those operations can include call and put options and related strategies. For example, Braskem may apply a hedging strategy referred to as collar, which is composed of the purchase of a put option associated with the simultaneous sale of a call option, where both options having the same maturity. In this case, if the *real* depreciates and the strike price of the call exceeds the exchange rate of the option s exercise date, we may incur significant financial losses. However, since those strategies will be implemented only for non-speculative purposes (in accordance with our financial policy), potential losses on derivatives transactions will be offset by more competitive fixed costs in *reais*.

Our consolidated U.S. dollar-denominated indebtedness represented 85.0% of our outstanding indebtedness as of December 31, 2016. As a result, when the *real* depreciates against the U.S. dollar:

the interest costs on our U.S. dollar-denominated indebtedness increase in *reais*, which adversely affects our results of operations in *reais*;

the amount of our U.S. dollar-denominated indebtedness increases in *reais*, and our total liabilities and debt service obligations in *reais* increase; and

our financial expenses tend to increase as a result of foreign exchange losses that we must record, mitigated by our decision to designate, on May 1, 2013, part of our U.S. dollar-denominated liabilities as a hedge for our future exports.

Appreciation of the *real* against the U.S. dollar has the converse effects.

Export sales and sales by our USA and Europe Unit, which enable us to generate receivables payable in foreign currencies, tend to provide a hedge against a portion of our U.S. dollar-denominated debt service obligations, but they do not fully match them. To further mitigate our exposure to exchange rate risk, we try, where possible, to enter into trade finance loans for our working capital needs, which funding is generally available at a lower cost because it is linked to U.S. dollar exports.

Table of Contents

Effects of Brazilian Inflation

Brazilian inflation affects our financial performance by increasing some of our operating expenses denominated in *reais* (and not linked to the U.S. dollar). A significant portion of our costs of sales and services rendered, however, are denominated in or linked to the U.S. dollar and are not substantially affected by the Brazilian inflation rate. Some of our *real*-denominated debt is indexed to take into account the effects of inflation. Under this debt, the principal amount generally is adjusted with reference to the General Price Index Market (*Índice Geral de Preços Mercado*), an inflation index, so that inflation results in increases in our financial expenses and debt service obligations. In addition, a significant portion of our *real*-denominated debt bears interest at the TJLP or the CDI rate, which are partially adjusted for inflation.

Effect of Sales Outside Brazil on Our Financial Performance

We have significant production capacity located outside of Brazil from our plants located in the United States, Germany and Mexico.

During the year ended December 31, 2016, 48.4% of our net sales revenue was derived from sales of our products outside Brazil as compared with 49.4% during 2015 and 44.0% during 2014. Net sales revenues derived from sales outside Brazil decreased by 0.3% during 2016, and increased by 16.7% during 2015 and 13.4% during 2014.

During the year ended December 31, 2016, sales to customers in countries in the Americas (other than Brazil) accounted for 57.9% of our sales outside Brazil. During the year ended December 31, 2016, sales to customers in Europe accounted for 16.4% of our sales outside Brazil, and sales to customers in East Asia and Other accounted for 25.7% of our sales outside Brazil.

During the past several years, as the relative cost of naphtha and gas as feedstocks for petrochemical crackers has diverged, the profit margins of many naphtha crackers, including ours, have decreased as crackers using gas as feedstock have become the low-cost producer in the global markets. However, since gas crackers are unable to produce the co-products and byproducts that naphtha crackers generate, such as propylene, butadiene and BTX products, the prices of these products in the international markets have increased. As a result of the increased prices available for most of these co-products and byproducts, our net sales revenue from export sales of these products increased.

Cyclicality Affecting the Petrochemical Industry

Global consumption of petrochemical products has increased significantly over the past 30 years. Due to this growth in consumption, producers have experienced periods of insufficient capacity for these products. Periods of insufficient capacity, including some due to raw material shortages, have usually resulted in increased capacity utilization rates and international market prices for our products, leading to increased domestic prices and operating margins. These periods have often been followed by periods of capacity additions, which have resulted in declining capacity utilization rates and international selling prices, leading to declining domestic prices and operating margins.

We expect that these cyclical trends in international selling prices and operating margins relating to global capacity shortfalls and additions will likely persist, principally due to the continuing impact of four general factors:

- cyclical trends in general business and economic activity produce swings in demand for petrochemicals;

during periods of reduced demand, the high fixed cost structure of the capital intensive petrochemicals industry generally leads producers to compete aggressively on price in order to maximize capacity utilization;

significant capacity additions, whether through plant expansion or construction, can take three to four years to implement and are therefore necessarily based upon estimates of future demand; and as competition in petrochemical products is, in most cases,focused on price, being a low-cost producer is critical to improved profitability. This favors producers with larger plants that maximize economies of scale, but construction of plants with high capacity may result in significant increases in capacity that can outstrip demand growth.

A variety of petrochemical companies have announced plans to build significant additional ethylene production capacity, primarily in Asia, the Middle East and North America. According to IHS, 30.7 million tons of annual global ethylene capacity is scheduled to be commissioned between 2017 and 2021, including approximately 9.3 million tons of annual capacity in China, 2.9 million tons of annual capacity in the Middle East and 11.3 million tons of annual capacity in North America. According to IHS, the majority of the new capacity in China will be based on coal as their principal feedstock. The majority of the new capacity in the Middle East will be based on ethane as their feedstock, either as the only raw material, or with another feedstock for flexible crackers. However, expansions of ethylene capacity are frequently subject to delays, and we cannot predict when the planned additional capacity will be commissioned, if at all.

International pricing pressures increased in 2011 and 2012 as the price differential between naphtha and gas increased and producers using ethane as raw materials were able to maintain competitive margins at sales prices lower than those required by some naphtha based producers. In 2013, the global economy showed signs of recovery, as reflected by the improved performance of the U.S. economy and indications that the euro zone had begun to emerge from crisis. This scenario helped support a recovery in the profitability of the global petrochemical industry, and the spreads for thermoplastic resins and main basic petrochemicals improved during the year. In 2014, world GDP growth fell short of initial forecasts for the year, reflecting the slower growth in emerging economies and in the euro zone. However, the recovery in the U.S. economy and the good performance of other developed markets, such as the United Kingdom, had a positive impact on the world economy in 2014. In 2015 crude oil prices fell sharply, which reduced the competitive advantage of gas-based producers compared to naphtha-based producers.

The combination of the decline in oil prices, and consequently the decline in naphtha prices, the main feedstock used by the global petrochemical industry, which registered an average price in 2016 of US$385 per ton, down 16.6% from 2015, as well as the cancelation and postponements of previously announced petrochemical projects, supported healthy thermoplastics resins spreads.

We believe that the pricing scenario for the short-term is marked by caution. As expected, petrochemical prices have followed the downward trend in naphtha prices, which in turn followed the downward trend in crude oil markets. However, it is expected that the improvement in the world economy will continue to positively influence the demand and profitability of the sector in the short term.

Based on historical growth of demand for polyethylene, polypropylene and PVC, we believe that the additional capacity introduced in the market in 2014, 2015 and 2016 will be absorbed by the market in the medium-term. However, the production generated by this increase in capacity may lead to continued pressure on prices in the international markets and an increase in competition from imports in the Brazilian markets, which could adversely affect our net sales revenues, gross margins and overall results of operations.

Effects of Fluctuations in Naphtha, Ethane, Propane and Propylene Prices

Fluctuations in the international market price of naphtha have significant effects on our costs of goods sold and the prices that we are able to charge our customers for our first and second generation products. Political instability in the Middle East or similar events that may occur in the future may lead to unpredictable effects on the global economy or the economies of the affected regions, have had and may continue to have negative effects on oil production and price volatility, consequently driving naphtha and petrochemical prices higher worldwide.

The price of ethane and propane in the Mont Belvieu region in Texas is used as a reference for our costs of feedstocks. Any future developments that affect the U.S. supply/demand balance for natural gas may adversely affect the Mont Belvieu price of natural gas (including ethane, propane and butane) and increase our production costs or decrease the price of petrochemical products. External factors and natural disasters such as hurricanes, harsh winters or industry developments, such as shale gas exploration, may disrupt the supply of natural gas, thereby increasing the cost, which may materially adversely affect our cost of sales and results of operations.

Effects on Cost of Sales

Naphtha is the principal raw material used by our Basic Petrochemicals Unit and, indirectly, in several of our other business units. Naphtha and condensate accounted for 63.1% of the total cost of sales of our Basic Petrochemicals Unit during 2016. Naphtha accounted for 42.7% of our direct and indirect consolidated cost of sales and services rendered during 2016.

The cost of naphtha varies in accordance with international market prices, which fluctuate depending upon the supply and demand for oil and other refined petroleum products. We purchase naphtha under a long-term supply contract with Petrobras, and we import naphtha from other suppliers through our terminal at Aratú in the State of Bahia and Petrobras terminal at Osório in the State of Rio Grande do Sul. The prices that we pay for naphtha under these arrangements, other than our supply contract with Petrobras, are based on the Amsterdam-Rotterdam-Antwerp market price for naphtha. As a result, fluctuations in the Amsterdam-Rotterdam-Antwerp market price for naphtha have had a direct impact on the cost of our first generation products.

Our contracts with Petrobras provide for naphtha prices based on Amsterdam-Rotterdam-Antwerp (ARA) quotations. The volatility of the quotation of this product in the international market, the *real*/U.S. dollar exchange rate, and the level of carbon disulfide, a contaminant of the naphtha that is delivered, also influence the price of naphtha that we purchase from Petrobras. We believe that these contracts have reduced the exposure of the cost of our first generation products to fluctuations in the Amsterdam-Rotterdam-Antwerp market price for naphtha.

The international price of naphtha has fluctuated significantly in the past, and we expect that it will continue to do so in the future. Significant increases in the price of naphtha and, consequently, the cost of producing our products, generally reduce our gross margins and our results of operations to the extent that we are unable to pass all of these increased costs on to our customers, and may result in reduced sales volumes of our products. Conversely, significant decreases in the price of naphtha and, consequently, the cost of producing our products, generally increase our gross margins and our results of operations and may result in increased sales volumes if this lower cost leads us to lower our prices. In periods of high volatility in the U.S. dollar price of naphtha, there is usually a lag between the time that the U.S. dollar price increases or decreases and the time that we are able to pass on increased, or required to pass on reduced, costs to our customers in Brazil. These pricing discrepancies decrease when the U.S. dollar price of naphtha is less volatile.

We do not currently hedge our exposure to changes in the prices of naphtha because a portion of our sales are exports payable in foreign currencies and linked to the international market prices of naphtha and also because the prices of our polyethylene, polypropylene and PVC products sold in Brazil generally reflect changes in the international market prices of these products.

Effects on Prices of Our Products

The prices that we charge for many of our basic petrochemical products are determined by reference to the European contract prices for these products. Because European producers of basic petrochemical products primarily use naphtha as a raw material, changes in the European contract prices are strongly influenced by fluctuations in international market prices for naphtha. To the extent that our prices are based on the European contract prices for our products, the prices that we charge for these products are significantly influenced by international market prices for naphtha.

We negotiate the prices in *reais* for part of our products, principally polyethylene, polypropylene and PVC, on a monthly basis with our domestic customers. We attempt to revise our prices to reflect (1) changes in the international market prices of these products, which tend to fluctuate in tandem with naphtha prices, especially for polyethylene, and (2) the appreciation or depreciation of the *real* against the U.S. dollar. However, during periods of high volatility in international market prices or exchange rates, we are sometimes unable to fully reflect these changes in our prices in a prompt manner.

The international market prices of our petrochemical products have fluctuated significantly, and we believe that they will continue to do so. Volatility of the price of naphtha and the upward trend in the price of petroleum and naphtha have effects on the price competitiveness of our naphtha-based crackers and our resins. Because pricing trends for naphtha and ethane have diverged in recent years to a greater extent than has been the case historically, producers of ethylene and resin products derived from ethane generally have experienced lower unit raw material costs than naphtha-based producers of these products. As a consequence, significant increases in the pricing differential between naphtha and gas increases the competitiveness of products derived from ethane and may result in pricing pressure in the international markets.

Significant increases in the international market prices of our petrochemical products and, consequently, the prices that we are able to charge, generally increase our net sales revenue and our results of operations to the extent that we are able to maintain our operating margins and increased prices do not reduce sales volumes of our products. Conversely, significant decreases in the international prices of our petrochemical products, and, consequently, the prices that we charge, generally reduce our net sales revenue and our results of operations if we are unable to increase our operating margins or these reduced prices do not result in increased sales volumes of our products.

Capacity Utilization

Our operations are capital intensive. Accordingly, to obtain lower unit production costs and maintain adequate operating margins, we seek to maintain a high capacity utilization rate at all of our production facilities.

The table below sets forth capacity utilization rates with respect to the production facilities for some of our principal products for the periods presented.

	Year Ended December 31,		
	2016	**2015**	**2014**
Ethylene	92%	89%	86%
Polyethylene	89%	87%	80%
Polypropylene	86%	76%	81%
PVC	84%	76%	89%
Polypropylene USA and Europe	100%	98%	92%
PE Mexico (*)	42%		

(*) Mexico complex started in 2016

In 2014, average capacity utilization was affected by (1) the scheduled maintenance shutdown of one of our cracker production lines in the Southern Complex; (2) the scheduled maintenance shutdown at our cracker production line in the São Paulo Complex; (3) a lack of propylene supply at the Rio de Janeiro Complex, and (4) a lack of ethane and propane supply at the Rio de Janeiro Complex.

In 2015, average capacity utilization was affected by (1) improved performance of the complexes in the Northeastern Complex and the Southern Complex; (2) an incident at the complex in São Paulo; and (3) a lack of propylene supply at the Rio de Janeiro Complex, and (4) a lack of ethane and propane supply at the Rio de Janeiro Complex.

In 2016, average capacity utilization was affected by (1) strong operating performance of the crackers, resulting from increased operating efficiency and exports of excess volumes not absorbed, and (2) higher availability of feedstock at the gas-based cracker in Rio de Janeiro.

Effects of Brazilian Industrial Policy

The Brazilian government has a significant influence in some sectors of the domestic economy, including the petrochemical sector in which we operate. The Brazilian government has adopted, or is considering adopting, measures to boost the competitiveness of domestic companies, as described below.

Reintegra

In December 2011, the Brazilian government implemented the Reintegra program, which is designed to improve the competitiveness of Brazilian manufacturers in the export markets by refunding the federal taxes levied on their export sales. As a result of this incentive, exports of third generation products by Brazilian companies have increased therefore increasing Brazilian demand for our products. The original program ended in the end of December 2013. In August 2014, the Brazilian government permanently reinstated Reintegra, the program was established on a permanent basis and with mobile rates, that could vary by up to 5% of the revenue of the companies with exports, with a refund tax rate of 0.1%.In October 2014, the Brazilian government restored the rate to 3.0% until the end of 2015. However, in March 2015, the Brazilian federal government again decreased the rate to 1.0% for 2015 and 2016. In October 2015, according to the Decree 8,543, the Brazilian federal government decreased the refund rate to 0.1% as of December 1, 2015 which remained in effect until December 31, 2016. On August 28, 2017, pursuant to Decree 9,148, that amended the Decree 8,543, the Reintegra rate increased to 2% effective as of January 1, 2017 until December 31, 2018.

Import Tariffs at Local Ports

Historically, tariffs on imports have been established by the federal government. However, in recent years, some Brazilian states established tax benefits to attract imports at local ports in order to raise revenue and develop local port infrastructure, primarily in the form of reductions of ICMS taxes that would otherwise be due to these states. Industry and union leaders alleged that such legislation creates a subsidy for imported products, thereby harming local industry.

On January 1, 2013, legislation took effect reducing the maximum ICMS tax that the state can charge from a rate of 12% to 4% on interstate sales of imported raw materials and other goods that are not wholly or partially manufactured in Brazil. In addition to certain other limited exceptions, this tax reduction does not apply to imported goods that do not have Brazilian-made substitutes. As a result, current tax benefits offered by some Brazilian states for the import of goods in the form of reduced ICMS tax rates have become less attractive.

Pricing and Tariffs

We set prices for ethylene, the principal first generation petrochemical product that we sell to third-party second generation producers, by reference to international market prices. See Basic Petrochemicals Unit Sales and Marketing of Our Basic Petrochemicals Unit. Prices paid by second generation producers for imported first generation petrochemical products partly reflect transportation and tariff costs. We establish the prices of ethylene by-products, such as butadiene, by reference to several market factors, including the prices paid by second generation producers for imported products. Prices paid for such imports also reflect transportation and tariff costs.

Second generation producers, including our company, generally set prices for their petrochemical products by reference to several market factors, including the prices paid by third generation producers for imported products. Prices paid for such imports also reflect transportation and tariff costs.

The Brazilian government has used import tariffs to implement economic policies. As a result, import tariffs imposed on petrochemical products have varied in the past and may vary in the future. Tariffs on imports of first generation petrochemical products are between 0% and 4%, and tariffs on polyethylene, polypropylene and PVC resins are 14.0%.

Imports and exports within the free trade area in South America (Mercado Comum do Sul), or Mercosur, which is composed of Argentina, Brazil, Paraguay and Uruguay, have not been subject to tariffs since December 2001. Imports of suspension PVC from Bolivia, Chile, Colombia, Cuba, Equator, Peru and Venezuela are not subject to tariffs, due to a number of trade agreements. Imports of suspension from Mexico are subject to reduced tariffs of 11.2%, due to a trade agreement. Imports and exports among Mercosur and Colombia, Ecuador e Venezuela are not subject to tariffs due to a trade agreement since 2005.

Imports of suspension PVC from the U.S. and Mexico have been subject to anti-dumping duties of 16.0% and 18.0%, respectively, that were imposed by the Brazilian Foreign Trade Chamber (Câmara de Comércio Exterior), or CAMEX. Since 2008, imports of suspension PVC from China have been also subject to duties of 21.6%, and imports of suspension PVC from South Korea have been subject to duties ranging between 0% and 18.9%, depending on the producer, as a result of the imposition of anti-dumping duties by CAMEX. The duties imposed to imports from U.S. and México are scheduled to expire in 2021, and the duties imposed to imports from China and South Korea are scheduled to expire in 2019.

Additionally, in December 2010, CAMEX imposed an anti-dumping duty of 10.6% on polypropylene imports from the United States. Those measures were renewed in November 2016. In August 2014, the Brazilian government imposed anti-dumping duties on polypropylene imports from South Africa, India and South Korea of 16.0%, 6.4 to 9.9% and 2.4 to 6.3%, respectively. The duties imposed on imports of polypropylene from the United States are scheduled to expire in 2021, and the duties imposed on imports from South Africa, India and South Korea are scheduled to expire in 2019.

In 2015, approximately 26% of Brazilian polyethylene, polypropylene and PVC resins were imported products, which reflected a 12% annual decrease in the volume of resins imported, reflecting the volatility in the U.S. dollar-denominated prices of thermoplastic resins, which triggered an increase in the purchase of thermoplastic resins in Brazil. For more information, see Effects of Brazilian Industrial Policy Import Tariffs at Local Ports.

Increased Import Duties on Polyethylene

As part of its initiative to strengthen domestic manufacturers, on October 1, 2012, the Brazilian government adopted a resolution that increased import duties on 100 products related to various industries, including an increase on the import tariff for polyethylene from 14% to 20%. In October 2013, the Brazilian government reduced the import tariff for polyethylene to the previous level of 14%.

Effect of Level of Indebtedness and Interest Rates

As of December 31, 2016, our total outstanding consolidated indebtedness, net of transaction costs, was R$23,331.1 million. The level of our indebtedness results in significant financial expenses that are reflected in our statement of operations. Financial expenses consist of interest expense, exchange variations of U.S. dollar- and other foreign currency-denominated debt, foreign exchange losses or gains, and other items as set forth in note 15 to our audited consolidated financial statements. In the year ended December 31, 2016, we recorded total financial expenses of R$3,571.0 million, of which R$2,037.7 million consisted of interest expense and R$659.4 million consisted of expenses related to monetary variation on financing. We recorded financial revenue of R$690.1 million, of which R$504.5 million corresponds to interest income. In addition, we recorded a loss of R$3,210.4 million in connection foreign exchange variation on our financial assets and liabilities. The interest rates that we pay depend on a variety of factors, including prevailing Brazilian and international interest rates and risk assessments of our company, our industry and the Brazilian economy made by potential lenders to our company, potential purchasers of our debt securities and the rating agencies that assess our company and its debt securities.

Effect of Taxes on Our Income

We are subject to a variety of generally applicable federal and state taxes in multiple jurisdictions on our operations and results. We are generally subject to Brazilian federal income tax (combined with Social Contribution on Net Income (*Contribuição Social Sobre o Lucro Líquido*), or CSLL) at an effective rate of 34%, which is the standard corporate tax rate in Brazil. We have available certain federal tax exemptions based upon federal law that offers tax incentives to companies that locate their manufacturing operations in the Brazilian states of Bahia and Alagoas. These exemptions have been granted for varying lengths of time to each of our manufacturing plants located in these states.

We are entitled to pay 25% of the statutory income tax rate on the profits arising from the sale of:

- polyethylene manufactured at one of our polyethylene plants in the Northeastern Complex until December 31, 2016; and

- PVC manufactured at our plant in the Alagoas until December 31, 2019.

- Polyethylene manufactured at one of our polyethylene plants in the Northeastern Complex and caustic soda, chlorine and ethylene dichloride produced at our plants in the Northeastern Complex and Alagoas until 2024.

Each of our exemptions entitles us to pay only 44.9% of the statutory income tax rate (of 34%) on the profits arising from products manufactured at these plants.

Due to operating losses sustained by us in the past, we had R$2,114.5 million of deferred income tax and social contribution assets arising from tax loss carryforwards available as of December 31, 2016. Income tax loss carryforwards available for offset in Brazil do not expire. However, the annual offset is limited to 30% of our adjusted net profits. This limit also affects the social contribution on net profit, or CSLL. The consolidated amount includes the impact from the different tax rates in countries where foreign subsidiaries are located, as follows:

- Braskem Europe (Germany) - 31.00%

- Braskem America e Braskem America Finance (United States) - 35.00%

- Braskem Argentina (Argentina) - 35.00%

- Braskem Austria e Braskem Austria Finance (Austria) - 25.00%

- Braskem Petroquímica Chile (Chile) - 22.50 %

- Braskem Holanda, Braskem Holanda Finance and Braskem Holanda Inc Netherland (The Netherlands)- 25.00%

- Braskem Idesa, Braskem Idesa Serviços, Braskem México, Braskem México Serviços and Braskem México Sofom (Mexico) - 30.00%

Our export sales are currently exempt from (1) PIS (2) COFINS, a federal value-added tax, (3) the Tax on Industrial Products (*Imposto sobre Produtos Industrializados*), or IPI, a federal value-added tax on industrial products, and (4) ICMS.

Recent Developments

Commencement of Operations of Our Mexico Unit

During April 2016, Braskem Idesa commenced commercial operations of the Mexico Complex. As a result of the commencement of operations of the Mexico Complex, we commenced recording the results of our Mexico business unit as a separate segment in our financial statements as of dates and for periods ended after January 1, 2016. For more information about the Mexico Complex and the Mexico business unit, see Item 4. Information on the Company Mexico Unit.

Global Settlement

In December 2016, we entered into a global settlement with the MPF, the DoJ, the SEC and the OAG with regard to certain matters under investigation, which we refer to as the Global Settlement. The Global Settlement was reached at the conclusion of an independent internal investigation into the allegations of improper payments in connection with the so-called Operation Car Wash in Brazil. Under the Global Settlement, Braskem will pay the aforementioned authorities in Brazil and overseas the aggregate approximate amount of US$957 million, equivalent to approximately R$3.1 billion. The Global Settlement was definitively ratified as follows:

In Brazil, the Leniency Agreement was ratified by the 5th Coordination and Review Chamber of the MPF on December 15, 2016 and on June 6, 2017 by the 13th Federal Court of Curitiba.

In the United States, the competent courts confirmed the resolution with the DoJ on January 26, 2017 and the resolution with the SEC on February 28, 2017.

In Switzerland, the agreement with the OAG did not require ratification to produce effect.

Of the total fine established in the Global Settlement, we have already paid approximately R$1.3 billion in the following manner

US$94.9 million (R$296.6 million) to the DoJ on February 8, 2017;

US$65.0 million (R$206.5 million) to the SEC on April 27, 2017;

CHF30.2 million (R$104.4 million) to the OAG on June 27, 2017;

R$736.5 million to the MPF on July 6, 2017.

The outstanding amount of approximately R$1.8 billion will be paid in the following manner:

CHF64.3 million to the OAG in four equal annual and successive installments of CHF16.1 million due on June 30 of each year commencing in 2018; and

R$1.6 billion to the MPF in six annual installments adjusted for inflation by the variation in the IPCA inflation index due on January 30 of each year commencing in 2018. To guarantee payment of future installments, Braskem has provided a guaranty in the form of fixed assets in an amount equal to one annual installment.

For more information regarding the Global Settlement, see Item 8. Financial Information Legal Proceedings Global Settlement.

Sale of quantiQ

On January 10, 2017, we entered into an agreement with GTM do Brasil Comércio de Produtos Químicos LTDA under which we will sell 100% of our ownership interest in quantiQ for an aggregate amount of R$550 million. On April 3, 2017, the sale of subsidiary quantiQ to GTM do Brasil Comércio de Produtos Químicos Ltda (GTM) was completed. As a result of the sale, on that same date, Braskem received the amount of R$450 million, and the remaining balance of R$100 million, will be paid by GTM in up to 12 months, and may undergo customary adjustments of this kind of operation.

Acquisition of Cetrel

On January 27, 2017, our board of directors authorized the execution of a purchase agreement with Odebrecht Utilities S.A., through which Braskem undertook to purchase all shares held by the seller in Cetrel S.A., which represent 63.7% of its voting capital, for the aggregate amount of R$610 million, to be paid upon the consummation of the transaction. The consummation of the acquisition is subject to shareholder approval, in accordance with Article 256 of Brazilian Corporation Law, and to the conditions precedent that are customary for transactions of this kind.

Table of Contents

Braskem s Financial Policy

In March 2016, our board of directors approved a new version of Braskem s Financial Policy. This Policy sets forth and ratifies concepts, criteria and limits of delegation for decisions that involve: cash flow management and liquidity; investment of available cash; raising of funds and provision of guarantees and management of foreign exchange risk and commodities. In comparison with the older version, the new Policy maintains a conservative posture regarding financial risk management, focusing on the pro-active and continuous management of risks through anticipation and, when necessary, protection in relation to unfavorable scenarios.

UTEC

In January 2017, we commenced operations at our UHMWPE production facility in our La Porte, Texas site. We believe the production of specialized UHMWPE at this new plant will enable us to better serve our clients in North America and Europe by exporting UHMWPE.

Construction of Polypropylene Plant in the United States

On June 21, 2017 our board of directors approved a project to build a new polypropylene plant at our site in La Porte, Texas, or the La Porte Project. With an approved investment of up to US$675 million, the La Porte Project will add 450 kt of annual polypropylene production capacity to our portfolio, with startup expected in 2020.

The La Porte Project is aligned with our strategy to diversify our feedstock profile and expand geographically in the Americas, and it will strengthen our leadership position in polypropylene production in the United States.

Results of Operations

The following discussion of our results of operations is based on our consolidated financial statements prepared in accordance with IFRS.

The discussion of the results of our business units is based upon financial information reported for each of the segments of our business, as presented in the following tables, which set forth the results of each of our segments and the reconciliation of these results of our segments to our consolidated results of operations. This segment information was prepared on the same basis as the information that our senior management uses to allocate resources among segments and evaluate their performance. We evaluate and manage the performance of our segments based on information generated from our statutory accounting records maintained in accordance with IFRS, and reflected in our consolidated financial statements.

	Year Ended December 31, 2016						
	Net sales revenue	Cost of products sold	Gross profit	Selling, general and distribution expenses	Results from equity investments	Other operating income (expense), net(1)	Operating profit (loss)
	(in millions of *reais*)						
Basic Petrochemicals	25,062.6	(20,266.1)	4,796.5	(698.4)		(373.7)	3,724.4
Polyolefins	20,307.4	(16,041.1)	4,266.3	(1,303.8)		(119.8)	2,842.7

Vinyls	3,016.4	(2,833.8)	182.6	(240.7)		(49.4)	(107.4)
USA and Europe	8,896.1	(6,080.7)	2,815.3	(559.5)		(9.3)	2,246.5
Mexico (2)	1,586.9	(1,017.1)	569.9	(246.1)		(125.4)	198.3
Total segments	58,869.4	(46,238.8)	12,630.6	(3,048.5)		(677.5)	8,904.5
Other segment(3)	12.2	(14.8)	(2.6)	(1.9)		(20.9)	(25.3)
Corporate unit(4)				(108.2)	30.1	(3,053.8)	(3,131.9)
Reclassifications and eliminations(5)	(11,217.6)	11,312.9	95.4	108.6			204.0
Consolidated	47,664.0	(34,940.7)	12,723.4	(3,050.0)	30.1	(3,752.2)	5,951.2

Table of Contents

	Year Ended December 31, 2015 Restated						
	Net sales revenue	Cost of products sold	Gross profit	Selling, general and distribution expenses	Results from equity investments	Other operating income (expense), net(1)	Operating profit (loss)
	(in millions of *reais*)						
Basic Petrochemicals	24,269.8	(20,053.1)	4,216.7	(658.9)		(178.1)	3,379.6
Polyolefins	19,986.2	(15,461.2)	4,525.0	(1,224.6)		(130.7)	3,169.7
Vinyls	2,780.1	(2,415.9)	364.2	(224.9)		(27.0)	112.4
USA and Europe	8,239.9	(6,908.6)	1,331.3	(445.9)		(13.4)	872.0
Mexico (2)	472.0	(486.8)	(14.8)	(88.2)		3.8	(99.3)
Total segments	55,747.9	(45,325.5)	10,422.4	(2,642.5)		(345.5)	7,434.4
Other segment(3)	159.5	(150.2)	9.3	(6.5)		(73.9)	(71.0)
Corporate unit(4)				(9.0)	2.2	(244.6)	(251.3)
Reclassifications and eliminations(5)	(9,027.5)	8,747.7	(279.7)	124.7		(67.3)	(222.3)
Consolidated	46,880.0	(36,728.0)	10,152.0	(2,533.3)	2.2	(731.2)	6,889.7

	Year Ended December 31, 2014 Restated						
	Net sales revenue	Cost of products sold	Gross profit	Selling, general and distribution expenses	Results from equity investments	Other operating income (expense), net(1)	Operating profit (loss)
	(in millions of *reais*)						
Basic Petrochemicals	25,576.3	(23,252.8)	2,323.5	(692.7)		190.3	1,821.1
Polyolefins	18,502.2	(15,599.6)	2,902.6	(965.7)		(53.2)	1,883.7
Vinyls	2,709.5	(2,551.5)	158.0	(205.3)		57.3	10.0
USA and Europe	7,934.3	(7,481.3)	453.0	(294.9)		(82.5)	75.6
Mexico (2)	273.3	(262.6)	10.6	(58.7)		4.2	(43.9)
Total segments	54,995.5	(49,147.8)	5,847.7	(2,217.3)		116.0	3,746.4
Other segment(3)	129.4	(21.6)	107.8	(111.3)		(8.3)	(11.8)
Corporate unit(4)				(110.5)	3.9	(96.6)	(203.1)
Reclassifications and eliminations(5)	(9,989.0)	9,817.8	(171.3)	78.1		31.7	(61.6)
Consolidated	45,135.9	(39,351.7)	5,784.2	(2,361.1)	3.9	42.8	3,469.8

(1) Includes research and development.
(2)

(i)With the operational startup of Braskem Idesa, our company began to report as of January 1, 2016, the Mexico segment, which includes activities related to polyethylene production and sale of that subsidiary. Such financial information for the years ended December 31, 2015 and December 31, 2014,which were previously presented under Other segments , are now presented in this new segment.

(3) Represents expenses of Braskem that are not allocated to any particular segment.

(4) Eliminations consist primarily of intersegment sales, which are made in similar terms as arm s length transactions.

In the following discussion, references to increases or declines in any period are made by comparison with the corresponding prior period, except as the context otherwise indicates.

Year Ended December 31, 2016 Compared with Year Ended December 31, 2015

The following table sets forth our consolidated financial information for the years ended December 31, 2016 and 2015.

	Year Ended December 31,		
	2016	**2015**	**% Change**
	(in millions of *reais*)		
Net sales revenue	47,664.0	46,880.0	1.7%
Cost of products sold	(34,940.6)	(36,728.0)	(4.9)%
Gross profit	**12,723.4**	**10,152.0**	25.3%
Income (expenses):			
Selling and distribution	(1,410.8)	(1,083.2)	30.3%
General and administrative	(1,477.2)	(1,280.5)	15.4%

78

	Year Ended December 31, 2016	2015	% Change
	(in millions of *reais*)		
Research and development	(162.0)	(169.6)	(4.5)%
Results from equity investments	30.1	2.2	n.m.
Other operating expenses, net	(3,752.2)	(731.2)	413.1%
Operating profit	**5,951.2**	**6,889.7**	(13.6)%
Financial results:			
Financial expenses	(3,571.0)	(3,163.4)	12.9%
Financial income	690.1	584.9	18.0%
Exchange rate variations, net	(3,210.4)	102.9	n.m.
Financial expenses, net	**(6,091.3)**	**(2,475.6)**	146.1%
Profit (loss) before income tax and social contribution	**(140.0)**	**4,414.2**	n.m.
Income tax and social contribution	(616.0)	(1,660.4)	(62.9)%
Profit (loss) from continuing operations	**(756.1)**	**2,753.8**	n.m.
Results from discontinued operations	26.9	6.4	320.9%
Profit (loss)	**(729.2)**	**2,760.2**	n.m.

n.m.: Not meaningful

Net Sales Revenue

Net sales revenue increased by 1.7%, or R$784.0 million, to R$47,644.0 million in 2016 from R$46,880.0 million in 2015, primarily as a result of (1) a R$1,114.9 million, or 236.2%, increase in net sales revenue of our Mexico Unit, to R$1,586.9 million in 2016 from R$472.0 million in 2015, and (2) a R$792.8 million, or 3.3%, increase in net sales revenue of our Basic Petrochemicals Unit, to R$25,062.6 million in 2016 from R$24,269.8 million in 2015. Reclassifications and eliminations of net sales revenues of our segments in consolidation, primarily reflecting intercompany sales of basic petrochemicals by our Basic Petrochemicals Unit to our other segments, increased by 24.3%, or R$2,190.1 million, to R$11,217.6 million in 2016 from R$9,027.5 million in 2015.

Net Sales Revenue of Basic Petrochemicals Unit

Net sales revenue of the Basic Petrochemicals Unit increased by R$792.8 million, or 3.3%, to R$25,062.6 million in 2016 from R$24,269.8 million in 2015.

Net Sales Revenue Generated by Sales in Brazil:

In 2016, net sales revenue from domestic sales in Brazil increased by 0.9%, or R$165 million, to R$19,490 million (including R$10,775 million from sales to the Polyolefins and Vinyls Units) in 2016 compared to R$19,326 million in 2015, primarily due to higher sales by volume of basic petrochemicals to third parties, in particular a 66% increase in the sales volume of gasoline in the domestic market as a result of the prioritization of domestic sales.

Sales Volume in Brazil.

Internal Transfers: The Basic Petrochemicals Unit transfers mainly ethylene to the Vinyls Unit and ethylene and propylene to the Polyolefins Unit. The table below sets forth our Basic Petrochemicals Unit s internal transfers by volume for the periods indicated.

Basic Petrochemicals Unit s	**Year Ended December 31,**		
Internal Transfers Volume	**2016**	**2015**	**% Change**
	(in tons)		
Ethylene	2,856,541	2,793,531	2.3%
Propylene	1,022,070	987,280	3.5%
Total	**3,878,611**	**3,780,811**	2.6%

Table of Contents

The table below sets forth our Basic Petrochemicals Unit s sales in Brazil to third parties by volume for the periods indicated:

Basic Petrochemicals Unit s	Year Ended December 31,		
Domestic Sales Volume	**2016**	**2015**	**% Change**
	(in tons)		
Ethylene	511,865	485,761	5.4%
Propylene	291,311	246,081	18.4%
Cumene	194,472	206,035	(5.6)%
Butadiene	198,451	220,109	(9.8)%
BTX [(1)]	676,958	631,466	7.2%
Total	**1,873,057**	**1,789,452**	4.7%

(1) BTX is defined as Benzeno, Tolueno and Paraxylene.

Net Sales Revenue Generated by Exports.

Net sales revenue from exports increased by 12.7%, or R$628 million, to R$5,572 million in 2016 compared to R$4,944 million in 2015, mainly due to: (i) the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period; and (ii) the higher sales volume and better international price references for certain basic petrochemicals, particularly butadiene.

Sales Volume from Exports.

Our Basic Petrochemicals Unit s volume of export sales decreased 6.7%, to 704.7 ktons in 2016 from 754.9 ktons in 2015, primarily due to (i) the substitution of propylene export volumes to supply to a client in the acrylics complex in Bahia, (ii) the increased volume of gasoline allocated to the Brazilian market, and (iii) the higher volume of transfers to the Polyolefins Unit to produce polypropylene. These factors were partially offset by higher exports of benzene and butadiene.

	Year Ended December 31,		
Basic Petrochemicals Unit s Export Sales Volume	**2016**	**2015**	**% Change**
	(in tons)		
Ethylene	64,193	62,859	2.1%
Propylene	79,312	170,454	(53.5)%
Butadiene	213,666	165,404	29.2%
BTX [(1)]	347,498	356,195	(2.4)%
Total	**704,670**	**754,911**	(6.7)%

(1) BTX is defined as Benzeno, Tolueno and Paraxylene.

Table of Contents

Net Sales Revenue of Polyolefins Unit

Net sales revenue of the Polyolefins Unit increased by 1.6%, or R$321.2 million, to R$20,307.4 million in 2016 from R$19,986.2 million in 2015, primarily as a result of (i) higher sales volume, particularly in the export market, and (ii) the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period.

Net Sales Revenue Generated by Sales in Brazil.

Net sales revenue from domestic sales in Brazil decreased by 1%, or R$129.0 million, to R$13,903 million in 2016 from R$14,032.1 million in 2015, primarily due to the lower polypropylene prices in the international market.

Sales Volume in Brazil .

In 2016, sales volume in Brazil decreased 0.8%, to 2,811.1 ktons in 2016 from 2,832.8 ktons in 2015, primarily as a result of deceleration in the performance of important sectors of the economy that accompany the performance of the Brazilian GDP. The table below sets forth our Polyolefins Unit s domestic sales volume for the periods indicated:

	Year Ended December 31,		
Polyolefins Unit s Domestic Sales Volume	**2016**	**2015**	**% Change**
	(in tons)		
Polyethylene	1,705,462	1,705,877	n.m.
Polypropylene	1,105,675	1,126,949	(1.9)%
Total	**2,811,137**	**2,832,827**	(0.8)%

Net Sales Revenue Generated by Exports.

Our Polyolefins Unit s net sales revenue from exports increased 7.6%, or R$450.2 million, to R$6,404.3 million in 2016 from R$5,954.1 million in 2015, primarily due to higher sales volume and the 4.3% depreciation of the *real* against the U.S. dollar the corresponding period, which were offset by lower average prices in the international market.

Sales Volume from Exports.

Our Polyolefins Unit s volume of export sales increased 21.7% to 1,590 kton from 1,307 kton in 2015, primarily due to an increase in the volume of export of polypropylene, mainly to South America and Europe, and an increase in the volume of exports of polyethylene to northern South America, as part of our strategy to support the startup of the Mexico Complex.

	Year Ended December 31,		
Polyolefins Unit s Export Sales Volume	**2016**	**2015**	**% Change**
	(in tons)		
Polyethylene	1,024,233	921,044	11.2%
Polypropylene	566,255	386,150	46.6%

Total	**1,590,488**	**1,307,193**	21.7%

81

Table of Contents

Net Sales Revenue of Vinyls Unit

Net sales revenue of our Vinyls Unit increased by 8.5%, or R$236.3 million, to R$3,016.4 million in 2016 from R$2,780.1 million in 2015, primarily as a result of an increase in sales volume of PVC and the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period.

Net Sales Revenue Generated by Sales in Brazil.

Net sales revenue of the Vinyls Unit generated by sales in Brazil increased 4%, or R$110.2 million, to R$2,695 million in 2016 from R$2,585.0 million in 2015, primarily as a result of the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period, which was partially offset by a 0.3% decrease in the average Northeast Asian spot market prices of PVC in U.S. dollars, as reported by IHS.

Sales Volume in Brazil.

Our Vinyls Unit s volume of sales in Brazil decreased 0.2% to 528.3 kton in 2016 from 529.5 ktons in 2015, primarily due to an increased in the volume of sales made to the agribusiness sector (irrigation tubing).

	Year Ended December 31,		
Vinyls Unit s Domestic Sales Volume	**2016**	**2015**	**% Change**
	(in tons)		
PVC	528,314	529,493	(0.2)%
Total	**528,314**	**529,493**	(0.2)%

Net Sales Revenue Generated by Exports.

Our Vinyls Unit s net sales revenue increased by 65%, or R$126.1 million, to R$321 million from R$195.1, primarily due to an increase in the export sales volume of PVC.

Sales Volume from Exports.

Our Vinyls Unit s volume of export sales increased by 78.8%, to 116.9 kton in 2016 from 65.4 kton in 2015, primarily due to our strategy to export part of our PVC production given the weaker demand in the domestic market.

	Year Ended December 31,		
Vinyls Unit s Export Sales Volume	**2016**	**2015**	**% Change**
	(in tons)		
PVC	116,919	65,375	78.8%
Total	**116,919**	**65,375**	78.8%

Net Sales Revenue of USA and Europe Unit

Net sales revenue of our USA and Europe Unit, which includes our polypropylene assets in the United States and Europe, increased by 8.0%, or R$656.2 million, to R$8,896.1 million in 2016 from R$8,239.9 million in 2015, primarily as a result of the higher polypropylene prices in the U.S. market and the stronger sales volume. In 2016, polypropylene sales volume increased 2% from the previous year, due to the better operating performance of our Units and the higher demand for polypropylene in the United States and Europe.

Net Sales Revenue of Mexico Unit

Net sales revenue of the Mexico Unit increased by 236.2%, or R$1,114.9 million, to R$1,586.9 million in 2016 from R$472.0 million in 2015, as a result of the commencement of operations of the Mexico Complex. The sales volume of polyethylene by this segment increased to approximately 431.7 ktons in 2016 from approximately 100.0 ktons in 2015. For more information about the Mexico Complex and the Mexico Unit, see Item 4. Information on the Company Recent Developments Commencement of Operations of Our Mexico Unit.

Cost of Products Sold and Gross Profit

Cost of products sold declined by 4.9%, or R$1,787.4 million, to R$34,940.6 million in 2016 from R$36,728.1 million in 2015, primarily as a result of a 12.0% decrease in cost of products sold by our USA and Europe Unit, which was partially offset by a 3.8% increase in cost of products sold by our Polyolefins Unit. Reclassifications and eliminations of cost of sales and services rendered by our Units calculated as part of our consolidation, primarily reflecting the costs of basic petrochemicals purchases by our Polyolefins and Vinyls Units from our Basic Petrochemicals Unit, increased by 29.3% in 2016.

Consolidated gross profit increased by 25.3%, or R$2,571.4 million to R$12,723.4 million in 2016 from R$10,152.0 million in 2015. Gross margin (gross profit as a percentage of net sales revenue) increased to 26.7% during 2016 from 21.7% during 2015.

Cost of Products Sold of Basic Petrochemicals Unit

Cost of products sold of the Basic Petrochemicals Unit increased by 1.1%, or R$213.0 million, to R$20,266.1 million from R$20,053.1 million in 2015, primarily as a result of a 3.3% increase in the total production of the Basic Petrochemicals Unit and the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period.

Gross profit of the Basic Petrochemicals Unit increased by 13.8% to R$4,796.5 million during 2016 from R$4,216.7 million during 2015, and gross margin increased to 19.1% during 2016 from 17.4% during 2015.

Cost of Products Sold of Polyolefins Unit

Cost of products sold of the Polyolefins Unit increased by 3.8%, or R$580.0 million, to R$16,041.1 million in 2016 to R$15,461.2 million in 2015, primarily as a result of the increase in sales volume discussed above and the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period. The effects of these factors were partially offset by the lower feedstock price.

Gross profit of the Polyolefins Unit decreased by 5.7% to R$4,266.3 million during 2016 from R$4,525.0 million during 2015, and gross margin decreased to 21.0% during 2016 from 22.6% during 2015.

Cost of Products Sold of Vinyls Unit

Cost of products sold of the Vinyls Unit increased by 17.3%, or R$417.9 million, to R$2,833.8 million in 2016 from R$2,415.9 million in 2015, primarily as a result of the increase in sales and production volumes and the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period.

Gross profit of the Vinyls Unit declined by 49.9% to R$182.6 million during 2016 from R$364.2 million during 2015, while gross margin declined to 6.1% during 2016 from 13.1% during 2015.

Cost of Products Sold of USA and Europe Unit

Cost of products sold of the USA and Europe Unit declined by 12.0%, or R$827.9 million, to R$6,080.7 million in 2016 from R$6,908.6 million in 2015, primarily as a result of decreases in the price of propylene.

Gross profit of the USA and Europe Unit increased by 111.5% to R$2,815.3 million during 2016 from R$1,331.3 million during 2015, and gross margin increased to 31.6% during 2016 from 16.2% during 2015.

Cost of Products Sold by Mexico Unit

Cost of products sold by the Mexico Unit increased by 108.9%, or R$530.2 million, to R$1,017.1 million in 2016 from R$486.8 million in 2015, as a result of the commencement of operations of the Mexico Complex. For more information about the Mexico Complex and the Mexico Unit, see Item 4. Information on the Company Recent Developments Commencement of Operations of Our Mexico Unit.

During 2016, the Mexico Unit recorded a gross profit R$569.9 million and gross margin of 35.9%. During 2015, the Mexico Unit recorded a gross loss R$14.8 million and a negative gross margin of 3.1%.

Selling and Distribution Expenses

Selling and distribution expenses increased by 30.3%, or R$327.7 million, to R$1,410.8 million in 2016 from R$1,083.2 million in 2015, primarily as a result of increase of our consolidated volume of exports sales and logistical expenses.

General and Administrative Expenses

General and administrative expenses increased by 15.4%, or R$196.7 million, to R$1,477.2 million in 2016 from R$1,280.5 million in 2015, primarily as a result of: (1) the effects of the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period on our expenses related to international businesses; (2) the advertising expenses associated with the Paralympic Games; (3) expenses with attorneys and auditors in connection with the Investigation conducted in 2016; (4) higher expenses with software licensing; and (5) the startup of the Braskem Idesa petrochemical complex..

Research and Development Expenses

Research and development expenses declined by 4.5%, or R$7.6 million, to R$162.0 million in 2016 from R$169.6 million in 2015, primarily as a result of the effect of the 4.3% depreciation of the *real* against the U.S. dollar during the corresponding period on the translation to *reais* of investments made in U.S. dollars. Research and development expenses as a percentage of net sales revenue declined to 0.3% during 2016 from 0.4% during 2015.

Results from Equity Investments

Results from equity investments increased by R$27.9 million to a gain of R$30.1 million in 2016 from a gain of R$2.2 million in 2015, as a result of an increase in the results of jointly-controlled investments, primarily RPR and Borealis. For more information related to our results of equity investments, see note 12 to our financial statements included elsewhere herein.

Other Operating Income (Expenses), Net

Other operating expenses, net increased by 413.1%, or R$3,021.0 million, to R$3,752.2 million in 2016 from R$731.2 million in 2015, consisting of: (1) R$2,860.4 million in expenses related to the Global Settlement among us and the MPF, the DoJ, the SEC and the OAG; (2) depreciation expenses and maintenance costs of R$252.3 million related to idle industrial plants, including R$138.6 million in costs corresponding to installed and unused capacity in the first months of operation of the subsidiary Braskem Idesa; (3) expenses of R$182.6 million related to environmental provisions; (4) allowances for labor, tax and other claims of R$170.0 million; and (5) provision of R$53.8 million related to investment losses and expenses with projects;

Other operating expenses, net was R$731.2 million during 2015, consisting of: (1) depreciation expenses and maintenance costs of R$152.5 million related to idle industrial plants, including the São Paulo site during the period the unit was shut down; (2) provision of R$174.5 million related to investment losses and expenses with projects; (3) allowances for labor and tax claims of R$105.6 million; (4) expenses of R$65.8 million related to environmental provisions; and (5) R$85.6 million related to other operating expenses.

Table of Contents

Operating Profit (Loss)

As a result of the foregoing:

- operating profit on a consolidated basis declined by 13.6%, or R$938.5 million, to R$5,951.2 million in 2016 from R$6,889.7 million in 2015, and as a percentage of net sales revenue, operating profit decreased to 12.5% during 2016 from 14.7% during 2015;

- operating profit of the Basic Petrochemicals Unit increased by 10.2% to R$3,724.4 million during 2016 from R$3,379.6 million during 2015, and the operating margin of the Basic Petrochemicals Unit increased to 14.9% during 2016 from 13.9% during 2015;

- operating profit of the Polyolefins Unit declined by 10.3% to R$2,842.7 million during 2016 from R$3,169.7 million during 2015, and the operating margin of the Polyolefins Unit declined by 14.0% during 2016 from 15.9% during 2015;

- operating profit of the USA and Europe Unit increased to R$2,246.5 million during 2016 from R$872.0 million during 2015, and the operating margin of the USA and Europe Unit increased to 25.3% during 2016 from 10.6% during 2015;

- during 2016, the Vinyls Unit recorded an operating loss of R$107.4 million and negative operating margin of 3.6%, compared to an operating profit of R$112.4 million and operating margin of 4.0% during 2015; and

- during 2016, the Mexico Unit recorded an operating profit of R$198.3 million and operating margin of 12.5%, compared to an operating loss of R$99.3 million and negative operating margin of 21.0% during 2015.

Financial Results

Financial expenses, net increased by 146%, or R$3,615.7 million, to R$6,091.3 million in 2016 from R$2,475.6 million in 2015, primarily as a result of our recording a R$3,210.4 million loss in exchange rate variation, net in 2016 compared to R$102.9 million gain in exchange rate variation, net in 2015, principally due to the start of the recognition of hedge accounting under profit or loss in the amount of R$1,298 million and the 16.5% appreciation of the *real* during the corresponding period, which negatively affected the balance of financial investments and accounts receivable in foreign currencies.

Financial Income

Financial income increased by 18.0%, or R$105.2 million, to R$690.1 million in 2016 from R$584.9 million in 2015, primarily due to a R$118.3 million increase in interest income, which was partially offset by a R$12.8 million decrease in other financial income.

Financial Expenses

Financial expenses increased by 12.9%, or R$407.8 million, to R$3,571.0 million in 2016 from R$3,163.4 million in 2015, primarily due to a R$320.9 million increase in interest expenses, a R$97.4 million increase in monetary variations on fiscal debts and a R$32.3 million increase in monetary variations.

Income Tax and Social Contribution

During the Investigation, the specialized law firms identified payments for services to third parties without corresponding evidence of the services being rendered, or the Improper Commission Payments. As a result, we recognized errors in our calculation of taxes payable in prior periods, or the Tax Adjustments, determined that these errors were material, and that we would be required to restate our financial statements included in Amendment No. 1 of the Form 20-F for the fiscal year ended December 31, 2015, as described in more detail in note 2.4 to our audited consolidated financial statements included in this annual report.

Table of Contents

Our income tax and social contribution expense decreased by 62.9% to R$ 616.0 million during 2016 from R$ 1,660.4 million during 2015.

The effective tax rate applicable to our profit before income tax and social contribution was 440.0% in 2016, primarily as a result of: (1) permanent adjustments caused by differences of income tax rates of investments in countries that have a lower tax rate than Brazil, which reduced the effective tax rate by approximately 34.0%; (2) permanent adjustments caused by fines pursuant to the Global Settlement, which increased the tax rate by 494.5%; (3) permanent adjustments to income tax and social contribution from previous years, which increased tax rate by 33.2%; and (4) equity in results of investees, which reduced the applicable effective tax rate by 7.3%.

Profit (Loss)

As a result of the foregoing, we recorded a loss of R$729.2 million, or 1.5% of net sales revenue, during 2016, compared to a profit of R$2,760.2 million, or 5.9% of net sales revenue, during 2015.

Year Ended December 31, 2015 Compared with Year Ended December 31, 2014

The following table sets forth consolidated financial information for the years ended December 31, 2015 and 2014.

	Year Ended December 31,		
	2015	**2014**	**% Change**
	(in millions of *reais*)		
Net sales revenue	46,880.0	45,135.9	3.9%
Cost of products sold	(36,728.0)	(39,351.7)	(6.7)%
Gross profit	**10,152.0**	**5,784.2**	75.5%
Income (expenses):			
Selling and distribution	(1,083.2)	(1,037.4)	4.4%
General and administrative	(1,280.5)	(1,195.5)	7.1%
Research and development	(169.6)	(128.1)	32.4%
Results from equity investments	2.2	3.9	(43.5)%
Other operating income (expenses), net	(731.2)	42.8	n.m.
Operating profit	**6,889.7**	**3,469.8**	98.6%
Financial results:			
Financial expenses	(3,163.4)	(2,716.4)	16.5%
Financial income	584.9	399.9	46.3%
Exchange rate variations, net	102.9	(84.1)	n.m.
Financial expenses, net	**(2,475.6)**	**(2,400.6)**	3.1%
Profit before income tax and social contribution	**4,414.2**	**1,069.2**	312.9%
Income tax and social contribution	(1,660.4)	(491.0)	238.2%
Profit from continuing operations	**2,753.8**	**578.2**	376.3%
Results from discontinued operations	6.4	0.1	n.m.

Profit	**2,760.2**	**578.2**	377.4%

n.m.: Not meaningful

Net Sales Revenue

Net sales revenue increased by 3.9%, or R$1,744.1 million, to R$46,880.0 million in 2015 from R$45,135.9 million in 2014, primarily as a result of (1) an increase of 8.0% R$1,483.9 million, in net sales revenue of our Polyolefins Unit, to R$19,986.2 million in 2015 from R$18,502.2 million in 2014, and (2) a 3.9%, or R$305.6

million, increase in net sales revenue of our USA and Europe Unit, to R$8,239.9 million in 2015 from R$7,934.3 million in 2014, the effects of which were partially offset by a 5.1% decline in net sales revenue of our Basic Petrochemicals Unit. Reclassifications and eliminations of net sales revenues of our segments in consolidation, primarily reflecting intercompany sales of basic petrochemicals by our Basic Petrochemicals Unit to our other Units, declined by 9.6%, or R$961.6 million, to R$9,027.5 million in 2015 from R$9,989.0 million in 2014.

Net Sales Revenue of Basic Petrochemicals Unit

Net sales revenue of the Basic Petrochemicals Unit decreased by 5.1%, or R$1,306.5 million, to R$24,269.8 million in 2015 from R$25,576.3 million in 2014, primarily as a result of the reduction in international petrochemical prices due to lower oil and naphtha prices, which were partially offset by the increase in total sales volume and the 41.8% depreciation of the *real* against the U.S. dollar during the corresponding period.

Net Sales Revenue Generated by Sales in Brazil.

Net sales revenue of our Basic Petrochemicals Unit generated by sales in Brazil decreased 4.3%, to R$19,326 million (including R$11,802 million from sales to the Polyolefins and Vinyls Units) in 2015 from R$19,955 million (including R$11,727 million from sales to the Polyolefins and Vinyls Units) in 2014. The decrease is mainly explained by the reduction in petrochemical prices due to lower oil and naphtha prices.

Sales Volume in Brazil.

Internal Transfers: The Basic Petrochemicals Unit transfers mainly ethylene to the Vinyls Unit and ethylene and propylene to the Polyolefins Unit. The table below sets forth our Basic Petrochemicals Unit s internal transfers by volume for the periods indicated:

Basic Petrochemicals Unit s Internal Transfers Volume	Year Ended December 31, 2015	2014	% Change
	(in tons)		
Ethylene	2,793,531	2,704,299	3.3%
Propylene	987,280	859,541	14.9%
Total	**3,780,811**	**3,563,840**	6.1%

In 2015, sales volume of key basic petrochemicals to third parties increased by 3.7%, to 1.8 million tons, primarily due to an increase in the sales volume of propylene due to the startup of the Basf acrylics complex in Camaçari, Bahia. The table below sets forth our Basic Petrochemicals Unit s sales in Brazil to third parties by volume for the periods indicated:

Basic Petrochemicals Unit s Domestic Sales Volume	Year Ended December 31, 2015	2014	% Change
	(in tons)		
Ethylene	485,761	499,580	(2.8)%
Propylene	246,081	208,924	17.8%

Cumene	206,035	211,648	(2.7)%
Butadiene	220,109	209,982	4.8%
BTX [(1)]	631,466	594,951	6.1%
Total	**1,789,452**	**1,725,085**	3.7%

(1) BTX is defined as Benzeno, Tolueno and Paraxylene.

Table of Contents

Net Sales Revenue Generated by Exports.

Our Basic Petrochemicals Unit s net sales revenue from exports decreased by 8.3%, to R$ 4,944 million, primarily due to a decreased in the sales volume of exported propylene and lower prices for the main basic petrochemical products.

Sales Volume from Exports.

Our Basic Petrochemicals Unit s volume of export sales decreased 1.6%, to 754,911 tons in 2015 from 767,379 tons in 2014, principally due to the redirection of propylene to the domestic market with the commissioning of BASF s acrylic complex.

	Year Ended December 31,		
Basic Petrochemicals Unit s Export Sales Volume	**2015**	**2014**	**% Change**
	(in tons)		
Ethylene	62,859	11,839	430.9%
Propylene	170,454	236,780	(28.0)%
Butadiene	165,404	168,870	(2.0)%
BTX (1)	356,195	349,889	1.8%
Total	**754,911**	**767,379**	(1.6)%

(1) BTX is defined as Benzeno, Tolueno and Paraxylene.

Net Sales Revenue of Polyolefins Unit

Net sales revenue of the Polyolefins Unit increased by 8.0%, or R$1,483.9 million, to R$19,986.2 million in 2015 from R$18,502.2 million in 2014, primarily as a result of an increase in the total net sales volume of 4.1%, mainly due to our capacity to export volumes not absorbed by the domestic market and favorable foreign exchange.

Net Sales Revenue Generated by Sales in Brazil.

Our Polyolefins Unit s net sales revenue from sales in Brazil decreased by 0.5%, or R$66 million, to R$14,032 million in 2015 from R$14,099 million in 2014, primarily due to a decrease in the polypropylene sales volume from 1,204.0 ktons in 2014 to 1,126.9 ktons in 2015.

Sales Volume in Brazil.

Our Polyolefins Unit s volume of sales in Brazil decreased 2.7%, to 2,832.8 ktons in 2015 from 2,910.2 ktons in 2014, primarily as a result of the weak performance of the Brazilian economy, particularly in the industrial and automotive sector. The table below sets forth our Polyolefins Unit s volume of sales in Brazil for the periods indicated:

	Year Ended December 31,		
Polyolefins Unit s Domestic Sales Volume	**2015**	**2014**	**% Change**

	(in tons)		
Polyethylene	1,705,877	1,706,137	
Polypropylene	1,126,949	1,204,049	(6.4)%
Total	**2,832,827**	**2,910,185**	(2.7)%

Table of Contents

Net Sales Revenue Generated by Exports.

Our Polyolefins Unit s net sales revenue from exports increased by 34.8%, from R$5,954 million in 2015 to R$4,418 million in 2014, primarily as a result an increase in export sales volume and an increase in average prices as a result of the effects of (1) the 41.8% depreciation of the *real* against the U.S. dollar in the corresponding period, and (2) increases of 32%, 29% and 31% on average for HDPE, LLDPE and LDPE contract prices in the North American market, respectively, according to IHS.

Sales Volume from Exports.

Our Polyolefins Unit s volume of export sales increased by 22.4%, to 1,307.2 ktons in 2015 from 1,068.3 ktons in 2014, primarily due to a 35.4% increase in the volume of exports of polyethylene.

	Year Ended December 31,		
Polyolefins Unit s Export Sales Volume	**2015**	**2014**	**% Change**
	(in tons)		
Polyethylene	921,044	680,390	35.4%
Polypropylene	386,150	387,888	(0.4)%
Total	**1,307,193**	**1,068,279**	22.4%

Net Sales Revenue of Vinyls Unit

Net sales revenue of the Vinyls Unit increased by 2.6%, or R$70.6 million, to R$ 2,780.1 million in 2015 from R$2,709.5 million in 2014, primarily as a result of an increase in the exports sales volume and the average prices for sales of PVC, which increased primarily as a result of the 41.8% depreciation of the *real* against the U.S. dollar during the corresponding period.

Net Sales Revenue Generated by Sales in Brazil.

Our Vinyls Unit s net sales revenue generated by sales in Brazil decreased by 4.5%, to R$2,571 million in 2015 from R$2,691 million in 2014, primarily as a result of a decrease in sales volume of PVC in Brazil from 529.5 kton in 2014 to 659.5 kton in 2015.

Sales Volume in Brazil.

Our Vinyls Unit s volume of sales in the Brazilian market decreased by 19.7%, to 529.5 kton in 2015 from 659.6 kton in 2014, primarily due to a decrease in the demand for PVC as a result of the weak performance of the infrastructure and construction sectors of the main consumers of resin.

	Year Ended December 31,		
Vinyls Unit s Domestic Sales Volume	**2015**	**2014**	**% Change**
	(in tons)		
PVC	529,493	659,549	(19.7)%

Total	**529,493**	**659,549**	(19.7)%

Net Sales Revenue Generated by Exports.

Our Vinyls Unit s net sales revenue generated by exports increased by more the 2,000%, to R$195 million in 2015 from R$8 million in 2014, due to the exporting of PVC in 2015.

Sales Volume from Exports.

Influenced by the reduction in domestic demand for PVS and the 41.8% devaluation of the *real* against the U.S. dollar during the corresponding period, we began exporting part of our PVC production in 2015, with export sales volume reaching approximately 65.0 ktons in 2015, compared to zero export sales of PVC in 2014.

Net Sales Revenue of USA and Europe Unit

Net sales revenue of the USA and Europe Unit, which includes our polypropylene assets in the United States and Europe, increased by 3.9% during 2015, or R$305.6 million, from R$7,934.3 million in 2014 to R$8,239.9 million in 2015, primarily as a result of a 5.9% increase in sales volume, accompanying the higher supply and the improved economic scenario, especially in the United States. This increased demand reflects the gain in competitiveness resulting from a decrease in the price of propylene (feedstock used to make polypropylene) due to the oversupply of propylene produced at refineries.

Net Sales Revenue of Mexico Unit

Net sales revenue of the Mexico Unit increased by 72.7%, or R$198.7 million, from R$273.3 million in 2014 to R$472.0 million in 2015, primarily due to the fact that the Mexico Complex was not operational in 2014.

Cost of Products Sold and Gross Profit

Cost of products sold declined by 6.7%, or R$2,623.7 million, to R$36,728.0 million in 2015, from R$39,351.7 million in 2014, primarily as a result of (1) a 13.8% decrease in cost of products sold in our Basic Petrochemicals Unit, and (2) a 7.6% decrease in cost of products sold in our USA and Europe Unit. Reclassifications and eliminations of cost of sales and services rendered of our segments in consolidation, primarily reflecting the costs of basic petrochemicals purchases by our Polyolefins and Vinyls Units from our Basic Petrochemicals Unit, declined by 10.9% during 2015, to R$8,747.7 million 2015, from R$9,817.8 million in 2014.

Consolidated gross profit increased by 75.4% during 2015. Gross margin (gross profit as a percentage of net sales revenue) increased to 21.7% during 2015 from 12.8% during 2014.

Cost of Products Sold of Basic Petrochemicals Unit

Cost of products sold of the Basic Petrochemicals Unit declined by 13.8%, or R$3,199.7 million, to R$20,053.1 million in 2015 from R$23,252.8 million in 2014, primarily as a result of a reduction in the cost of naphtha, the main feedstock, which registered an average price of US$462 per ton in 2015, a decline of 45% from 2014. This decline is partially explained by a 47% reduction in the price of crude oil during 2014.

Gross profit of the Basic Petrochemicals Unit increased by 81.5% to R$4,216.7 million during 2015 from R$2,323.5 million during 2014, and gross margin increased to 17.4% during 2015 from 9.1% during 2014.

Cost of Products Sold of Polyolefins Unit

Cost of products sold of the Polyolefins Unit declined by 0.9%, or R$138.5 million, to R$15,461.2 million in 2015 from R$15,599.6 million in 2014, primarily as a result of: (1) the effects on our average cost of ethylene from the 17.1% decline in the average Western Europe contract price of ethylene in euros, as reported by IHS, and (2) the effects on our average cost of propylene from the 45.1% decline in the average North American contract price of propylene in U.S. dollars and from the 23.6% decline in the average Western Europe contract price of propylene in euros, as reported by IHS. The effects of these factors were partially offset by the effects of the 41.8% depreciation of the *real* against the U.S. dollar and the 18.3% depreciation of the *real* against the euro during the corresponding period on the cost of raw materials of our Polyolefins Unit that are determined by reference to U.S. dollar- and euro-denominated prices, and a 1.6% increase in sales volume of the Polyolefins Unit.

Gross profit of the Polyolefins Unit increased by 55.9% to R$4,525.0 million during 2015 from R$2,902.6 million during 2014, and gross margin increased to 22.6% during 2015 from 15.7% during 2014.

Cost of Products Sold of Vinyls Unit

Cost of products sold of the Vinyls Unit declined by 5.3%, or R$135.6 million, to R$2,415.9 million in 2015 from R$2,551.5 million in 2014, primarily as a result of a 7.8% decline in the total sales volume of our Vinyls Unit. The effects of this decline in sales volume were partially offset by the effects on our Vinyls Unit s average cost of ethylene of the 17.1% of decline in the average Western Europe contract price of ethylene in euros, as reported by IHS, partially offset by the effects of the 18.3% depreciation of the *real* against the euro, during the corresponding period, on the cost of raw materials of our Vinyls Unit that are determined by reference to euro-denominated prices.

Gross profit of the Vinyls Unit increased by 130.5% to R$364.2 million during 2015 from R$158.0 million during 2014, while gross margin increased to 13.1% during 2015 from 5.8% during 2014.

Cost of Products Sold of USA and Europe Unit

Cost of products sold of the USA and Europe Unit decreased by 7.7%, or R$572.7 million, to R$6,908.6 million in 2015 from R$7,481.3 million in 2014, primarily as a result of (1) the effects on this Unit s average cost of propylene from the 45.1% decline in the average North American contract price of propylene in U.S. dollars, as reported by IHS, the effects of which were partially offset by the currency translation effects of a 41.8% average depreciation of the *real* against the U.S. dollar during the corresponding period, and (2) the effects on this Unit s average cost of propylene from the 23.6% decline in the average Western Europe contract price of propylene in euros, as reported by IHS, the effects of which were partially offset by the currency translation effects of the 18.3% average depreciation of the *real* against the euro. The effects of these reductions in the unit cost of raw materials were partially offset by the 5.9% increase in polypropylene sales volume recorded by this segment.

Gross profit of the USA and Europe Unit increased by 193.9% to R$1,331.3 million during 2015 from R$453.0 million during 2014, and gross margin increased to 16.2% during 2015 from 5.7% during 2014.

Cost of Products Sold of Mexico Unit

Cost of sales of the Mexico Unit increased by 85.4%, or R$224.2 million, to R$486.8 million in 2015 from R$262.6 million in 2014, primarily due to the fact that the Mexico Unit was not operational in 2014.

During 2015, the Mexico Unit recorded a gross loss R$14.8 million and a negative gross margin of 3.1%. During 2014, the Mexico Unit recorded a gross profit R$2.3 million and gross margin of 2.5%.

Selling and Distribution Expenses

Selling and distribution expenses declined by 4.4%, or R$45.7 million, to R$1,083.2 million in 2015 from R$1,037.4 million in 2014, primarily as a result of lower costs in logistics and storage of finished products in the domestic market due to a decrease in domestic sales volume. Selling and distribution expenses as a percentage of net sales revenue remained stable at 2.3% during 2015 and 2014.

General and Administrative Expenses

General and administrative expenses increased by 7.1%, or R$85.0 million, to R$1,280.5 million in 2015 from R$1,195.5 million in 2014, primarily as a result of expenses related to innovation and technology and higher expenses with payroll and third-party services. General and administrative expenses as a percentage of net sales revenue increased to 2.7% during 2015 from 2.6% during 2014.

Research and Development Expenses

Research and development expenses increased by 32.4%, or R$41.5 million, to R$169.6 million in 2015 from R$128.1 million in 2014, primarily as a result of higher expenses with contracts denominated in U.S. dollars. Research and development expenses as a percentage of net sales revenue increased to 0.4% during 2015 from 0.3% during 2014.

Results from Equity Investments

Results from equity investments declined by 43.5%, or R$1.7 million, to an R$2.2 million gain in 2015 from a R$3.9 million gain in 2014, primarily as a result of losses on exchange variation on financial results in our jointly controlled investments and associated companies.

Other Operating Income (Expenses), Net

Other operating expense, net was R$731.2 million during 2015, consisting of: (1) depreciation expenses and maintenance costs of R$152.5 million related to idle industrial plants, including the São Paulo site during the period the unit was shut down; (2) provision of R$174.5 million related to investment losses and expenses with projects; (3) allowances for labor and tax claims of R$105.6 million; (4) expenses of R$65.8 million related to environmental provisions; and (5) R$85.6 million related to other operating expenses.

Other operating income, net was R$42.8 million during 2014, primarily consisting of (1) revenues from the divestment of the water treatment unit in the Southern Complex of R$277.3 million, and (2) revenues from the recognition of credits of subsidiaries to settle installment payment under Federal Law 11,941/09 of R$98.3 million. This revenue was partially offset by (1) allowances for judicial and labor claims of R$132.6 million; (2) depreciation expenses and maintenance costs of R$119.8 million related to idle industrial plants, (3) payments for services to third parties without corresponding evidence of the services being rendered of R$72.3 million, (4) expenses of R$44.3 million related to the Ascent Project, (5) expenses related to provisions for environmental damages of R$30.7 million, and (6) extemporaneous taxes of R$30.6 million.

Operating Profit (Loss)

As a result of the foregoing:

- operating profit on a consolidated basis increased by 98.6%, to R$6,889.7 million in 2015 from R$3,469.8 million in 2014, and as a percentage of net sales revenue, operating profit increased to 14.7% during 2015 from 7.7% during 2014;

- operating profit of the Basic Petrochemicals Unit increased by 85.6% to R$3,379.6 million during 2015 from R$1,821.1 million during 2014, and the operating margin of the Basic Petrochemicals Unit increased to 13.9% during 2015 from 7.1% during 2014;

- operating profit of the Polyolefins Unit increased by 68.3% to R$3,169.7 million during 2015 from R$1,883.7 million during 2014, and the operating margin of the Polyolefins Unit increased to 15.9% during 2015 from 10.2% during 2014;

- operating profit of the USA and Europe Unit increased to R$872.0 million during 2015 from R$75.6 million during 2014, and the operating margin of the USA and Europe Unit increased to 10.6% during 2015 from 1.0% during 2014;

operating profit of the Vinyls Unit increased to R$112.4 million during 2015 from R$10.0 million during 2014, while the operating margin of the Vinyls Unit increased to 4.0% during 2015 from 0.4% during 2014; and

operating loss of the Mexico Unit increased to R$99.3 million during 2015 from R$43.9 million during 2014, and the negative operating margin of the Mexico Unit increased to 21.0% during 2015 from 16.1% during 2014.

Financial Results

Financial expenses, net increased by 3.1%, or R$74.9 million, to R$2,475.6 million in 2015 from R$2,400.6 million in 2014, primarily as a result of a 16.5% increase in financial expenses, the effects of which were partially offset by a 46.3% increase in financial income

Financial Income

Financial income increased by 46.3%, or R$185.0 million, to R$584.9 million during 2015 from R$399.9 million during 2014, primarily as a result of our recording a R$1,102.7 million gain on exchange variation on monetary assets during 2015 compared to a R$46.6 million loss during 2014 as a result of a 41.8% depreciation of the *real* against the U.S. dollar during 2015, compared to a 9.1% depreciation of the *real* against the U.S. dollar during 2014.

Financial Expenses

Financial expenses increased by 16.5%, or R$447.0 million, to R$3,163.4 million during 2015 from R$2,716.4 million during 2014, primarily as a result of (1) our recording a R$999.8 million loss on foreign exchange variation on liabilities during 2015 compared to a R$37.5 million loss during 2014 as a result of a 41.8% depreciation of the *real* against the U.S. dollar at the end of 2015 compared to a 9.1% appreciation in the end of period U.S. dollar exchange rate against the *real* during 2014, and (2) a 31.5 % increase in interest expense to R$1,716.8 million during 2015 from R$1,305.1 million during 2014, mainly due to the impact from exchange variation on the outstanding balance of U.S. dollar-denominated debt.

Income Tax and Social Contribution

During the Investigation, the specialized law firms identified payments for services to third parties without corresponding evidence of the services being rendered, or the Improper Commission Payments. As a result, we recognized errors in our calculation of taxes payable in prior periods, or the Tax Adjustments, determined that these errors were material, and that we would be required to restate our financial statements included in Amendment No. 1 of the Form 20-F for the fiscal year ended December 31, 2015, as described in more detail in note 2.4 to our audited consolidated financial statements included in this annual report.

Our income tax and social contribution expense increased by R$1,169.4 million, or 238.2%, to R$1,660.4 million in 2015 from R$491.0 million in 2014.

The effective tax rate applicable to our profit before income tax and social contribution was 37.5% during 2015, primarily as a result of permanent adjustments caused by differences of income tax rates of investments in countries that have a lower tax rate than Brazil, which increased the effective tax rate by approximately 3.1%. The effective tax rate applicable to our profit before income tax and social contribution was 45.8% during 2014, primarily as a result of (1) permanent adjustments caused by differences of income tax rates of investments in countries that have a lower tax rate than Brazil, which increased the effective tax rate by approximately 9.5%, and (2) permanent adjustments caused by payments for third-party services, without proving the actual consideration which increased the effective tax rate by approximately 8.3%, the effects of which were partially offset by permanent adjustments caused by a discount on our tax installment payment, established by Law 13,043/2014, which reduced the applicable effective tax rate by 3.8%, and equity in results of investees, which reduced the applicable effective tax rate by 2.2%.

Profit

As a result of the foregoing, our profit increased 377.4% to R$2,760.2 million, or 5.9% of net sales revenue, during 2015, from R$578.2 million, or 1.3% of net sales revenue, during 2014.

Liquidity and Capital Resources

Our principal cash requirements for 2016 consisted of the following:

servicing our indebtedness;

working capital requirements;

- capital expenditures related to investments in operations, construction of new plant facilities, and maintenance and expansion of plant facilities; and

- dividends on our shares, including in the form of interest attributable to shareholders equity.

Our principal sources of liquidity have traditionally consisted of the following:

- cash flows from operating activities;

- short-term and long-term borrowings; and

- sales of debt securities in domestic and international capital markets.

During 2016, cash flow generated by operations was used primarily for investing activities, for working capital requirements, to service our outstanding debt obligations and to dividends payments to shareholders. In 2016, our board of directors approved the distribution of R$2 billion in dividends, which corresponds to 63% of net income for the previous fiscal year. The payments were made in April and October.

As of December 31, 2016, our consolidated cash and cash equivalents amounted to R$7,332.2 million (US$2,249.8 million), including the cash and cash equivalents of quantiQ and IQAG but excluding the aggregate amount of R$201.6 million (US$61.9million) of Braskem Idesa s cash and cash equivalents.

As of December 31, 2016, we had negative net working capital (defined as (1) current assets plus non-current assets held for sale, minus (2) current liabilities plus non-current liabilities held for sale) of R$6,782.1 million (US$ 2,081.0 million), including the total assets and total liabilities of Braskem Idesa S.A.P.I.

Projected Sources and Uses of Cash

We anticipate that we will be required to spend approximately R$24.4 billion to meet our short-term contractual obligations and commitments and budgeted capital expenditures during 2017. We expect that we will meet these cash requirements for (1) our operations through sales of our products, and (2) our debt service through new financing activities, including new debt financings and the refinancing of our existing short-term indebtedness as it becomes due.

We have commitments from several financial institutions to provide us with financing in the future, including commitments from the Brazilian National Bank for Economic and Social Development (*Banco Nacional do Desenvolvimento*), or BNDES, to lend us funds under our revolving stand-by credit facilities (*Contrato de Abertura de Limite de Crédito*), or CALC facilities, described under Indebtedness and Financing Strategy Credit Facilities with BNDES. As of December 31, 2016, the full aggregate principal amount had been disbursed under these facilities.

If needed to be used, such commitments are subject to conditions precedent. We pay commitment fees to these financial institutions in connection with their commitments, other than our BNDES revolving stand-by credit facilities.

In addition, we entered into a project finance facility to fund the development our Mexico Complex. For more information regarding this facility, see Capital Expenditures Joint Venture Project Mexico Complex.

Cash Flows

Cash Flows Provided by Operating Activities

Net cash provided by operating activities was R$4,746.3 million during 2016, R$7,877.8 million during 2015 and R$3,813.1 million during 2014.