Koppers Holdings Inc.
Form 10-Q
November 03, 2016

UNITED STATES

SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, D.C. 20549

FORM 10-Q

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

For the quarterly period ended September 30, 2016

Commission file number 1-32737

KOPPERS HOLDINGS INC.

(Exact name of registrant as specified in its charter)

Pennsylvania	20-1878963
(State of incorporation)	(IRS Employer Identification No.)

436 Seventh Avenue

Pittsburgh, Pennsylvania 15219

(Address of principal executive offices)

(412) 227-2001

(Registrant’s telephone number, including area code)

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 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, a non-accelerated filer or a smaller reporting company. See the definitions of “large accelerated filer”, “accelerated filer” and “smaller reporting company” in Rule 12b-2 of the Exchange Act. (Check one):

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

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

Common Stock, par value $0.01 per share, outstanding at October 31, 2016 amounted to 20,662,903 shares.

PART I—FINANCIAL INFORMATION

ITEM 1. FINANCIAL STATEMENTS

KOPPERS HOLDINGS INC.

CONDENSED CONSOLIDATED STATEMENT OF OPERATIONS AND COMPREHENSIVE INCOME (LOSS)

	Three Months Ended September 30,		Nine Months Ended September 30,	
(Dollars in millions, except per share amounts)	2016 (Unaudited)	2015 (Unaudited)	2016 (Unaudited)	2015 (Unaudited)
Net sales	$371.1	$ 433.8	$1,103.0	$ 1,263.2
Cost of sales (excluding items below)	294.1	359.1	886.4	1,059.4
Depreciation and amortization	13.8	15.5	42.0	45.2
Gain on sale of business	(2.1)	0.0	(2.1)	(3.2)
Impairment and restructuring charges	5.0	1.4	16.1	7.1
Selling, general and administrative expenses	32.6	30.8	93.1	93.7
Operating profit	27.7	27.0	67.5	61.0
Other income	0.2	0.0	2.2	0.4
Interest expense	11.7	12.6	38.3	38.5
Income before income taxes	16.2	14.4	31.4	22.9
Income tax provision	4.2	5.2	10.5	10.0
Income from continuing operations	12.0	9.2	20.9	12.9
(Loss) income from discontinued operations, net of tax expense of $0.0, $0.0, $0.3 and $0.0	(0.1)	(0.1)	0.5	(0.1)
Net income	11.9	9.1	21.4	12.8
Net loss attributable to noncontrolling interests	(0.2)	(1.0)	(1.5)	(2.9)
Net income attributable to Koppers	$12.1	$ 10.1	$22.9	$ 15.7
Earnings per common share attributable to Koppers common shareholders:				
Basic -				
Continuing operations	$0.59	$ 0.49	$1.08	$ 0.77
Discontinued operations	0.00	0.00	0.03	0.00
Earnings per basic common share	$0.59	$ 0.49	$1.11	$ 0.77
Diluted -				
Continuing operations	$0.58	$ 0.49	$1.07	$ 0.76
Discontinued operations	0.00	0.00	0.02	0.00
Earnings per diluted common share	$0.58	$ 0.49	$1.09	$ 0.76
Comprehensive income (loss)	$14.1	$ (4.7)	$31.4	$ (7.9)
Comprehensive loss attributable to noncontrolling interests	(0.2)	(1.2)	(1.7)	(3.1)
Comprehensive income (loss) attributable to Koppers	$14.3	$ (3.5)	$33.1	$ (4.8)
Weighted average shares outstanding (in thousands):				
Basic	20,657	20,553	20,627	20,537
Diluted	21,163	20,632	20,975	20,609

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

KOPPERS HOLDINGS INC.

CONDENSED CONSOLIDATED BALANCE SHEET

(Dollars in millions, except per share amounts)	September 30, 2016 (Unaudited)	December 31, 2015
Assets		
Cash and cash equivalents	$ 17.7	$ 21.8
Accounts receivable, net of allowance of $4.6 and $6.5	171.3	155.0
Income tax receivable	0.1	4.6
Inventories, net	216.2	226.4
Loan to related party	9.5	9.5
Other current assets	30.2	27.0
Total current assets	445.0	444.3
Property, plant and equipment, net	277.2	277.8
Goodwill	187.8	186.6
Intangible assets, net	146.5	156.1
Deferred tax assets	33.7	36.6
Other assets	10.6	11.5
Total assets	$ 1,100.8	$ 1,112.9
Liabilities		
Accounts payable	$ 141.9	$ 140.8
Accrued liabilities	102.4	99.8
Current maturities of long-term debt	39.5	39.9
Total current liabilities	283.8	280.5
Long-term debt	642.0	682.4
Accrued postretirement benefits	51.5	53.6
Deferred tax liabilities	6.0	5.7
Other long-term liabilities	92.8	103.1
Total liabilities	1,076.1	1,125.3
Commitments and contingent liabilities (Note 18)		
Equity		
Senior Convertible Preferred Stock, $0.01 par value per share; 10,000,000 shares authorized; no shares issued	0.0	0.0
Common Stock, $0.01 par value per share; 80,000,000 shares authorized; 22,138,073 and 22,015,994 shares issued	0.2	0.2
Additional paid-in capital	173.8	167.8
Accumulated deficit	(31.1)	(54.0)
Accumulated other comprehensive loss	(69.6)	(79.8)
Treasury stock, at cost, 1,475,170 and 1,459,164 shares	(53.0)	(52.7)
Total Koppers shareholders' equity (deficit)	20.3	(18.5)
Noncontrolling interests	4.4	6.1
Total equity (deficit)	24.7	(12.4)

Total liabilities and equity (deficit)	$ 1,100.8	$ 1,112.9

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

KOPPERS HOLDINGS INC.

CONDENSED CONSOLIDATED STATEMENT OF CASH FLOWS

	Nine Months Ended September 30,	
(Dollars in millions)	2016 (Unaudited)	2015 (Unaudited)
Cash provided by (used in) operating activities:		
Net income	$21.4	$ 12.8
Adjustments to reconcile net cash provided by operating activities:		
Depreciation and amortization	42.0	45.2
Impairment charges	3.5	7.1
Gain on sale of business	(2.1)	(3.2)
Deferred income taxes	(0.5)	(0.8)
Equity loss, net of dividends received	1.0	2.2
Change in other liabilities	(7.6)	(3.8)
Non-cash interest expense	4.8	2.7
Stock-based compensation	5.7	3.1
Deferred revenue	(1.4)	28.3
Other	4.7	1.7
Changes in working capital:		
Accounts receivable	(17.9)	(8.8)
Inventories	13.8	13.7
Accounts payable	0.9	34.2
Accrued liabilities	15.4	(30.0)
Other working capital	(1.2)	(9.3)
Net cash provided by operating activities	82.5	95.1
Cash (used in) provided by investing activities:		
Capital expenditures	(32.2)	(26.4)
Acquisitions, net of cash acquired	0.0	(15.3)
Net cash (used in) provided by divestitures and asset sales	(4.5)	14.7
Net cash used in investing activities	(36.7)	(27.0)
Cash provided by (used in) financing activities:		
Borrowings of revolving credit	457.9	465.4
Repayments of revolving credit	(477.9)	(531.0)
Borrowings of long-term debt	0.0	1.8
Repayments of long-term debt	(23.4)	(22.5)
Issuances of Common Stock	0.5	0.0
Repurchases of Common Stock	(0.3)	(0.3)
Payment of deferred financing costs	(1.4)	(1.0)
Dividends paid	0.0	(8.7)
Net cash used in financing activities	(44.6)	(96.3)
Effect of exchange rate changes on cash	(5.3)	10.1
Net decrease in cash and cash equivalents	(4.1)	(18.1)
Cash and cash equivalents at beginning of period	21.8	51.1
Cash and cash equivalents at end of period	$17.7	$ 33.0

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

KOPPERS HOLDINGS INC.

NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Unaudited)

1. Basis of Presentation

The accompanying unaudited condensed consolidated financial statements and related disclosures have been prepared in accordance with accounting principles generally accepted in the United States applicable to interim financial information and with the instructions to Form 10-Q and Rule 10-01 of Regulation S-X. Accordingly, they do not include all of the information and footnotes required by generally accepted accounting principles for complete financial statements. In the opinion of management, all adjustments considered necessary for a fair presentation of Koppers Holdings Inc.'s and its subsidiaries' ("Koppers", "Koppers Holdings" or the "Company") financial position and interim results as of and for the periods presented have been included. All such adjustments are of a normal recurring nature unless disclosed otherwise. Because the Company's business is seasonal, results for interim periods are not necessarily indicative of those that may be expected for a full year. The Condensed Consolidated Balance Sheet for December 31, 2015 has been summarized from the audited balance sheet contained in the Annual Report on Form 10-K for the year ended December 31, 2015. Certain prior period amounts in the notes to the consolidated financial statements have been reclassified to conform to the current period's presentation.

The financial information included herein should be read in conjunction with the Company's audited consolidated financial statements and related notes included in its Annual Report on Form 10-K for the year ended December 31, 2015.

2. New Accounting Pronouncements

In August 2016, the Financial Accounting Standards Board ("FASB") issued Accounting Standards Update ("ASU") No. 2016-15, "Statement of Cash Flows (Topic 230): Classification of Certain Cash Receipts and Cash Payments." The update amends the guidance in Accounting Standards Codification 230, Statement of Cash Flows, and clarifies how entities should classify certain cash receipts and cash payments on the statement of cash flows with the objective of reducing the existing diversity in practice related to eight specific cash flow issues. The amendments in this update are effective for annual periods beginning after December 15, 2017, and interim periods within those fiscal years. Early adoption is permitted. The Company is in the process of assessing the impact the adoption of this ASU will have on its consolidated financial statements.

In March 2016, the FASB issued ASU No. 2016-09, "Improvements to Employee Share-Based Payment Accounting." This ASU makes several modifications to Topic 718 related to the accounting for forfeitures, employer tax withholding on share-based compensation and the financial statement presentation of excess tax benefits or deficiencies. ASU 2016-09 also clarifies the statement of cash flows presentation for certain components of share-based awards. The amendments in this ASU are effective for annual periods beginning after December 15, 2016 and for the interim periods therein. The Company does not expect the adoption of this ASU will have a material impact on its consolidated financial statements.

In March 2016, the FASB issued ASU No. 2016-08, "Principal versus Agent Considerations (Reporting Revenue Gross versus Net)," that amends the principal versus agent guidance in ASU 2014-09. ASU 2016-08 clarifies that the analysis must focus on whether the entity has control of the goods or services before they are transferred to the customer. ASU 2016-08 also provides additional guidance about how to apply the control principle when services are provided and when goods or services are combined with other goods or services. The effective date of the standard for the Company will coincide with the effective date of ASU 2014-09 on January 1, 2018. The Company is currently evaluating the effect that the updated standard will have on its consolidated financial statements and related disclosures.

In February 2016, the FASB issued ASU No. 2016-02, “Leases (Topic 842).” ASU 2016-02 requires an entity to recognize a right-of-use asset and lease liability for all leases with terms of more than one year. Recognition, measurement and presentation of expenses will depend on classification as a finance or operating lease. The amendments also require certain quantitative and qualitative disclosures about leasing arrangements. The standard is effective January 1, 2019 and early adoption is permitted. The guidance requires a modified retrospective adoption. The Company is currently evaluating the impact of the adoption of ASU 2016-02 will have on its consolidated financial statements.

In April 2015, the FASB issued ASU No. 2015-03, “Simplifying the Presentation of Debt Issuance Costs,” which requires companies to present debt issuance costs associated with a debt liability as a deduction from the carrying amount of that debt liability on the balance sheet rather than being capitalized as an asset. The standard is effective for interim and annual periods beginning after December 15, 2015, and retrospective presentation is required. The Company adopted this guidance as of January 1, 2016, which resulted in $9.5 million and $12.5 million of debt issuance costs being reclassified from other assets to long-term debt as of September 30, 2016 and December 31, 2015, respectively.

In February 2015, the FASB issued ASU No. 2015-02, “Consolidation (Topic 810): Amendments to the Consolidation Analysis,” which provides consolidation guidance that entities must use to evaluate specific ownership and contractual arrangements that lead to a consolidation conclusion. The updates could change consolidation outcomes affecting

presentation and disclosures. The Company adopted this guidance as of January 1, 2016, which did not have a material effect on the Company's financial statements.

In May 2014, the FASB issued ASU No. 2014-09, "Revenue from Contracts with Customers (Topic 606)." ASU 2014-09 requires an entity to recognize revenue in a manner that depicts the transfer of promised goods or services to customers in an amount that reflects the consideration to which the entity expects to be entitled in exchange for those goods or services. An entity can either adopt this amendment retrospectively to each prior reporting period presented or retrospectively with the cumulative effect of initially applying the update recognized at the date of initial application. This guidance will be effective January 1, 2018. The Company is currently evaluating the impact of the adoption of ASU 2014-09 on the Company's financial statements.

3. Plant Closures and Divestitures

On October 24, 2016, the Company agreed to a long-term lease of its wood treatment facility in Houston, Texas to a third party. This facility, owned by the Company's wholly-owned subsidiary, Wood Protection L.P., is engaged in the manufacturing and sale of pressure-treated dimensional lumber and had revenue of approximately $8 million for the nine months ended September 30, 2016 and $14 million for the year ended December 31, 2015.

In March 2016, the Company discontinued production at its 60-percent owned Carbon Materials and Chemicals ("CMC") plant located in Tangshan, China. The Company's 60-percent owned subsidiary, Koppers (China) Carbon & Chemical Company Limited ("KCCC") is located adjacent to a metallurgical coke facility owned by KCCC's minority partner, which also closed. The KCCC plant relied on the coke facility for a significant portion of raw material supply, utilities and other shared services. In 2015, the Company recorded a severance charge of $0.9 million. For the nine months ended September 30, 2016, the Company has recorded inventory write-down charges of $0.7 million in connection with the facility.

In February 2016, the Company announced plans, which were approved by management and the board in December 2015, to cease coal tar distillation operations at both of its United Kingdom CMC facilities. Accordingly, the Company recorded environmental charges, asset retirement obligations and fixed asset impairment charges totaling $13.9 million during the year ended December 31, 2015. For the nine months ended September 30, 2016, the Company recorded severance charges of $1.7 million. In July 2016, the Company sold substantially all of its CMC tar distillation properties and assets in the United Kingdom. In exchange, the Company transferred cash to the buyer and the buyer assumed historical environmental and asset retirement obligations. The Company recognized a gain of $2.1 million on this transaction. This gain is reported in "Gain on sale of business" on the Condensed Consolidated Statement of Operations and Comprehensive Income (Loss).

In January 2016, the Company announced its decision, which was approved by management and the board in December 2015, to discontinue coal tar distillation activities at its CMC plant located in Clairton, Pennsylvania. Accordingly, the Company recorded severance, inventory write-down, asset retirement obligation and fixed asset impairment charges totaling $18.8 million during the year ended December 31, 2015. For the three and nine months ended September 30, 2016, the Company recorded an additional asset retirement obligation and fixed asset impairment charges totaling $3.8 and $4.8 million, respectively. Coal tar distillation activities at Clairton were substantially discontinued at the end of July 2016. As of September 30, 2016, all depreciable fixed assets directly related to the facility have been impaired.

In August 2015, the Company closed its Railroad and Utility Products and Services ("RUPS") plant located in Green Spring, West Virginia. Accordingly, the Company recorded severance, asset retirement obligation and fixed asset impairment charges of $5.7 million during the year ended December 31, 2015. For the three and nine months ended September 30, 2016, the Company has recorded additional asset retirement obligation charges of $0.4 and $2.3 million, respectively, in connection with the closure of the facility. As of September 30, 2016, the facility is closed.

In January 2015, Koppers Inc. sold its RUPS North American utility pole business for cash of $12.3 million and a promissory note of $1.3 million. The Company recognized a gain of $3.2 million on this transaction in 2015. The promissory note is repayable in three remaining equal annual installments. This gain is reported in "Gain on sale of business" on the Condensed Consolidated Statement of Operations and Comprehensive Income (Loss). The proceeds of the sale are reported within "Net cash proceeds from divestitures and asset sales" on the Condensed Consolidated Statement of Cash Flows. For the three and nine months ended September 30, 2016, the Company has recorded asset retirement obligation charges of $0.9 and $2.4 million, respectively, in connection with assets that were associated with this business line.

In April 2014, the Company ceased its coal tar distillation activities at its CMC facility located in Uithoorn, the Netherlands. In the second quarter of 2016, the Company recorded a $3.7 million net present value accrual related to future real estate lease obligations, net of estimated sublease revenue, at the closed site. The Company determined that it met the cease-use criteria required for the accrual of these costs upon the completion of site demolition in April 2016.

Details of the restructuring activities and related reserves are as follows:

(Dollars in millions)	Severance and employee benefits	Environmental remediation	Site demolition	Other	Total
Reserve at December 31, 2014	$ 0.0	$ 4.1	$ 3.9	$ 0.1	$ 8.1
Accrual	2.2	0.6	13.7	1.3	17.8
Cost charged against assets	0.0	0.0	0.0	(1.3)	(1.3)
Reversal of accrued charges	0.0	0.0	(0.3)	0.0	(0.3)
Cash paid	(0.2)	0.0	(4.8)	(0.1)	(5.1)
Currency translation	0.0	(0.4)	(0.3)	0.0	(0.7)
Reserve at December 31, 2015	$ 2.0	$ 4.3	$ 12.2	$ 0.0	$ 18.5
Accrual	2.1	0.0	4.8	4.4	11.3
Cost charged against assets	0.0	0.0	0.0	(0.7)	(0.7)
Reversal of accrued charges	(1.8)	(0.5)	(8.4)	(0.1)	(10.8)
Cash paid	(1.1)	(1.5)	(5.8)	0.0	(8.4)
Currency translation	(0.1)	0.1	(0.7)	0.0	(0.7)
Reserve at September 30, 2016	$ 1.1	$ 2.4	$ 2.1	$ 3.6	$ 9.2

4. Related Party Transactions

As of September 30, 2016, the Company has loaned $9.5 million to Tangshan Koppers Kailuan Carbon Chemical Company Limited (“TKK”), a 30-percent owned company in China. The loan was repayable in six equal monthly installments beginning in June 2015. TKK defaulted on the first installment payment of $1.6 million due in June 2015 and each monthly payment thereafter. The Company has tentatively agreed to terms with TKK’s controlling shareholder regarding repayment of the loan in addition to the potential sale of the Company’s 30-percent interest in TKK. The Company recognized an equity loss from TKK of $0.3 million and $1.0 million for the three and nine months ended September 30, 2016. As of September 30, 2016, management has concluded that it is probable that the full principal amount of the loan remains collectible, and accordingly, no provision has been recorded.

5. Fair Value Measurements

Carrying amounts and the related estimated fair values of the Company’s financial instruments as of September 30, 2016 and December 31, 2015 are as follows:

	September 30, 2016	December 31, 2015

	Fair Value	Carrying Value	Fair Value	Carrying Value
(Dollars in millions)				
Financial assets:				
Cash and cash equivalents, including restricted cash	$17.7	$ 17.7	$21.8	$ 21.8
Investments and other assets[(a)]	1.1	1.1	1.1	1.1
Financial liabilities:				
Long-term debt (including current portion)	$691.0	$ 681.5	$724.6	$ 722.3

(a) Excludes equity method investments.

Cash and cash equivalents – The carrying amount approximates fair value because of the short maturity of those instruments.

Investments and other assets – Represents the broker-quoted cash surrender value on universal life insurance policies. This asset is classified as Level 2 in the valuation hierarchy and is measured from values received from financial institutions.

Debt – The fair value of the Company's long-term debt is estimated based on the market prices for the same or similar issues or on the current rates offered to the Company for debt of the same remaining maturities (Level 2). The fair values of the term loan and revolving credit facility approximate carrying value due to the variable rate nature of these instruments.

6. Comprehensive Income (Loss) and Equity (Deficit)

Total comprehensive income (loss) for the three and nine months ended September 30, 2016 and 2015 is summarized in the table below:

	Three Months Ended September 30,		Nine Months Ended September 30,	
(Dollars in millions)	2016	2015	2016	2015
Net income	$11.9	$9.1	$21.4	$12.8
Other comprehensive income (loss):				
Change in currency translation adjustment	0.7	(13.6)	4.1	(21.9)
Change in unrealized gains (losses) on cash flow hedges, net of tax (expense) benefit of $(1.0), $0.5, $(3.4) and $0.8	1.7	(1.2)	5.5	(1.7)
Change in unrecognized pension net income, net of tax (expense) benefit of $(0.1), $(0.7), $(0.4) and $(2.0)	(0.2)	1.0	0.4	3.0
Change in unrecognized prior service cost	0.0	0.0	0.0	(0.1)
Total comprehensive income (loss)	14.1	(4.7)	31.4	(7.9)
Less: Comprehensive loss attributable to noncontrolling interests	(0.2)	(1.2)	(1.7)	(3.1)
Comprehensive income (loss) attributable to Koppers	$14.3	$(3.5)	$33.1	$(4.8)

Amounts reclassified from accumulated other comprehensive loss to net income consist of amounts shown for changes in unrecognized pension net loss and unrecognized prior service cost. These components of accumulated other comprehensive income are included in the computation of net periodic pension cost as disclosed in Note 13 – Pensions and Postretirement Benefit Plans. Other amounts reclassified from accumulated other comprehensive income include losses related to derivative financial instruments, net of tax, of $1.6 million and $4.8 million for the three and nine months ended September 30, 2016, respectively and $1.8 million and $3.7 million for the three and nine months ended September 30, 2015, respectively.

The following tables present the change in equity (deficit) for the nine months ended September 30, 2016 and 2015, respectively:

(Dollars in millions)	Total Koppers	Noncontrolling Interests	Total Equity (Deficit)

	Shareholders' Equity (Deficit)		
Balance at December 31, 2015	$ (18.5)	$ 6.1	$ (12.4)
Net income (loss)	22.9	(1.5)	21.4
Employee stock plans	6.0	0.0	6.0
Other comprehensive income	10.2	(0.2)	10.0
Repurchases of common stock	(0.3)	0.0	(0.3)
Balance at September 30, 2016	$ 20.3	$ 4.4	$ 24.7

(Dollars in millions)	Total Koppers Shareholders' Equity	Noncontrolling Interests	Total Equity
Balance at December 31, 2014	$ 70.0	$ 13.9	$ 83.9
Net income (loss)	15.7	(2.9)	12.8
Employee stock plans	3.1	0.0	3.1
Other comprehensive loss	(20.5)	(0.2)	(20.7)
Dividends	0.0	(3.5)	(3.5)
Repurchases of common stock	(0.3)	0.0	(0.3)
Balance at September 30, 2015	$ 68.0	$ 7.3	$ 75.3

7. Earnings per Common Share

The computation of basic earnings per common share for the periods presented is based upon the weighted average number of common shares outstanding during the periods. The computation of diluted earnings per common share includes the effect of non-vested nonqualified stock options and restricted stock units assuming such options and stock units were outstanding common shares at the beginning of the period. The effect of antidilutive securities is excluded from the computation of diluted loss per common share, if any.

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

(Dollars in millions, except share amounts, in thousands, and per share amounts)	Three Months Ended September 30, 2016	2015	Nine Months Ended September 30, 2016	2015
Net income attributable to Koppers	$12.1	$10.1	$22.9	$15.7
Less: (Loss) income from discontinued operations	(0.1)	(0.1)	0.5	(0.1)
Income from continuing operations attributable to Koppers	$12.2	$10.2	$22.4	$15.8
Weighted average common shares outstanding:				
Basic	20,657	20,553	20,627	20,537
Effect of dilutive securities	506	79	348	72
Diluted	21,163	20,632	20,975	20,609
Income per common share – continuing operations:				
Basic income per common share	$0.59	$0.49	$1.08	$0.77
Diluted income per common share	0.58	0.49	1.07	0.76
Other data:				
Antidilutive securities excluded from computation of diluted earnings per common share	339	738	421	671

8. Stock-based Compensation

The amended and restated 2005 Long-Term Incentive Plan (the “LTIP”) provides for the grant to eligible persons of stock options, stock appreciation rights, restricted stock, restricted stock units, performance shares, performance awards, dividend equivalents and other stock-based awards, which are collectively referred to as the awards.

Restricted Stock Units and Performance Stock Units

Under the LTIP, the board of directors granted restricted stock units and performance stock units to certain employee participants (collectively, the “stock units”). For grants to employees prior to 2015, restricted stock units vest on the third anniversary of the grant date, assuming continued employment by the participant. For the March 2015 and 2016 grants to employees, the restricted stock units vest in four equal annual installments. Restricted stock units that have one-year vesting periods are also issued under the LTIP to members of the board of directors in connection with annual director compensation and, from time to time, are issued to members of management in connection with employee compensation with varying vesting periods.

Compensation expense for non-vested stock units is recorded over the vesting period based on the fair value at the date of grant. The fair value of restricted stock units and performance stock units with a performance condition is the market price of the underlying common stock on the date of grant.

Performance stock units granted prior to 2016 vest based upon a performance condition. These performance stock units generally have three-year performance objectives and all performance stock units have a three-year period for vesting (if the applicable performance objective is achieved). For awards granted prior to 2016, the applicable performance objective is based upon a multi-year cumulative value creation calculation that considers the Company's financial performance commencing on the first day of each grant year. The number of performance stock units granted represents the target award and participants have the ability to earn between zero and 150 percent or 200 percent (depending on the grant date) of the target award based upon actual performance. If minimum performance criteria are not achieved, no performance stock units will vest.

Performance stock units granted in 2016 vest based upon a market condition. These performance stock units have a three-year performance objective and a three-year period for vesting (if the applicable performance objective is achieved). The applicable performance objective is based on the Company's total shareholder return ("TSR") relative to the Standard & Poors SmallCap 600 Materials Index. The number of performance stock units granted represents the target award and participants have the ability to earn between zero and 200 percent of the target award based upon actual performance. If minimum performance criteria are not achieved, no performance stock units will vest. The Company has the discretion to settle the award in cash rather than shares, although the Company currently expects that all awards will be settled by the issuance of shares.

Compensation expense for non-vested performance stock units with a market condition is recorded over the vesting period based on the fair value at the date of grant. The Company calculated the fair value of the awards on the date of grant using the Monte Carlo valuation model and the assumptions listed below:

	March 2016 Grant	
Grant date price per share of performance award	$ 18.11	
Expected dividend yield per share	0.00	%
Expected volatility	40.86	%
Risk-free interest rate	0.96	%
Look-back period in years	2.84	
Grant date fair value per share of performance award	$ 23.70	

Dividends declared, if any, on the Company's common stock during the period prior to vesting of the stock units are credited at equivalent value as additional stock units and become payable as additional common shares upon vesting. In the event of termination of employment, other than retirement, death or disability, any non-vested stock units are forfeited, including additional stock units credited from dividends. In the event of termination of employment due to retirement, death or disability, pro-rata vesting of the stock units over the service period will result. There are special vesting provisions for the stock units related to a change in control.

The following table shows a summary of the performance stock units as of September 30, 2016:

	Minimum	Target	Maximum
Performance Period	Shares	Shares	Shares
2014 – 2016	0	87,262	130,893
2015 – 2017	0	205,082	410,164
2016 – 2018	0	262,622	525,244

The following table shows a summary of the status and activity of non-vested stock awards for the nine months ended September 30, 2016:

	Restricted Stock Units	Performance Stock Units	Total Stock Units	Weighted Average Grant Date Fair Value per Unit
Non-vested at December 31, 2015	213,208	397,399	610,607	$ 27.29
Granted	172,282	264,981	437,263	$ 22.02
Credited from dividends	950	1,712	2,662	$ 25.47
Vested	(96,950)	0	(96,950)	$ 28.93
Forfeited	(10,244)	(106,541)	(116,785)	$ 37.30

Non-vested at September 30, 2016	279,246	557,551	836,797	$ 22.95

Stock Options

Prior to 2015, stock options to most executive officers vest and become exercisable upon the completion of a three-year service period commencing on the grant date. For the 2015 and 2016 grants, the stock options vest in four equal annual installments. The stock options have a term of 10 years. In the event of termination of employment, other than retirement, death or disability, any non-vested options are forfeited. In the event of termination of employment due to retirement, death or disability, pro-rata vesting of the options over the service period will result. There are special vesting provisions for the stock options related to a change in control.

Compensation expense for non-vested stock options is recorded over the vesting period based on the fair value at the date of grant. The Company calculated the fair value of stock options on the date of grant using the Black-Scholes-Merton model and the assumptions listed below:

	March 2016 Grant	March 2015 Grant	February 2014 Grant
Grant date price per share of stock option award	$ 18.11	$ 17.57	$ 37.93
Expected dividend yield per share	0.00 %	3.40 %	2.75 %
Expected life in years	5.96	5.75	6.50
Expected volatility	40.86 %	42.27 %	52.14 %
Risk-free interest rate	1.45 %	1.73 %	1.98 %
Grant date fair value per share of option award	$ 7.41	$ 5.20	$ 15.26

The dividend yield is based on the Company’s current and prospective dividend rate which calculates a continuous dividend yield based upon the market price of the underlying common stock. The Company suspended its dividend in February 2015 and does not expect to declare any dividends for the foreseeable future. The expected life in years for the

March 2016 and 2015 grants is based on historical exercise data of options previously granted by the Company. The expected life in years for grants prior to 2015 are based on the simplified method permitted under Securities and Exchange Commission Staff Accounting Bulletin No. 14d.2 which calculates the average of the weighted vesting term and the contractual term of the option. This method was selected due to the lack of historical exercise data with respect to the Company at the time of those grants. Expected volatility is based on the historical volatility of the Company's common stock and the historical volatility of certain other similar public companies. The risk-free interest rate is based on U.S. Treasury bill rates for the expected life of the option.

The following table shows a summary of the status and activity of stock options for the nine months ended September 30, 2016:

	Options	Weighted Average Exercise Price per Option	Weighted Average Remaining Contractual Term (in years)	Aggregate Intrinsic Value (in millions)
Outstanding at December 31, 2015	774,249	$ 28.46		
Granted	211,193	$ 18.11		
Exercised	(14,301)	$ 26.02		
Forfeited	(19,539)	$ 23.70		
Outstanding at September 30, 2016	951,602	$ 26.29	6.75	$ 3.3
Exercisable at September 30, 2016	452,730	$ 33.24	4.49	$ 1.7

Stock Compensation Expense

Total stock-based compensation expense recognized for the three and nine months ended September 30, 2016 and 2015 is as follows:

	Three Months Ended September 30,		Nine Months Ended September 30,	
(Dollars in millions)	2016	2015	2016	2015
Stock-based compensation expense recognized:				
Selling, general and administrative expenses	$ 2.3	$ 1.1	$ 5.7	$ 3.1
Less related income tax benefit	1.0	0.4	2.3	1.2
	$ 1.3	$ 0.7	$ 3.4	$ 1.9

As of September 30, 2016, total future gross compensation expense related to non-vested stock-based compensation arrangements, which are expected to vest, totaled $12.9 million and the weighted-average period over which this cost is expected to be recognized is approximately 28 months.

9. Segment Information

The Company has three reportable segments: Railroad and Utility Products and Services, Carbon Materials and Chemicals, and Performance Chemicals. The Company's reportable segments contain multiple aggregated business units since management believes the long-term financial performance of these business units is affected by similar economic conditions. The reportable segments are each managed separately because they manufacture and distribute distinct products with different production processes.

The Company's Railroad and Utility Products and Services segment sells treated and untreated wood products, manufactured products and services primarily to the railroad and public utility markets. Railroad products and services include procuring and treating items such as crossties, switch ties and various types of lumber used for railroad bridges and crossings and the manufacture of rail joint bars. The segment also operates a railroad services business that conducts engineering, design, repair and inspection services for railroad bridges. Utility products include the treating of transmission and distribution poles and pilings.

The Company's Carbon Materials and Chemicals segment is primarily a manufacturer of carbon pitch, naphthalene, phthalic anhydride, creosote and carbon black feedstock. Carbon pitch is a critical raw material used in the production of aluminum and for the production of steel in electric arc furnaces. Naphthalene is used for the production of phthalic anhydride and as a surfactant in the production of concrete. Phthalic anhydride is used in the production of plasticizers, polyester resins and alkyd paints. Creosote is used in the treatment of wood and carbon black feedstock is used in the production of carbon black.

The Company's Performance Chemicals segment develops, manufactures, and markets wood preservation chemicals and wood treatment technologies and services a diverse range of end-markets including infrastructure, residential and commercial construction, and agriculture.

The Company evaluates performance and determines resource allocations based on a number of factors, the primary measure being operating profit or loss from operations. Operating profit does not include equity in earnings of affiliates, other income, interest expense, income taxes or operating costs of Koppers Holdings Inc. The accounting policies of the reportable segments are the same as those described in the summary of significant accounting policies. Intersegment transactions are eliminated in consolidation.

The following table sets forth certain sales and operating data, net of all intersegment transactions, for the Company's segments for the periods indicated:

	Three Months Ended September 30,		Nine Months Ended September 30,	
(Dollars in millions)	2016	2015	2016	2015
Revenues from external customers:				
Railroad and Utility Products and Services	$145.7	$177.6	$461.5	$506.6
Carbon Materials and Chemicals	117.8	163.0	337.5	479.6
Performance Chemicals	107.6	93.2	304.0	277.0
Total	$371.1	$433.8	$1,103.0	$1,263.2
Intersegment revenues:				
Carbon Materials and Chemicals	$26.2	$23.1	$68.1	$63.6
Performance Chemicals	2.3	2.0	6.2	6.3
Total	$28.5	$25.1	$74.3	$69.9
Depreciation and amortization expense:				
Railroad and Utility Products and Services[(a)]	$2.9	$3.6	$9.9	$11.1
Carbon Materials and Chemicals[(b)]	6.2	7.2	17.8	19.9
Performance Chemicals	4.7	4.7	14.3	14.2
Total	$13.8	$15.5	$42.0	$45.2
Operating profit (loss):				
Railroad and Utility Products and Services[(c)]	$14.9	$17.7	$46.9	$48.1
Carbon Materials and Chemicals[(d)]	(3.9)	0.0	(29.8)	(13.8)
Performance Chemicals	17.6	9.7	52.6	31.6
Corporate[(e)]	(0.9)	(0.4)	(2.2)	(4.9)
Total	$27.7	$27.0	$67.5	$61.0

(a) Excludes impairment charges of $2.5 million for the nine months ended September 30, 2015 for a wood treating facility in the United States.

(b) Excludes impairment charges of $3.5 million for the three and nine months ended September 30, 2016 for a coal tar distillation facility in the United States.

(c) Includes gain on sale of the Company's North American utility pole business of $3.2 million and impairment charges of $2.5 million for the nine months ended September 30, 2015.

(d) Includes gain on sale of the Company's United Kingdom coal tar distillation business of $2.1 million and impairment charges of $3.5 million for the three and nine months ended September 30, 2016.

(e) Operating loss for Corporate includes general and administrative costs for Koppers Holdings Inc., the parent company of Koppers Inc., and foreign exchange revaluation related to intercompany loans in connection with a legal reorganization of the Company.

The following table sets forth certain tangible and intangible assets allocated to each of the Company's segments as of the dates indicated:

(Dollars in millions)	September 30, 2016	December 31, 2015
Segment assets:		
Railroad and Utility Products and Services	$ 271.4	$ 254.1
Carbon Materials and Chemicals	336.5	368.4
Performance Chemicals	447.3	441.3
All other	45.6	49.1
Total	$ 1,100.8	$ 1,112.9
Goodwill:		
Railroad and Utility Products and Services	$ 10.2	$ 9.9
Performance Chemicals	177.6	176.7
Total	$ 187.8	$ 186.6

10. Income Taxes

Effective Tax Rate

The income tax provision for interim periods is comprised of an estimated annual effective income tax rate applied to current year ordinary income and tax associated with discrete items. These discrete items generally relate to adjustments to uncertain tax positions and changes of estimated tax to the actual liability determined upon filing tax returns. To determine the annual effective tax rate, management is required to make estimates of annual pretax income in each domestic and foreign jurisdictions in which the Company conducts business. Entities that have historical pre-tax losses and current year estimated pre-tax losses that are not projected to generate a future benefit are excluded from the estimated annual effective income tax rate.

The estimated annual effective income tax rate, excluding the items discussed above, was 29.1 percent and 33.1 percent for the nine months ended September 30, 2016 and 2015, respectively. The estimated annual effective income tax rate differs from the U.S. federal statutory tax rate due to:

	September 30, 2016		September 30, 2015	
Federal income tax rate	35.0	%	35.0	%
State income taxes, net of federal tax benefit	1.8		(0.8	)
Foreign earnings taxed at different rates	(9.4	)	(3.7	)
Change in tax contingency reserves	0.6		1.2	
Nondeductible expenses	1.2		1.4	
Tax credits	(0.4	)	0.0	
Other	0.3		0.0	
Estimated annual effective income tax rate	29.1	%	33.1	%

Income taxes as a percentage of pretax income were 33.4 percent and 43.7 percent for the nine months ended September 30, 2016 and September 30, 2015, respectively. This exceeds the estimated annual effective income tax rates for these periods primarily because, as explained above, the estimated annual effective income tax rate is applied to pre-tax earnings excluding the losses of our Chinese entities. This effect is partially offset by discrete items.

Discrete items included in income taxes for the nine months ended September 30, 2016 were not material. Discrete items included in income taxes for the nine months ended September 30, 2015 were $1.6 million and were related to recognition of previously unrecognized tax benefits and the closure of an IRS audit of the Company’s US tax returns through 2011.

During the year, management regularly updates estimates of pre-tax income and income tax expense based on changes in the business’ earnings projections, the earnings mix by taxable jurisdiction, uncertain tax positions, and other tax matters. To the extent that actual results vary from these estimates, the actual annual effective income tax rate at the end of the year could be materially different from the estimated annual effective income tax rate as of the end of the third quarter.

Uncertain Tax Positions

The Company and its subsidiaries file income tax returns in the U.S. federal jurisdiction, individual U.S. state jurisdictions and non-U.S. jurisdictions. With few exceptions, the Company is no longer subject to U.S. federal, state and local, or non-U.S. income tax examinations by tax authorities for years before 2011.

As of September 30, 2016 and December 31, 2015, the total amount of unrecognized tax benefits that, if recognized, would affect the effective tax rate, was approximately $5.4 million and $5.2 million, respectively. Unrecognized tax benefits totaled $7.5 million and $7.7 million as of September 30, 2016 and December 31, 2015, respectively. The Company recognizes interest expense and any related penalties from uncertain tax positions in income tax expense. As of September 30, 2016 and December 31, 2015 the Company had accrued approximately $3.4 million and $3.0 million for interest and penalties, respectively.

11. Inventories

Net inventories as of September 30, 2016 and December 31, 2015 are summarized in the table below:

(Dollars in millions)	September 30, 2016	December 31, 2015
Raw materials	$ 154.2	$ 169.8
Work in process	15.9	15.5
Finished goods	98.4	97.4
	$ 268.5	$ 282.7
Less revaluation to LIFO	52.3	56.3
Net	$ 216.2	$ 226.4

12. Property, Plant and Equipment

Property, plant and equipment as of September 30, 2016 and December 31, 2015 are summarized in the table below:

(Dollars in millions)	September 30, 2016	December 31, 2015
Land	$ 17.4	$ 17.6
Buildings	61.9	62.8
Machinery and equipment	712.2	705.6
	$ 791.5	$ 786.0
Less accumulated depreciation	514.3	508.2
Net	$ 277.2	$ 277.8

Impairments – Impairment charges were $3.5 million for the three and nine months ended September 30, 2016. Impairment charges were $2.5 million for the nine months ended September 30, 2015. The 2016 charges were related to the Carbon Materials and Chemicals coal tar distillation plant in Clairton, Pennsylvania. The 2015 charges were related to the Railroad and Utility Products and Services wood treating plant in Green Spring, West Virginia and were calculated using a probability-weighted discounted cash flow model.

13. Pensions and Postretirement Benefit Plans

The Company and its subsidiaries maintain a number of defined benefit and defined contribution plans to provide retirement benefits for employees in the U.S., as well as employees outside the U.S. These plans are maintained and contributions are made in accordance with the Employee Retirement Income Security Act of 1974 (“ERISA”), local statutory law or as determined by the board of directors. The defined benefit pension plans generally provide benefits based upon years of service and compensation. Pension plans are funded except for three domestic non-qualified defined benefit pension plans for certain key executives.

In the U.S., all qualified defined benefit pension plans for salaried and hourly employees have been closed to new participants and have been frozen. Accordingly, these pension plans no longer accrue additional years of service or recognize future increases in compensation for benefit purposes.

The defined contribution plans generally provide retirement assets to employee participants based upon employer and employee contributions to the participant’s individual investment account. The Company also provides retiree medical insurance coverage to certain U.S. employees and a life insurance benefit to most U.S. employees. For salaried employees, the retiree medical and retiree insurance plans have been closed to new participants.

In the third quarter of 2016, the Company offered a cash lump sum or annuity buyout to its terminated deferred vested participants in its U.S. defined benefit pension plan. Approximately 400 participants elected either a lump sum payout or annuity from a third party provider. The total dollar amount to be paid out of our defined benefit plan assets in the fourth quarter of 2016 is estimated to be approximately $14 million. We estimate that the Company will record a pension settlement loss of $4.5 million in the fourth quarter of 2016.

The following table provides the components of net periodic benefit cost for the pension plans and other benefit plans for the three and nine months ended September 30, 2016 and 2015:

	Three Months Ended September 30,		Nine Months Ended September 30,	
(Dollars in millions)	2016	2015	2016	2015
Service cost	$ 0.4	$ 0.5	$ 1.3	$ 1.5
Interest cost	2.7	2.7	8.3	8.1
Expected return on plan assets	(2.6)	(3.0)	(7.9)	(9.0)
Amortization of prior service cost	0.0	(0.1)	0.0	(0.2)
Amortization of net loss	0.5	1.7	1.7	5.0
Net periodic benefit cost	$ 1.0	$ 1.8	$ 3.4	$ 5.4
Defined contribution plan expense[(a)]	$ 2.0	$ 2.1	$ 5.8	$ 4.2

(a) The nine months ended September 30, 2015 includes reversal of 2014 discretionary 401k match accrual of $2.2 million.

14. Debt

Debt at September 30, 2016 and December 31, 2015 was as follows:

	Weighted Average Interest Rate	Maturity	September 30, 2016	December 31, 2015
(Dollars in millions)				
Term Loan	4.30%	2019	$ 240.0	$ 262.5
Revolving Credit Facility	4.30%	2019	110.0	130.0
Construction and other loans	4.76%	2018	43.0	44.8
Senior Notes	7 7/8%	2019	298.0	297.5
Total debt			691.0	734.8
Less short term debt and current maturities of long-term debt			39.5	39.9

Less unamortized debt issuance costs	9.5	12.5
Long-term debt	$ 642.0	$ 682.4

Revolving Credit Facility

On August 15, 2014, Koppers Inc. entered into a $500.0 million senior secured revolving credit facility and a $300.0 million senior secured term loan (the “Senior Secured Credit Facilities”). Both borrowings mature on August 15, 2019. The interest rates on these borrowings are variable and are based on LIBOR. The senior secured term loan has quarterly principal repayment obligations of 2.5 percent of the original principal amount borrowed, or $7.5 million.

Borrowings under the revolving credit facility and term loan are secured by a first priority lien on substantially all of the assets of Koppers Inc. and its material domestic subsidiaries. The revolving credit facility and term loan contain certain covenants for Koppers Inc. and its restricted subsidiaries that limit capital expenditures, additional indebtedness, liens, dividends, investments or acquisitions. In addition, such covenants give rise to events of default upon the failure by Koppers Inc. and its restricted subsidiaries to meet certain financial ratios.

The Company entered into an amendment of the revolving credit facility dated April 8, 2016 which reduced the $500.0 million senior secured revolving credit facility to $300.0 million and also amended the leverage ratio covenant requirements. In connection with the amendment, $2.0 million of prior deferred financing costs were required to be written off through interest expense.

As of September 30, 2016, the Company had $148.3 million of unused revolving credit availability for working capital purposes after restrictions from certain letter of credit commitments and other covenants. As of September 30, 2016, $41.7 million of commitments were utilized by outstanding letters of credit.

Construction Loans

On November 18, 2013, the Company’s 75-percent owned subsidiary, Koppers (Jiangsu) Carbon Chemical Company Limited (“KJCC”) entered into two committed loan facility agreements for a combined commitment of RMB 265 million or

approximately $44 million. The third party bank provided facility has a commitment amount of RMB 198.8 million and the other committed facility of RMB 66.2 million is provided by the 25-percent non-controlling shareholder in KJCC. Borrowings under the third party bank facility are secured by a letter of credit issued by a bank under the Koppers Inc. revolving credit facility. The committed facilities were used to finance the costs related to the construction of the coal tar distillation plant in Pizhou, Jiangsu province in China.

KJCC will repay the loans in six installments every six months starting in June 2018 with a final repayment on December 21, 2020, the maturity date of the loans.

Senior Notes

The Koppers Inc. $7^7/_8$ percent Senior Notes due 2019 (the “Senior Notes”) were issued on December 1, 2009 at an offering price of 98.311 percent of face value, or $294.9 million and have a principal amount at maturity of $300.0 million. The Senior Notes have an effective interest rate yield of $8^1/_8$ percent per annum. The Senior Notes are our senior obligations, are fully and unconditionally guaranteed by Koppers Holdings Inc. and certain of our wholly-owned domestic subsidiaries, and are secured equally and ratably with the obligations under our Senior Secured Credit Facilities.

Interest on the Senior Notes is payable semiannually on December 1 and June 1 each year. On or after December 1, 2015, the Company is entitled to redeem all or a portion of the Senior Notes at a redemption price of 102.625 percent of principal value, declining to a redemption price of 101.313 on or after December 1, 2016 until the redemption price is equivalent to the principal value on December 1, 2017.

The indenture governing the Senior Notes includes customary covenants that restrict, among other things, the ability of Koppers Inc. and its restricted subsidiaries to incur additional debt, pay dividends or make certain other restricted payments, incur liens, merge or sell all or substantially all of the assets of Koppers Inc. or its subsidiaries or enter into various transactions with affiliates.

15. Asset Retirement Obligations

The Company recognizes asset retirement obligations for the removal and disposal of residues; dismantling of certain tanks required by governmental authorities; and cleaning costs for leased and owned rail cars and barges. The following table reflects changes in the carrying values of asset retirement obligations:

(Dollars in millions)	September 30, 2016	December 31, 2015
Asset retirement obligation at beginning of year	$ 46.5	$ 30.5
(Divestiture) acquisition	(8.0)	0.7
Accretion expense	6.2	3.7
Revision in estimated cash flows	0.9	24.4
Cash expenditures	(8.7)	(12.1)

Currency translation	(0.7)	(0.7)
Balance at end of period	$ 36.2	$ 46.5

16. Deferred Revenue

The Company defers revenues associated with extended product warranty liabilities based on historical loss experience and sales of extended warranties on certain products. In addition, the Company received an advance payment in 2015 related to an amendment to a 50-year supply agreement with a customer in China. The deferred revenue associated with this amendment is being amortized over the life of the underlying contract. The following table reflects changes in the carrying values of deferred revenue:

(Dollars in millions)	September 30, 2016	December 31, 2015
Balance at beginning of year	$ 30.1	$ 2.5
Advance payment	0.0	30.0
Revenue earned	(0.6)	(1.0)
Currency translation	(0.8)	(1.4)
Balance at end of period	$ 28.7	$ 30.1

Deferred revenue classified in other long-term liabilities in the consolidated balance sheet totaled $27.6 million as of September 30, 2016 and $29.1 million as of December 31, 2015.

17. Derivative Financial Instruments

The Company utilizes derivative instruments to manage exposures to risks that have been identified and measured and are capable of being controlled. The primary risks managed by the company by using derivative instruments are commodity price risk associated with copper and foreign currency exchange risk associated with a number of currencies, principally the U.S. dollar, the Canadian dollar, the New Zealand dollar, the Euro and British pounds. Swap contracts on copper are used to manage the price risk associated with forecasted purchases of materials used in the Company's manufacturing processes. Generally, the Company will not hedge cash flow exposures for durations longer than 30 months. The Company enters into foreign currency forward contracts to manage foreign currency risk associated with the Company's receivable and payable balances. Generally, the Company enters into master netting arrangements with the counterparties and offsets net derivative positions with the same counterparties. Currently, the Company's agreements do not require cash collateral.

ASC Topic 815-10, "Derivatives and Hedging," requires companies to recognize all derivative instruments as either assets or liabilities at fair value in the balance sheet. Derivative instruments' fair value is determined using significant other observable inputs, or Level 2 in the fair value hierarchy. In accordance with ASC Topic 815-10, the Company designates certain commodity swaps as cash flow hedges of forecasted purchases of commodities. For derivative instruments that are designated and qualify as cash flow hedges, the effective portion of the gain or loss on the derivative is reported as a component of other comprehensive (loss) income and is reclassified into cost of sales in the same period or periods during which the hedged transaction affects earnings. Gains and losses on the derivative instruments representing either hedge ineffectiveness or hedge components excluded from the assessment of effectiveness are recognized immediately in cost of sales.

For those commodity swaps which are not designated as cash flow hedges, the fair value of the commodity swap is recognized as an asset or liability in the consolidated balance sheet and the related gain or loss on the derivative is reported in current earnings.

As of September 30, 2016 and December 31, 2015, the Company has outstanding copper swap contracts of the following amounts:

	Units Outstanding (in Pounds)		Net Fair Value - Asset (Liability)	
	September 30, 2016	December 31, 2015	September 30, 2016	December 31, 2015
(Amounts in millions)				
Cash flow hedges	37.8	17.3	$(0.5)	$ (9.8)
Not designated as hedges	3.7	4.0	(0.4)	(0.7)
Total	41.5	21.3	$(0.9)	$ (10.5)

As of September 30, 2016 and December 31, 2015, the fair value of the outstanding copper swap contracts is recorded in the balance sheet as follows:

	September 30, 2016	December 31, 2015

(Dollars in millions)		
Other current assets	$ 1.9	$ 0.1
Accrued liabilities	(2.8)	(10.6)
Net liability on balance sheet	$ (0.9)	$ (10.5)
Accumulated other comprehensive loss, net of tax	$ 0.6	$ 6.1

Based upon contracts outstanding at September 30, 2016, in the next twelve months the Company estimates that $0.7 million of unrealized losses, net of tax, related to commodity price hedging will be reclassified from other comprehensive income (loss) into earnings.

See Note 6 – Comprehensive Income (Loss) and Equity (Deficit), for amounts recorded in other comprehensive income and for amounts reclassified from accumulated other comprehensive income to net income for the periods specified below. For the three and nine months ended September 30, 2016 and 2015, the following amounts were recognized in earnings related to copper swap contracts:

	Three Months Ended September 30,		Nine Months Ended September 30,	
	2016	2015	2016	2015
(Dollars in millions)				
(Loss) gain from ineffectiveness of cash flow hedges	$ (0.4)	$ 0.0	$ (0.5)	$ 0.3
(Loss) gain from contracts not designated as hedges	0.0	0.0	(0.3)	0.1
Net	$ (0.4)	$ 0.0	$ (0.8)	$ 0.4

Forward contracts related to foreign currency are not designated as hedges and fair value changes in these contracts are immediately charged to earnings and are classified in cost of sales in the Condensed Consolidated Statement of Operations and Comprehensive Income (Loss). As of September 30, 2016, the Company has outstanding foreign currency forward contracts with a net fair value totaling $(1.3) million, consisting of a gross derivative liability of $1.5 million (recognized in accrued liabilities in the balance sheet) and a gross derivative asset of $0.2 million (recognized in other current assets in the balance sheet). As of December 31, 2015, the Company has outstanding currency forward contracts with a net fair value totaling $(1.9) million, recognized as a liability in accrued liabilities in the balance sheet.

As of September 30, 2016 and December 31, 2015, the net currency units outstanding were:

	September 30, 2016	December 31, 2015
(In millions)		
British Pounds	GBP 4.7	GBP 5.9
New Zealand Dollars	NZD 18.0	NZD 22.5
United States Dollars	USD 46.8	USD 36.0
Canadian Dollars	CAD 1.2	CAD 4.0

18. Commitments and Contingent Liabilities

The Company and its subsidiaries are involved in litigation and various proceedings relating to environmental laws and regulations and toxic tort, product liability and other matters. Certain of these matters are discussed below. The ultimate resolution of these contingencies is subject to significant uncertainty and should the Company or its subsidiaries fail to prevail in any of these legal matters or should several of these legal matters be resolved against the Company or its subsidiaries in the same reporting period, these legal matters could, individually or in the aggregate, be material to the consolidated financial statements.

Legal Proceedings

Coal Tar Pitch Cases. Koppers Inc. is one of several defendants in lawsuits filed in two states in which the plaintiffs claim they suffered a variety of illnesses (including cancer) as a result of exposure to coal tar pitch sold by the defendants. There are 103 plaintiffs in 55 cases pending as of September 30, 2016, compared to 110 plaintiffs in 59 cases pending as of December 31, 2015. As of September 30, 2016, there are a total of 54 cases pending in state court in Pennsylvania, and one case pending in state court in Tennessee.

The plaintiffs in all 55 pending cases seek to recover compensatory damages. Plaintiffs in 50 of those cases also seek to recover punitive damages. The plaintiffs in the 54 cases filed in Pennsylvania state court seek unspecified damages in excess of the court’s minimum jurisdictional limit. The plaintiff in the Tennessee state court case seeks damages of $15.0 million. The other defendants in these lawsuits vary from case to case and include companies such as Beazer East, Inc. (“Beazer East”), Honeywell International Inc., Graftech International Holdings, Dow Chemical Company, UCAR Carbon Company, Inc., and SGL Carbon Corporation. Discovery is proceeding in these cases. No trial dates have been set in any of these cases.

The Company has not provided a reserve for these lawsuits because, at this time, the Company cannot reasonably determine the probability of a loss, and the amount of loss, if any, cannot be reasonably estimated. The timing of resolution of these cases cannot be reasonably determined. Although Koppers Inc. is vigorously defending these cases, an unfavorable resolution of these matters may have a material adverse effect on the Company's business, financial condition, cash flows and results of operations.

Gainesville. Koppers Inc. operated a utility pole treatment plant in Gainesville from December 29, 1988 until its closure in 2009. The property upon which the utility pole treatment plant was located was sold by Koppers Inc. to Beazer East in 2010.

In November 2010, a class action complaint was filed in the Circuit Court of the Eighth Judicial Circuit located in Alachua County, Florida by residential real property owners located in a neighborhood west of and immediately adjacent to the former utility pole treatment plant in Gainesville. The complaint named Koppers Holdings Inc., Koppers Inc., Beazer East and several other parties as defendants. In a second amended complaint, plaintiffs allege that chemicals and contaminants from the Gainesville plant have contaminated real properties of the putative class members, have caused property damage (diminution in value) and have placed residents and owners of the putative class properties at an elevated risk of exposure to and injury from the chemicals at issue. The plaintiffs presently seek a class comprised of all current property owners of single family residential properties within a polygon-shaped area extending approximately two miles from the former plant area (which area encompasses approximately 7,000 owners).

The case was removed to the United States District Court for the Northern District of Florida in December 2010. Koppers Holdings Inc. was dismissed from the case by the district court for lack of personal jurisdiction. Class factual discovery

closed in May 2015 and expert witness discovery was completed in August 2015. Discovery on the merits is stayed until further order of the court. Motions were subsequently filed by each side to strike or limit the testimony of the other side's experts. Plaintiffs filed a motion for class certification on September 30, 2015 and the response of Koppers Inc. was filed on October 30, 2015. A hearing on plaintiffs' motion for class certification and the parties' motions relating to experts was held in January 2016 and the parties await a ruling from the court.

The Company has not provided a reserve for this matter because, at this time, it cannot reasonably determine the probability of a loss, and the amount of loss, if any, cannot be reasonably estimated. The timing of resolution of this case cannot be reasonably determined. Although the Company is vigorously defending this case, an unfavorable resolution of this matter may have a material adverse effect on the Company's business, financial condition, cash flows and results of operations.

Virgin Islands. On August 15, 2016, the court formally dismissed Koppers Performance Chemicals ("PC") from a putative class action lawsuit filed in the United States District Court of the Virgin Islands which alleged that PC's wood preservative products and formulas are defective.

Environmental and Other Litigation Matters

The Company and its subsidiaries are subject to federal, state, local and foreign laws and regulations and potential liabilities relating to the protection of the environment and human health and safety including, among other things, the cleanup of contaminated sites, the treatment, storage and disposal of wastes, the discharge of effluent into waterways, the emission of substances into the air and various health and safety matters. The Company's subsidiaries expect to incur substantial costs for ongoing compliance with such laws and regulations. The Company's subsidiaries may also face governmental or third-party claims, or otherwise incur costs, relating to cleanup of, or for injuries resulting from, contamination at sites associated with past and present operations. The Company accrues for environmental liabilities when a determination can be made that a liability is probable and reasonably estimable.

Environmental and Other Liabilities Retained or Assumed by Others. The Company's subsidiaries have agreements with former owners of certain of their operating locations under which the former owners retained, assumed and/or agreed to indemnify such subsidiaries against certain environmental and other liabilities. The most significant of these agreements was entered into at Koppers Inc.'s formation on December 29, 1988 (the "Acquisition"). Under the related asset purchase agreement between Koppers Inc. and Beazer East, subject to certain limitations, Beazer East retained the responsibility for and agreed to indemnify Koppers Inc. against certain liabilities, damages, losses and costs, including, with certain limited exceptions, liabilities under and costs to comply with environmental laws to the extent attributable to acts or omissions occurring prior to the Acquisition and liabilities related to products sold by Beazer East prior to the Acquisition (the "Indemnity"). Beazer Limited, the parent company of Beazer East, unconditionally guaranteed Beazer East's performance of the Indemnity pursuant to a guarantee (the "Guarantee"). In 1998, the parent company of Beazer East purchased an insurance policy under which the funding and risk of certain environmental and other liabilities relating to the former Koppers Company, Inc. operations of Beazer East (which includes locations purchased from Beazer East by Koppers Inc.) are underwritten by Centre Solutions (a member of the Zurich Group) and Swiss Re. Beazer East is a wholly-owned, indirect subsidiary of Heidelberg Cement AG.

The Indemnity provides different mechanisms, subject to certain limitations, by which Beazer East is obligated to indemnify Koppers Inc. with regard to certain environmental, product and other liabilities and imposes certain conditions on Koppers Inc. before receiving such indemnification, including, in some cases, certain limitations regarding the time period as to which claims for indemnification can be brought. In July 2004, Koppers Inc. and Beazer East agreed to amend the environmental indemnification provisions of the December 29, 1988 asset purchase agreement to extend the indemnification period for pre-closing environmental liabilities through July 2019. As consideration for the amendment, Koppers Inc. paid Beazer East a total of $7.0 million and agreed to share toxic tort

litigation defense costs arising from any sites acquired from Beazer East. The July 2004 amendment did not change the provisions of the Indemnity with respect to indemnification for non-environmental claims, such as product liability claims, which may continue to be asserted after July 2019.

Qualified expenditures under the Indemnity are not subject to a monetary limit. Qualified expenditures under the Indemnity include (i) environmental cleanup liabilities required by third parties, such as investigation, remediation and closure costs, relating to pre-December 29, 1988 ("Pre-Closing") acts or omissions of Beazer East or its predecessors; (ii) environmental claims by third parties for personal injuries, property damages and natural resources damages relating to Pre-Closing acts or omissions of Beazer East or its predecessors; (iii) punitive damages for the acts or omissions of Beazer East and its predecessors without regard to the date of the alleged conduct and (iv) product liability claims for products sold by Beazer East or its predecessors without regard to the date of the alleged conduct. If the third party claims described in sections (i) and (ii) above are not made by July 2019, Beazer East will not be required to pay the costs arising from such claims under the Indemnity. However, with respect to any such claims which are made by July 2019, Beazer East will continue to be responsible for such claims under the Indemnity beyond July 2019. The Indemnity provides for the resolution of issues

between Koppers Inc. and Beazer East by an arbitrator on an expedited basis upon the request of either party. The arbitrator could be asked, among other things, to make a determination regarding the allocation of environmental responsibilities between Koppers Inc. and Beazer East. Arbitration decisions under the Indemnity are final and binding on the parties.

Contamination has been identified at most manufacturing and other sites of the Company's subsidiaries. One site currently owned and operated by Koppers Inc. in the United States is listed on the National Priorities List promulgated under the Comprehensive Environmental Response, Compensation, and Liability Act of 1980, as amended ("CERCLA"). Currently, at the properties acquired from Beazer East (which includes the National Priorities List site and all but one of the sites permitted under the Resource Conservation and Recovery Act ("RCRA")), a significant portion of all investigative, cleanup and closure activities are being conducted and paid for by Beazer East pursuant to the terms of the Indemnity. In addition, other of Koppers Inc.'s sites are or have been operated under RCRA and various other environmental permits, and remedial and closure activities are being conducted at some of these sites.

To date, the parties that retained, assumed and/or agreed to indemnify the Company against the liabilities referred to above, including Beazer East, have performed their obligations in all material respects. The Company believes that, for the last three years ended December 31, 2015, amounts paid by Beazer East as a result of its environmental remediation obligations under the Indemnity have averaged in total approximately $10 million per year. Periodically, issues have arisen between Koppers Inc. and Beazer East and/or other indemnitors that have been resolved without arbitration. Koppers Inc. and Beazer East engage in discussions from time to time that involve, among other things, the allocation of environmental costs related to certain operating and closed facilities.

If for any reason (including disputed coverage or financial incapability) one or more of such parties fail to perform their obligations and the Company or its subsidiaries are held liable for or otherwise required to pay all or part of such liabilities without reimbursement, the imposition of such liabilities on the Company or its subsidiaries could have a material adverse effect on its business, financial condition, cash flows and results of operations. Furthermore, the Company could be required to record a contingent liability on its balance sheet with respect to such matters, which could result in a negative impact to the Company's business, financial condition, cash flows and results of operations.

Domestic Environmental Matters. Koppers Inc. has been named as one of the potentially responsible parties ("PRPs") at the Portland Harbor CERCLA site located on the Willamette River in Oregon. Koppers Inc. operated a coal tar pitch terminal near the site. Koppers Inc. has responded to an Environmental Protection Agency ("EPA") information request and has executed a PRP agreement which outlines the process to develop an allocation of past and future costs among more than 80 parties to the site. Koppers Inc. believes it is a de minimus contributor at the site. Additionally, a separate natural resources damages assessment ("NRDA") is being conducted by a local trustee group. The NRDA is intended to identify further information necessary to estimate liabilities for settlements of natural resource damages ("NRD") claims. Koppers Inc. may also incur liabilities under the NRD process and has entered into a separate process to develop an allocation of NRDA cost.

The EPA completed its own Feasibility Study ("FS") and issued a proposed plan for public comment in June 2016. The proposed remedy includes a combination of sediment removal, capping, enhanced and monitored natural remediation and riverbank improvements. The FS does not determine who is responsible for remediation costs. The net present value and undiscounted cost of the proposed remedy as estimated in the proposed plan are approximately $800 million and $1.2 billion, respectively. Responsibility for implementing and funding that work will be decided in the separate allocation process.

In September 2009, Koppers Inc. received a general notice letter notifying it that it may be a PRP at the Newark Bay CERCLA site. In January 2010, Koppers Inc. submitted a response to the general notice letter asserting that Koppers Inc. is a de minimus party at this site.

Other than the estimated costs of participating in the PRP group at the Portland Harbor and Newark Bay CERCLA sites totaling $0.9 million at September 30, 2016 the Company has not provided a reserve for these matters because there has not been a determination of the total cost of the investigations, the remediation that will be required, the amount of natural resources damages or how those costs will be allocated among the PRPs at the sites. Accordingly, the Company believes that it cannot reasonably determine the probability of a loss, and the amount of loss, if any, cannot be reasonably estimated. An unfavorable resolution of these matters may have a material adverse effect on the Company's business, financial condition, cash flows and results of operations.

In connection with Koppers Inc.'s acquisition of Osmose, Inc., there are two plant sites in the United States where the Company has recorded an environmental remediation liability for soil and groundwater contamination which occurred prior to the acquisition. As of September 30, 2016, the Company's estimated environmental remediation liability for these acquired sites totals $5.1 million.

Foreign Environmental Matters. In connection with Koppers Inc.'s acquisition of Osmose, Inc., there are three plant sites located in the United Kingdom and Australia where the Company has recorded an environmental remediation liability

for soil and groundwater contamination which occurred prior to the acquisition. As of September 30, 2016, the Company's estimated environmental remediation liability for these acquired sites totals $5.7 million. Osmose Holdings, Inc. has provided an indemnity of up to $5 million for certain environmental response costs incurred prior to August 15, 2017 (the "Osmose Indemnity"). In June 2016, the Company recorded an increase in the receivable under the Osmose Indemnity of $2.9 million related to expected indemnity recoveries associated with the acquired United Kingdom site. As of September 30, 2016, the receivable with respect to the Osmose Indemnity totaled $2.7 million.

In December 2011, the Company ceased manufacturing operations at its Continental Carbon facility located in Kurnell, Australia. The Company has accrued its expected cost of site remediation resulting from the closure of $2.4 million as of September 30, 2016.

Environmental Reserves Rollforward. The following table reflects changes in the accrued liability for environmental matters, of which $8.4 million and $7.0 million are classified as current liabilities at September 30, 2016 and December 31, 2015, respectively:

	Period ended	
	September 30, 2016	December 31, 2015
(Dollars in millions)		
Balance at beginning of year	$19.8	$ 7.8
Expense	0.4	1.2
Reversal of reserves	(0.1)	(0.5)
Cash expenditures	(4.0)	(1.4)
Acquisition	0.0	13.7
Disposal	(0.5)	0.0
Currency translation	(0.4)	(1.0)
Balance at end of period	$15.2	$ 19.8

19. Subsidiary Guarantor Information for Koppers Inc. Senior Notes

On December 1, 2009, Koppers Inc. issued $300.0 million principal value of Senior Notes. Koppers Holdings and each of Koppers Inc.'s 100 percent-owned material domestic subsidiaries other than Koppers Assurance, Inc. fully and unconditionally guarantee the payment of principal and interest on the Senior Notes. The domestic guarantor subsidiaries include Koppers World-Wide Ventures Corporation, Koppers Delaware, Inc., Koppers Concrete Products, Inc., Concrete Partners, Inc., Koppers Asia LLC, Koppers Ventures Inc., Koppers Performance Chemicals Inc., Koppers – Nevada LLC, Koppers NZ, LLC, Koppers Railroad Structures Inc., Wood Protection LP and Wood Protection Management LLC. Non-guarantor subsidiaries are owned directly or indirectly by Koppers Inc.

The guarantee of a guarantor subsidiary will be automatically and unconditionally released and discharged in the event of:

§ any sale of the capital stock or substantially all of the assets of the guarantor subsidiary;
§

- the designation of the guarantor subsidiary as an unrestricted subsidiary in accordance with the indenture governing the Senior Notes; and
- the legal defeasance, covenant defeasance or satisfaction and discharge of the indenture governing the Senior Notes.

Koppers Holdings depends on the dividends from the earnings of Koppers Inc. and its subsidiaries to generate the funds necessary to meet its financial obligations, including the payment of any declared dividend of Koppers Holdings. Koppers Inc.'s credit agreement prohibits it from making dividend payments to Koppers Holdings Inc. unless (1) such dividend payments are permitted by the indenture governing Koppers Inc.'s Senior Notes and (2) no event of default or potential default has occurred or is continuing under the credit agreement. The indenture governing Koppers Inc.'s Senior Notes restricts its ability to finance Koppers Holdings Inc.'s payment of dividends if (1) a default has occurred or would result from such financing, (2) a restricted subsidiary of Koppers Inc. which is not a guarantor under the indenture is not able to incur additional indebtedness (as defined in the indenture), and (3) the sum of all restricted payments (as defined in the indenture) have exceeded the permitted amount (referred to as the "basket") at such point in time.

The Koppers Inc. Senior Secured Credit Facilities, as amended, provide for a revolving credit facility of up to $300.0 million and a term loan of $247.5 million at variable rates. Borrowings under the revolving credit facility are secured by a first priority lien on substantially all of the assets of Koppers Inc. and its material domestic subsidiaries. The revolving credit facility contains certain covenants for Koppers Inc. and its restricted subsidiaries that limit capital expenditures, additional indebtedness, liens, dividends and investments or acquisitions. In addition, such covenants give rise to events of default upon the failure by Koppers Inc. and its restricted subsidiaries to meet certain financial ratios.

As of September 30, 2016, Koppers Inc. net assets are $20.0 million, which are not restricted for distribution to Koppers Holdings Inc. Cash dividends paid to Koppers Holdings Inc. by its subsidiaries totaled $1.1 million and $6.2 million for the nine months ended September 30, 2016 and 2015, respectively.

Condensed Consolidating Statement of Operations

For the Three Months Ended September 30, 2016

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
Net sales	$ 0.0	$ 165.7	$ 104.7	$ 128.9	$ (28.2)	$ 371.1
Cost of sales including depreciation and amortization	0.0	164.0	73.5	103.6	(28.2)	312.9
Gain on sale of business	0.0	0.0	0.0	(2.1)	0.0	(2.1)
Selling, general and administrative	0.5	10.6	13.7	7.8	0.0	32.6
Operating profit (loss)	(0.5)	(8.9)	17.5	19.6	0.0	27.7
Other income (loss)	0.0	0.1	0.8	(0.3)	(0.4)	0.2
Equity income (loss) of subsidiaries	12.6	33.7	15.2	0.0	(61.5)	0.0
Interest expense	0.0	11.0	0.0	1.1	(0.4)	11.7
Income taxes	0.0	1.9	0.0	2.3	0.0	4.2
Income (loss) from continuing operations	12.1	12.0	33.5	15.9	(61.5)	12.0
Discontinued operations	0.0	0.0	0.0	(0.1)	0.0	(0.1)
Noncontrolling interests	0.0	0.0	0.0	(0.2)	0.0	(0.2)
Net income (loss) attributable to Koppers	12.1	12.0	33.5	16.0	(61.5)	12.1
Comprehensive income (loss) attributable to Koppers	14.3	14.9	35.4	15.6	(65.9)	14.3

Condensed Consolidating Statement of Operations

For the Three Months Ended September 30, 2015

	Parent	Koppers Inc.	Domestic Guarantor	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated

		Subsidiaries				
(Dollars in millions)						
Net sales	$ 0.0	$ 216.7	$ 88.7	$ 157.9	$ (29.5)	$ 433.8
Cost of sales including depreciation and amortization	0.0	197.6	68.4	139.9	(29.9)	376.0
Selling, general and administrative	0.4	9.6	10.3	10.5	0.0	30.8
Operating profit (loss)	(0.4)	9.5	10.0	7.5	0.4	27.0
Other income (loss)	0.0	(2.6)	1.3	1.8	(0.5)	0.0
Equity income (loss) of subsidiaries	10.6	16.8	4.8	0.0	(32.2)	0.0
Interest expense	0.0	11.5	0.0	1.6	(0.5)	12.6
Income taxes	0.1	1.6	0.3	3.2	0.0	5.2
Income (loss) from continuing operations	10.1	10.6	15.8	4.5	(31.8)	9.2
Discontinued operations	0.0	0.0	0.0	(0.1)	0.0	(0.1)
Noncontrolling interests	0.0	0.0	0.0	(1.0)	0.0	(1.0)
Net income (loss) attributable to Koppers	$ 10.1	$ 10.6	$ 15.8	$ 5.4	$ (31.8)	$ 10.1
Comprehensive income (loss) attributable to Koppers	$ (3.5)	$ (3.0)	$ 1.2	$ (7.9)	$ 9.7	$ (3.5)

Condensed Consolidating Statement of Operations

For the Nine Months Ended September 30, 2016

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
Net sales	$0.0	$515.2	$ 272.0	$ 391.6	$ (75.8)	$ 1,103.0
Cost of sales including depreciation and amortization	0.0	499.8	195.4	326.4	(77.1)	944.5
Gain on sale of business	0.0	0.0	0.0	(2.1)	0.0	(2.1)
Selling, general and administrative	1.3	31.5	27.9	32.4	0.0	93.1
Operating (loss) profit	(1.3)	(16.1)	48.7	34.9	1.3	67.5
Other income (loss)	0.0	0.2	3.5	(0.2)	(1.3)	2.2
Equity income of subsidiaries	24.2	77.2	23.3	0.0	(124.7)	0.0
Interest expense	0.0	36.1	0.0	3.5	(1.3)	38.3
Income taxes	0.0	1.3	0.4	8.8	0.0	10.5
Income from continuing operations	22.9	23.9	75.1	22.4	(123.4)	20.9
Discontinued operations	0.0	0.0	0.0	0.5	0.0	0.5
Noncontrolling interests	0.0	0.0	0.0	(1.5)	0.0	(1.5)
Net income attributable to Koppers	$22.9	$23.9	$ 75.1	$ 24.4	$ (123.4)	$ 22.9
Comprehensive income (loss) attributable to Koppers	$33.1	$34.4	$ 84.7	$ 27.8	$ (146.9)	$ 33.1

Condensed Consolidating Statement of Operations

For the Nine Months Ended September 30, 2015

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
Net sales	$0.0	$613.7	$ 260.4	$ 467.1	$ (78.0)	$ 1,263.2
Cost of sales including depreciation and amortization	0.0	583.2	200.0	405.0	(76.5)	1,111.7
Gain on sale of business	0.0	(3.2)	0.0	0.0	0.0	(3.2)
Selling, general and administrative	1.5	31.8	28.9	31.5	0.0	93.7
Operating (loss) profit	(1.5)	1.9	31.5	30.6	(1.5)	61.0
Other income (loss)	0.0	0.5	3.3	(1.8)	(1.6)	0.4
Equity income (loss) of subsidiaries	16.7	48.7	14.5	0.0	(79.9)	0.0

Interest expense	0.0	34.6	0.0	5.5	(1.6)	38.5
Income taxes	(0.5)	(0.2)	0.6	10.1	0.0	10.0
Income (loss) from continuing operations	15.7	16.7	48.7	13.2	(81.4)	12.9
Discontinued operations	0.0	0.0	0.0	(0.1)	0.0	(0.1)
Noncontrolling interests	0.0	0.0	0.0	(2.9)	0.0	(2.9)
Net income (loss) attributable to Koppers	$ 15.7	$ 16.7	$ 48.7	$ 16.0	$ (81.4)	$ 15.7
Comprehensive income (loss) attributable to Koppers	$ (4.8)	$ (3.8)	$ 25.8	$ (3.3)	$ (18.7)	$ (4.8)

Condensed Consolidating Balance Sheet

September 30, 2016

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
ASSETS						
Cash and cash equivalents	$0.0	$0.0	$ 0.0	$ 17.7	$ 0.0	$ 17.7
Receivables, net	0.0	59.2	34.2	78.0	0.0	171.4
Affiliated receivables	0.0	8.8	9.1	13.1	(31.0)	0.0
Inventories, net	0.0	101.4	24.1	91.6	(0.9)	216.2
Loan to related party	0.0	0.0	0.0	9.2	0.3	9.5
Other current assets	0.0	5.9	3.4	20.9	0.0	30.2
Total current assets	0.0	175.3	70.8	230.5	(31.6)	445.0
Equity investments	20.3	770.8	192.7	(0.1)	(983.7)	0.0
Property, plant and equipment, net	0.0	119.4	39.0	118.8	0.0	277.2
Goodwill	0.0	0.8	153.1	33.9	0.0	187.8
Intangible assets, net	0.0	8.0	109.7	28.8	0.0	146.5
Deferred tax assets	0.0	29.8	(2.3)	6.2	0.0	33.7
Affiliated loan receivables	0.0	41.8	270.6	32.7	(345.1)	0.0
Other assets	0.0	5.8	4.5	0.3	0.0	10.6
Total assets	20.3	1,151.7	838.1	451.1	(1,360.4)	1,100.8
LIABILITIES AND EQUITY (DEFICIT)						
Accounts payable	0.0	62.5	38.5	40.9	0.0	141.9
Affiliated payables	0.0	20.8	1.5	17.2	(39.5)	0.0
Accrued liabilities	0.0	42.9	19.7	39.8	0.0	102.4
Current maturities of long-term debt	0.0	30.2	0.0	9.3	0.0	39.5
Total current liabilities	0.0	156.4	59.7	107.2	(39.5)	283.8
Long-term debt	0.0	608.5	0.0	33.5	0.0	642.0
Affiliated debt	0.0	283.5	22.3	39.3	(345.1)	0.0
Other long-term liabilities	0.0	83.3	14.1	53.0	(0.1)	150.3
Total liabilities	0.0	1,131.7	96.1	233.0	(384.7)	1,076.1
Koppers shareholders' equity (deficit)	20.3	20.0	742.0	213.7	(975.7)	20.3
Noncontrolling interests	0.0	0.0	0.0	4.4	0.0	4.4
Total liabilities and equity (deficit)	$20.3	$1,151.7	$ 838.1	$ 451.1	$ (1,360.4)	$ 1,100.8

Condensed Consolidating Balance Sheet

December 31, 2015

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
ASSETS						
Cash and cash equivalents	$0.0	$0.1	$ 0.7	$ 21.0	$ 0.0	$ 21.8
Receivables, net	0.0	60.4	23.7	75.5	0.0	159.6
Affiliated receivables	0.0	14.3	15.2	4.4	(33.9)	0.0
Inventories, net	0.0	111.9	24.9	91.8	(2.2)	226.4
Other current assets	0.0	3.7	1.9	30.9	0.0	36.5
Total current assets	0.0	190.4	66.4	223.6	(36.1)	444.3
Equity investments	(19.0)	703.2	165.7	0.0	(849.9)	0.0
Property, plant and equipment, net	0.0	117.5	41.2	119.1	0.0	277.8
Goodwill	0.0	0.8	153.1	32.7	0.0	186.6
Intangible assets, net	0.0	8.7	117.6	29.8	0.0	156.1
Deferred tax assets	0.0	29.8	0.8	5.7	0.3	36.6
Affiliated loan receivables	0.7	29.6	222.6	31.7	(284.6)	0.0
Other assets	(0.2)	4.5	4.9	2.3	0.0	11.5
Total assets	$(18.5)	$1,084.5	$ 772.3	$ 444.9	$ (1,170.3)	$ 1,112.9
LIABILITIES AND EQUITY (DEFICIT)						
Accounts payable	$0.0	$73.8	$ 18.9	$ 48.1	$ 0.0	$ 140.8
Affiliated payables	0.0	16.6	10.9	15.3	(42.8)	0.0
Accrued liabilities	0.0	35.6	23.4	40.8	0.0	99.8
Current maturities of long-term debt	0.0	30.2	0.0	9.7	0.0	39.9
Total current liabilities	0.0	156.2	53.2	113.9	(42.8)	280.5
Long-term debt	0.0	647.5	0.0	34.9	0.0	682.4
Affiliated debt	0.0	217.5	29.5	36.9	(283.9)	0.0
Other long-term liabilities	0.0	81.6	13.2	67.6	0.0	162.4
Total liabilities	0.0	1,102.8	95.9	253.3	(326.7)	1,125.3
Koppers shareholders' equity (deficit)	(18.5)	(18.3)	676.4	185.5	(843.6)	(18.5)
Noncontrolling interests	0.0	0.0	0.0	6.1	0.0	6.1
Total liabilities and equity (deficit)	$(18.5)	$1,084.5	$ 772.3	$ 444.9	$ (1,170.3)	$ 1,112.9

Condensed Consolidating Statement of Cash Flows

For the Nine Months Ended September 30, 2016

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
Cash provided by (used in) operating activities	$ (0.2)	$ 10.8	$ 76.1	$ 15.7	$ (19.9)	$ 82.5
Cash provided by (used in) investing activities:						
Capital expenditures and acquisitions	0.0	(20.0)	(3.2)	(9.0)	0.0	(32.2)
Repayments (loans to) from affiliates	0.0	(12.2)	(48.0)	(1.0)	61.2	0.0
Net cash (used in) provided by divestitures and asset sales	0.0	0.0	0.7	(5.2)	0.0	(4.5)
Net cash provided by (used in) investing activities	0.0	(32.2)	(50.5)	(15.2)	61.2	(36.7)
Cash provided by (used in) financing activities:						
Borrowings (repayments) of long-term debt	0.0	(42.5)	0.0	(0.9)	0.0	(43.4)
Borrowings (repayments) of affiliated debt	0.0	66.0	(7.2)	2.4	(61.2)	0.0
Deferred financing costs	0.0	(1.4)	0.0	0.0	0.0	(1.4)
Dividends paid	0.0	(0.8)	(19.1)	0.0	19.9	0.0
Stock repurchased	0.2	0.0	0.0	0.0	0.0	0.2
Net cash provided by (used in) financing activities	0.2	21.3	(26.3)	1.5	(41.3)	(44.6)
Effect of exchange rates on cash	0.0	0.0	0.0	(5.3)	0.0	(5.3)
Net increase (decrease) in cash and	0.0	(0.1)	(0.7)	(3.3)	0.0	(4.1)

cash equivalents						
Cash and cash equivalents at beginning of year	0.0	0.1	0.7	21.0	0.0	21.8
Cash and cash equivalents at end of period	$ 0.0	$ 0.0	$ 0.0	$ 17.7	$ 0.0	$ 17.7

Condensed Consolidating Statement of Cash Flows

For the Nine Months Ended September 30, 2015

(Dollars in millions)	Parent	Koppers Inc.	Domestic Guarantor Subsidiaries	Non-Guarantor Subsidiaries	Consolidating Adjustments	Consolidated
Cash provided by (used in) operating activities	$ 5.4	$ 10.7	$ 58.2	$ 29.9	$ (9.1)	$ 95.1
Cash provided by (used in) investing activities:						
Capital expenditures and acquisitions	0.0	(32.5)	(4.1)	(5.1)	0.0	(41.7)
Repayments (loans to) from affiliates	0.0	3.8	(49.9)	(1.4)	47.5	0.0
Net cash proceeds from divestitures and asset sales	0.0	12.4	2.2	0.1	0.0	14.7
Net cash provided by (used in) investing activities	0.0	(16.3)	(51.8)	(6.4)	47.5	(27.0)
Cash provided by (used in) financing activities:						
Borrowings (repayments) of long-term debt	0.0	(87.8)	0.1	1.4	0.0	(86.3)
Borrowings (repayments) of affiliated debt	0.0	100.6	(3.9)	(49.2)	(47.5)	0.0
Deferred financing costs	0.0	(1.0)	0.0	0.0	0.0	(1.0)
Dividends paid	(5.1)	(6.2)	(3.1)	(3.4)	9.1	(8.7)
Stock repurchased	(0.3)	0.0	0.0	0.0	0.0	(0.3)
Net cash provided by (used in) financing activities	(5.4)	5.6	(6.9)	(51.2)	(38.4)	(96.3)
Effect of exchange rates on cash	0.0	0.1	0.0	10.0	0.0	10.1
Net increase (decrease) in cash and cash equivalents	0.0	0.1	(0.5)	(17.7)	0.0	(18.1)

Cash and cash equivalents at beginning of year	0.0	0.0	0.9	50.2	0.0	51.1
Cash and cash equivalents at end of period	$ 0.0	$ 0.1	$ 0.4	$ 32.5	$ 0.0	$ 33.0

ITEM 2. MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

This report and any documents incorporated herein by reference contain "forward-looking statements" within the meaning of the Private Securities Litigation Reform Act of 1995 and may include, but are not limited to, statements about sales levels, acquisitions, restructuring, declines in the value of Koppers assets and the effect of any related impairment charges, profitability and anticipated expenses and cash outflows. All forward-looking statements involve risks and uncertainties. All statements contained herein that are not clearly historical in nature are forward-looking, and words such as "believe," "anticipate," "expect," "estimate," "may," "will," "should," "continue," "plans," "potential," "inte other similar words or phrases are generally intended to identify forward-looking statements. Any forward-looking statement contained herein, in press releases, written statements or documents filed with the Securities and Exchange Commission, or in Koppers communications with and discussions with investors and analysts in the normal course of business through meetings, phone calls and conference calls, regarding expectations with respect to sales, earnings, cash flows, operating efficiencies, restructurings, product introduction or expansion, the benefits of acquisitions and divestitures, joint ventures or other matters as well as financings and debt reduction, are subject to known and unknown risks, uncertainties and contingencies. Many of these risks, uncertainties and contingencies are beyond our control, and may cause actual results, performance or achievements to differ materially from anticipated results, performance or achievements. Factors that might affect such forward-looking statements, include, among other things, the impact of changes in commodity prices, such as oil and copper, on product margins; general economic and business conditions; potential difficulties in protecting our intellectual property; the ratings on our debt and our ability to repay or refinance our outstanding indebtedness as it matures; our ability to operate within the limits of our debt covenants; potential impairment of our goodwill and/or long-lived assets; demand for Koppers goods and services; competitive conditions; interest rate and foreign currency rate fluctuations; availability and costs of key raw materials and unfavorable resolution of claims against us, as well as those discussed more fully elsewhere in this report and in documents filed with the Securities and Exchange Commission by Koppers, particularly our latest annual report on Form 10-K and subsequent filings. We caution you that the foregoing list of important factors may not contain all of the material factors that are important to you. In addition, in light of these risks and uncertainties, the matters referred to in the forward-looking statements contained in this report and the documents incorporated by reference herein may not in fact occur. Any forward-looking statements in this report speak only as of the date of this report, and we undertake no obligation to update any forward-looking statement to reflect events or circumstances after that date or to reflect the occurrence of unanticipated events.

The following discussion and analysis of our financial condition and results of operations should be read in conjunction with the unaudited financial statements and related notes included in Item 1 of this Part I as well as the audited consolidated financial statements and the related notes included in our Annual Report on Form 10-K for the year ended December 31, 2015.

Overview

We are a leading integrated global provider of treated wood products, wood treatment chemicals, and carbon compounds. Our products and services are used in a variety of niche applications in a diverse range of end-markets, including the railroad, specialty chemical, utility, residential lumber, agriculture, aluminum, steel, rubber, and construction industries. We serve our customers through a comprehensive global manufacturing and distribution network, with manufacturing facilities located in North America, South America, Australasia, China and Europe.

We operate three principal businesses: Railroad and Utility Products and Services ("RUPS"), Carbon Materials and Chemicals ("CMC") and Performance Chemicals ("PC").

Through our RUPS business, we believe that we are the largest supplier of railroad crossties to the North American railroads. Our other treated wood products include utility poles for the electric and telephone utility industries in

Australia. We also provide rail joint bar products as well as various services to the railroad industry. Our CMC business processes coal tar into a variety of products, including carbon pitch, creosote, carbon black feedstock, naphthalene and phthalic anhydride, which are intermediate materials necessary in the production of aluminum, the pressure treatment of wood, the production of carbon black for the rubber industry, the production of high-strength concrete, and the production of plasticizers and specialty chemicals, respectively. Through our PC business, we believe that we are the global leader in developing, manufacturing and marketing wood preservation chemicals and wood treatment technologies for use in pressure treating lumber for residential, industrial and agricultural applications.

Outlook

Trend Overview

Our businesses and results of operations are affected by various competitive and other factors including (i) the impact of global economic conditions on demand for our products, including the impact of imported products from competitors in certain regions where we operate; (ii) raw materials pricing and availability, in particular the cost and availability of hardwood lumber for railroad crossties, the cost and amount of coal tar available in global markets, which is negatively affected by reductions in steel production, and scrap copper prices; (iii) volatility in oil prices, which impacts the cost of coal tar and certain other raw materials, as well as selling prices and margins for certain of our products including carbon black feedstock, phthalic anhydride, and naphthalene; (iv) competitive conditions in global carbon pitch markets; and (v) changes in foreign exchange rates.

Railroad and Utility Products and Services

The primary end-market for RUPS is the North American railroad industry, which has a significant installed base of approximately 500 million wood crossties that require periodic replacement. As a result, demand has historically been relatively stable in the range of 21-25 million wood crossties annually. We sell treated and untreated wood products, rail joint bars and services primarily to the railroad markets in the United States and Canada, and utility poles to the utility sector in Australia. We also operate a railroad services business that conducts engineering, design, repair and inspection services primarily for railroad bridges in the U.S. and Canada.

The supply of untreated crossties can vary at times based upon weather conditions in addition to other factors. In 2013 and 2014, the availability of untreated crossties was reduced below normal levels due to increased demand for hardwood lumber in alternative markets such as construction and crane mats for the oil and gas industry. Supply increased in 2015 due to a combination of the softening of demand for crane mats, and increased pricing for crossties that motivated sawmills to direct a higher level of production to the railroad industry. Despite the recent improved supply environment, inventory levels of hardwood lumber in certain regions of the U.S. are still depleted and in need of replenishing, which at current rates, are expected to be achieved by mid-2017. We have a nationwide wood procurement team that maintains close working relationships with a network of hardwood crosstie concentration yards. The first component of our revenue stream occurs when we procure the untreated crossties, on behalf of our customers, at a nominal markup. This practice provides the railroad customers with an assured level of inventory and minimizes our working capital usage as untreated crossties go through a six- to nine-month air seasoning process before they are ready to be pressure treated. Subsequent to the air seasoning period, the next phase provides value-added services for the RUPS segment through treating crossties, switch ties and various types of lumber used for railroad bridges and crossings. The processes include creosote-only treatment as well as a combination of creosote and borate treatments. During any given year, there is a seasonal effect in the winter months on our crosstie business depending on weather conditions for harvesting lumber and installation.

Over the past twelve months, rail freight has begun to decline due to lower shipments of coal, oil and gas, durable goods, and related products. As a result of their declining revenue base, the major companies in the rail industry have substantially reduced both operating and capital spending in 2016 from the prior year’s peak spending level, which is having a negative short-term impact on sales of various products and services that we provide to that industry. Therefore, we expect that current year revenues and profitability will reflect a slight decline year-over-year due to the combined effects of lower demand in our rail joint product line caused by reductions in capital budgets for most North American Class I railroads, softness in the utility pole business in Australia, and the discontinuance of utility pole toll treating services provided to a U.S.-based utility pole company. The lower demand has allowed the market to reduce raw material purchase prices primarily in the Eastern U.S. which, due to certain cost pass-through conditions, will further reduce our revenues in the near term, but have a minimal impact on our profitability. The lower demand has

also resulted in price reductions for the products we supply the commercial railroad business as competition has increased to replace the lower Class I demand.

During the year, we extended a contract with Norfolk Southern Railway Company, one of our largest railroad customers, to 2021. We also signed long-term rail joint agreements with two of our largest railroad customers, representing market share gains for a critical maintenance-of-way part of the RUPS business. The rail joint contracts, with a term of three years and five years, are expected to collectively increase year-over-year sales for the rail joint business.

On October 24, 2016, the Company agreed to a long-term lease of its wood treatment facility in Houston, Texas to a third party. This facility, owned by the Company's wholly-owned subsidiary, Wood Protection L.P., is engaged in the manufacturing and sale of pressure-treated dimensional lumber and had revenue of approximately $8 million for the nine months ended September 30, 2016 and $14 million for the year ended December 31, 2015.

Overall, the long-term prognosis for the railroad industry and the products and services that we provide to it remains favorable. Currently, the railroad industry is managing the cyclical downturn in the oil and gas industry, while looking to replace demand lost to what is likely a long-term reduction in coal production. At the same time, the railroads are building their revenue base of shipments of non-energy related products. We believe that with our vertical integration capabilities in wood treatment, our products and services will continue to provide value to our railroad customers.

Carbon Materials and Chemicals

The primary products produced by CMC are carbon pitch, which is sold primarily to the aluminum industry for the production of carbon anodes, and creosote, which is a registered pesticide in the U.S. and used primarily in the pressure treatment of railroad crossties. The smelting of aluminum requires significant amounts of energy, which is a major cost component for the aluminum industry. As a result, new production facilities are being built in regions with low energy costs such as the Middle East, while regions with higher energy costs such as the United States, Australia and Western Europe have seen significant amounts of smelting capacity idled or closed over the past decade. This geographic shift accelerated during the past 12 to 24 months with further curtailments and closures in the U.S. Accordingly, we have experienced significantly lower sales volumes due to the reduction in aluminum production in parts of the world where the majority of our production facilities are located.

Some of our CMC products, particularly carbon black feedstock, phthalic anhydride and naphthalene, have end market pricing that is linked to oil. Historically, when oil prices increase we have benefited in terms of revenues and profitability from the higher pricing for these products as the cost of coal tar has not increased proportionally with oil. Conversely, the recent significant decline in oil prices has resulted in lower selling prices and profitability for carbon black feedstock, phthalic anhydride and naphthalene. However, the unfavorable impact to sales and margins is partially offset by increased sales volumes of phthalic anhydride due to increased market share and lower input costs, because a significant portion of our coal tar in certain regions is also affected by the price of oil, resulting in lower raw material and finished product costs.

Historically, CMC results have been closely linked to aluminum demand and production, as well as the price of oil, and we seek to lessen our exposure to these commodity markets going forward. We believe that the economic environment related to these factors will not meaningfully improve, and as such, we have undertaken a strategy to reduce our reliance on the aluminum industry. In 2014, we began our multi-year restructuring plan and are in the process of streamlining the CMC business to address overcapacity and greatly reduce fixed costs in our operations. When completed, we expect the profitability for this segment to improve substantially as we fully realize the benefit of our cost savings initiatives.

The availability of coal tar, the primary raw material for our CMC business, is linked to levels of metallurgical coke production. As the global steel industry, excluding Asia, has reduced production of steel produced using metallurgical coke, the volumes of coal tar have also been reduced. Over the past years, the coal tar distillation industry has operated in an excess capacity mode, which further increased the competition for a limited amount of coal tar in North America. In certain regions such as China there are competing markets for coal tar which may also limit our access to our raw material supply in those regions. Our ability to obtain coal tar and the price we are able to negotiate for coal tar has a significant impact on the level of profitability of our business. Significant increases in raw material costs can result in margin dilution if the increased cost of the raw material cannot be passed on to the customer. Additionally, in regions where the available supply of our products exceeds demand and the pricing is competitive, we may not be able to recover raw material cost increases in the selling prices for our end products. As our CMC business consolidates its operating footprint and lowers production levels, we anticipate that our raw material needs will be significantly less than historically required and we will continue to evaluate potential opportunities to lower our overall input costs.

We believe that the restructuring iniatives that we have implemented thus far are beginning to lessen the impact of oil prices on our business. As we shift our focus to producing only the needed amount of creosote, we are distilling lower volumes of coal tar and thereby, have fewer products exposed to the price of oil. In addition, we believe our overall profitability will improve due to a more streamlined and efficient cost structure as well as lower raw material costs.

Performance Chemicals

The largest geographic market for wood treating chemicals sold by our PC business is in North America, and the largest application for our products is the residential remodeling market. We also have a market presence in Europe, South America, Australia and New Zealand. Product demand for our PC business has historically been influenced by existing home sales which is a leading indicator of consumer spending on remodeling projects. The year-over-year annual rate of seasonally adjusted existing home sales in the U.S. has consistently increased since the beginning of 2014, and is well above lows experienced in the 2008 through 2010 timeframe. As a result, remodeling activity in the U.S. has consistently increased over that same time frame as measured by the Leading Indicator of Remodeling Activity ("LIRA"). More recent data of existing home sales indicates that the rate of annualized growth may be moderating which could result in a slower growth rate of remodeling activity in the future. Nevertheless, LIRA year-over-year growth projections anticipate growth in home improvement and expenditures will reach eight percent by the start of 2017 which is in excess of its five percent historical average.

PC is the largest global manufacturer and supplier of water based wood preservatives and wood specialty additives to treaters who supply pressure treated wood products to large retailers and independent lumber dealers. These retailers and dealers, in turn, serve the residential, agricultural and industrial pressure treated wood market. Our primary products are copper based wood preservatives, including micronized copper azole ("MicroPro®") and micronized pigments ("MicroShades®"). Applications for these products include decking, fencing, utility poles, construction lumber and other outdoor structures. We continue to invest in research and development activities at various locations around the world, particularly in areas that have high fungal decay and termite activity, in order to assess the performance and efficacy of various wood preservation systems.

As most of the products sold by PC are copper-based products, changes in the price and availability of copper can have a significant impact on product pricing and margins. We attempt to moderate the variability in copper pricing through entering into hedging transactions for the majority of our copper needs, which range from six months up to 30 months. Those hedges typically match expected customer purchases and receive hedge accounting treatment. From time to time, we enter into hedge transactions based upon long-term forecasted needs of copper. Those hedges are typically marked to market on a quarterly basis.

In North America, we are vertically integrated through the manufacturing of copper compounds for our copper based wood preservatives. We believe our vertical integration is part of our proprietary processes and reflects an important competitive advantage. In addition, we believe this provides our customers with the security of a continuous supply of wood preservative chemicals.

We have seen favorable market trends in the repair and remodeling markets and existing home sales in 2016. In addition, starting in the second quarter of 2016, we have observed that large retailers and lumber dealers are opting for a product mix with higher levels of preservative retention driven primarily by changes in treated wood product application standards. This shift towards a higher retention product mix simplifies the treating and stocking processes for the treaters that purchase PC products and their end-customers, as well as provides for higher quality products that will better withstand the effects of insects and fungal decay. Even though it is difficult to predict competitive trends and to quantify the total impact it will have on PC sales, operating profit, and cash flow, we believe the shift to higher retention product mix will continue in 2017.

CMC Restructuring Initiatives

Our CMC business and results of operations have been negatively affected in recent years by difficult economic conditions in North America, Europe and China. Certain key end markets experienced significant reductions in demand that have negatively affected the profitability for most of our products produced and sold in the geographical

regions we operate, and we expect this to continue for at least the foreseeable future. Additionally, over the last several years, our profitability in North America has been negatively impacted from increased levels of imports from competitors in Europe due to weak end-market demand there. The geographic shift in end-market demand has resulted in a trend of declining utilization rates in North America and Europe over that same period.

As a result, we have embarked on a plan to restructure our CMC operating footprint that we expect will eventually reduce our global number of coal tar distillation and related facilities from the 11 that existed at the end of 2013 to four in total by the end of 2017. The remaining facilities are located in regions where we believe we hold key competitive advantages that allow us to better serve our global customers: Stickney, Illinois; Nyborg, Denmark; Mayfield, Australia; and Jiangsu Province, China.

The closure of the first facility occurred in April 2014 as we ceased coal tar distillation in Uithoorn, the Netherlands. During 2015, we ceased coal tar distillation activities at our Follansbee, West Virginia facility. Finally, during 2016, we completed the permanent closure or sale of four additional tar distillation facilities located in Clairton, Pennsylvania; Scunthorpe, U.K.; Port Clarence, U.K. and Tangshan, China. The U.K. and China facilities suspended production activities in

December 2015 and February 2016, respectively, and coal tar distillation activities were substantially discontinued at the end of July 2016 at the Clairton facility. Furthermore, we are attempting to sell our 30-percent interest in the TKK joint venture in China, with the timing of the sale completion subject to final agreement with the acquirer, the majority owner of TKK.

The reduction in operating capacity at these locations resulted in impairments or other costs of $36.5 million in the year ended December 31, 2015 and a total of $29.5 million for the two years ended December 31, 2014. As a result of these initiatives, we expect additional restructuring and related charges to earnings of between $10 million to $20 million through 2020, of which approximately $1 million to $4 million are estimated to be non-cash. The overall expected future cash requirements for the CMC plant closures listed above are estimated to be approximately $40 million through 2020. There may be additional curtailments or closures at our other CMC facilities as part of our efforts to reduce our cost structure and improve capacity utilization in our business.

With respect to our Port Clarence and Scunthorpe operations in the United Kingdom, in July 2016 we completed the sale of our tar distillation properties and assets at these locations to U.K.-based Industrial Chemicals Group Limited (“ICGL”). The terms of the agreement provide for the transfer of essentially all assets at the two sites to ICGL in exchange for ICGL assuming all historical environmental-related and asset retirement-related liabilities at both sites. In addition, Koppers made a cash contribution towards these costs that will be ratably paid to ICGL from escrow over the next three years. As part of the transaction, in order to enable us to continue to meet our customer obligations, ICGL has agreed to provide terminal services to us for the storage and shipping of coal tar, as well as production services to our subsidiary, Koppers Specialty Chemicals.

We believe that, through these restructuring initiatives, we are significantly transforming our CMC business model by streamlining the operating footprint and reducing reliance on and exposure to the carbon pitch markets.

Other

In the third quarter of 2016, the Company offered a cash lump sum or annuity buyout to its terminated deferred vested participants in its U.S. defined benefit pension plan. Approximately 400 participants elected either a lump sum payout or annuity from a third party provider. The total dollar amount to be paid out of our defined benefit plan assets in the fourth quarter of 2016 is estimated to be approximately $14 million. We estimate that the Company will record a pension settlement loss of $4.5 million in the fourth quarter of 2016.

Seasonality and Effects of Weather on Operations

Our quarterly operating results fluctuate due to a variety of factors that are outside of our control, including inclement weather conditions, which in the past have affected operating results. Operations at some of our facilities have at times been reduced during the winter months. Moreover, demand for some of our products declines during periods of inclement weather. As a result of the foregoing, we anticipate that we may experience material fluctuations in quarterly operating results. Historically, our operating results have been significantly lower in the first and fourth calendar quarters as compared to the second and third calendar quarters.

Results of Operations – Comparison of Three Months Ended September 30, 2016 and 2015

Consolidated Results

Net sales for the three months ended September 30, 2016 and 2015 are summarized by segment in the following table:

	Three Months Ended September 30,			
	2016	2015	Net Change	
(Dollars in millions)				
Railroad and Utility Products and Services	$145.7	$177.6	-18	%
Carbon Materials and Chemicals	117.8	163.0	-28	%
Performance Chemicals	107.6	93.2	15	%
	$371.1	$433.8	-14	%

RUPS net sales decreased by $31.9 million or 18 percent compared to the prior year period. The sales decrease was primarily due to lower sales volumes of treated crossties and utility products. The reduction in crossties is attributed to lower spending in the rail industry due to the impact of reduced freight car loadings and rail traffic. The decrease in sales of utility products was due to reduced demand in the Australian utility pole market and reduced toll-treating of utility poles in the United States. Sales were also unfavorably affected by lower pricing due to the pass-through of lower raw material costs related to hardwood pricing and greater competition related to non-Class I business.

CMC net sales decreased by $45.2 million or 28 percent compared to the prior year period due mainly to lower sales volumes for carbon pitch and carbon black feedstock combined with lower sales prices for carbon pitch and phthalic anhydride, partially offset by higher phthalic anhydride volumes. The reduction in carbon black feedstock sales volumes

was driven by our strategy to reduce total distillate production and direct as much as possible to the higher value wood preservative market.

Lower carbon materials sales volumes and pricing decreased sales by 16 percent compared to the third quarter of 2015 as carbon pitch sales volumes were lower in the United States. Reduced volume in the United States is due to the reduction of aluminum manufacturing capacity.

Sales of distillates, specifically creosote and carbon black feedstock, decreased sales by another six percent compared to the third quarter of 2015 driven by lower sales volumes for carbon black feedstock from Australian, European and North American operations.

Sales of coal tar chemicals declined one percent over the prior year period due to a reduction in pricing driven by the effect of lower orthoxylene pricing on phthalic anhydride. The decline in pricing was partially offset by an increase in sales volumes of phthalic anhydride over the prior year period.

PC net sales increased by $14.4 million or 15 percent compared to the prior year period. The sales increase was due primarily to higher North American sales volumes for some copper based wood preservatives and additives. Higher sales volumes were driven primarily by favorable market trends in the repair and remodeling markets and existing home sales as well as treated wood dealers stocking and selling treated wood with higher preservative retention levels. These gains were offset in part by higher customer development costs, which are reflected as a reduction of net sales, compared to the prior year period.

Cost of sales as a percentage of net sales was 79 percent for the quarter ended September 30, 2016 compared to 83 percent in the prior year quarter due mainly to higher gross margins for PC driven by increased sales volumes and improved cost performance, which more than offset lower gross margins from CMC due to restructuring activities.

Depreciation and amortization for the quarter ended September 30, 2016 was $1.7 million lower when compared to the prior year period due mainly to a reduction in assets related to our shutdown of distillation activities in the United States and United Kingdom as well as reduced accelerated depreciation and asset retirement obligation amortization in the prior year period related to the closure of our wood treating facility in Green Spring, West Virginia.

Impairment and restructuring expenses for the quarter ended September 30, 2016 were $3.6 million higher when compared to the prior year period due mainly to additional asset retirement obligation and fixed asset impairment charges for our Clairton, Pennsylvania facility where coal tar distillation activities were substantially discontinued at the end of July 2016.

Selling, general and administrative expenses for the quarter ended September 30, 2016 were $1.8 million higher when compared to the prior year period due mainly to incentive expense as a result of improved current period margins and higher long-term incentive compensation in the current year period.

Other income for the quarter ended September 30, 2016 was $0.2 million higher when compared to the prior year period as licensing royalties received by PC offset equity method losses for CMC related to our TKK facility in China.

Interest expense for the quarter ended September 30, 2016 was $0.9 million lower than the prior year period as a result of reduced interest expense from reduced average debt levels as compared to the prior year period.

Income taxes for the quarter ended September 30, 2016 were $4.2 million, a decrease of $1.0 million when compared to the prior year period. We have incurred losses in certain of our foreign subsidiaries that are not expected to generate a future benefit, which increases our effective tax rate. For 2016 we expect these losses to decrease, which reduces

the effective tax rate to 25.9 percent from 36.1 percent in the same period of the prior year. Also contributing to the lower rate in 2016 are a greater amount of foreign earnings that are taxed at more favorable rates.

Segment Results

Segment operating profit for the three months ended September 30, 2016 and 2015 is summarized by segment in the following table:

(Dollars in millions)	Three Months Ended September 30, 2016	2015	% Change
Operating profit (loss):			
Railroad and Utility Products and Services	$14.9	$17.7	-16 %
Carbon Materials and Chemicals	(3.9)	0.0	N/A
Performance Chemicals	17.6	9.7	81 %
Corporate	(0.9)	(0.4)	-125 %
	$27.7	$27.0	3 %
Operating profit (loss) as a percentage of net sales:			
Railroad and Utility Products and Services	10.2%	10.0%	0.2 %
Carbon Materials and Chemicals	(3.3)%	0.0 %	-3.3 %
Performance Chemicals	16.4%	10.4%	6.0 %
	7.5 %	6.2 %	1.3 %

RUPS operating profit decreased by $2.8 million or 16 percent compared to the prior year period. Operating profit as a percentage of net sales for RUPS increased to 10.2 percent from 10 percent in the prior year quarter. Operating profit as a percentage of net sales for the three months ended September 30, 2016 was positively impacted by sales mix favoring higher margin products and services including increased crosstie treatment and bridge services. Also, cost savings related to the closure of the Green Springs, WV, facility provided an additional benefit to the third quarter 2016.

CMC operating loss increased by $3.9 million over the prior year period. Operating loss for the three months ended September 30, 2016 was negatively affected by lower sales volumes for carbon pitch. In addition, lower sales prices for carbon pitch and phthalic anhydride, accelerated depreciation, and $3.7 million of costs to restructure operations were partially offset by lower raw material costs.

PC operating profit increased by $7.9 million or 81 percent compared to the prior year period. Operating profit as a percentage of net sales for PC increased to 16.4 percent from 10.4 percent in the prior year quarter. Operating profit for the three months ended September 30, 2016 was positively impacted due primarily to higher North American sales volumes for copper based wood preservatives. Higher sales volumes were driven primarily by changes in treated wood product application standards resulting in treated wood dealers stocking and selling more high retention ground contact treated wood. Sales volumes have also improved due to favorable market trends in the repair and remodeling markets and existing home sales.

Corporate operating loss increased by $0.5 million or 125 percent compared to the prior year period due to legal entity restructuring charges in the current year period.

Results of Operations – Comparison of Nine Months Ended September 30, 2016 and 2015

Consolidated Results

Net sales for the nine months ended September 30, 2016 and 2015 are summarized by segment in the following table:

	Nine Months Ended September 30,			
	2016	2015	Net Change	
(Dollars in millions)				
Railroad and Utility Products and Services	$461.5	$506.6	-9	%
Carbon Materials and Chemicals	337.5	479.6	-30	%
Performance Chemicals	304.0	277.0	10	%
	$1,103.0	$1,263.2	-13	%

RUPS net sales decreased by $45.1 million or nine percent compared to the prior year period. The sales decrease was primarily due to lower volumes of treated crossties, utility products and rail joints. The reduction in crossties and rail joints is attributed to reduced spending in the rail industry due to lower freight car loadings and reduced rail traffic. The decrease in sales of utility products was due to reduced demand in the Australian utility pole market, reduced toll-treating of utility poles in the United States and foreign exchange translation.

CMC net sales decreased by $142.1 million or 30 percent compared to the prior year period due mainly to lower sales volumes and prices for carbon pitch, carbon black feedstock and naphthalene. Lower carbon materials sales volumes decreased sales by 16 percent compared to the prior year period as carbon pitch sales volumes were lower in the United States and China.

Sales of distillates, specifically creosote and carbon black feedstock, decreased sales by eight percent compared to the prior year period driven by our strategy to reduce total distillate production and direct as much as possible to the higher value wood preservative market. Sales of coal tar chemicals decreased by one percent due primarily to a decline in sales volumes and price for naphthalene and phthalic anhydride. That decline was partially offset by a three percent increase in sales volumes of phthalic anhydride compared to the prior year period.

PC net sales increased by $27.0 million or ten percent compared to the prior year period. The sales increase was due primarily to higher North American sales volumes for some copper based wood preservatives and additives. These higher sales volumes were driven by favorable market trends in the repair and remodeling markets and existing home sales as well as treated wood dealers stocking and selling treated wood with higher preservative retention levels. These gains were offset in part by higher customer development costs, which are reflected as a reduction of net sales, compared to the prior year period.

Cost of sales as a percentage of net sales was 80 percent for the nine months ended September 30, 2016 compared to 84 percent for the nine months ended September 30, 2015 due mainly to a sales mix shift as higher gross margins for PC driven by increased sales volumes and improved cost performance more than offset lower sales volumes and gross margins from CMC due to restructuring activities.

Depreciation and amortization for the nine months ended September 30, 2016 was $3.2 million lower when compared to the prior year period due mainly to a reduction in assets related to our shutdown of distillation activities in the United States and United Kingdom as well as accelerated depreciation and asset retirement obligation amortization in the prior year period related to the closure of our wood treating facility in Green Spring, West Virginia.

Impairment and restructuring expenses for the nine months ended September 30, 2016 were $9.0 million higher when compared to the prior year period due mainly to an accrual for future real estate lease obligations, net of estimated sublease revenue, at our closed coal tar distillation facility in Uithoorn, the Netherlands, as well as severance charges related to our closed coal tar distillation CMC facilities in the United Kingdom and impairment charges for the remaining fixed assets at our coal tar distillation facility in Clairton, Pennsylvania.

Selling, general and administrative expenses for the nine months ended September 30, 2016 were $0.6 million lower when compared to the prior year period due mainly to reduced legal fees and consulting costs partially offset by an increase in incentive expense and a higher deferred compensation vesting rate in the current year period.

Other income for the nine months ended September 30, 2016 was $2.2 million compared to $0.4 million in the prior year period as licensing royalties received by PC exceeded equity method losses for CMC related to our TKK facility in China.

Interest expense for the nine months ended September 30, 2016 was $0.2 million lower than the prior year period as a result of reduced average debt levels as compared to the prior year period partially offset by the write-off of debt issuance costs totaling $2.0 million in 2016 due to the reduction of borrowing capacity under our revolving credit agreement.

Income taxes for the nine months ended September 30, 2016 were $10.5 million, an increase of $0.5 million when compared to the prior year. We have incured losses in certain foreign subsidiaries that are not expected to generate a future benefit, which increases our effective tax rate. For 2016 we expect these losses to decrease, which reduces the effective tax rate to 33.4 percent from 43.7 percent in the same period of the prior year. Also contributing to the lower rate in 2016 are a greater amount of foreign earnings taxed at more favorable tax rates.

Despite the favorable change in our effective tax rate, income taxes for the nine months ended September 30, 2016 were essentially flat year over year because of a discrete adjustment in the prior year period to recognize previously unrecognized tax benefits following the settlement of certain matters with a tax authority.

Segment Results

Segment operating profit for the nine months ended September 30, 2016 and 2015 is summarized by segment in the following table:

(Dollars in millions)	Nine Months Ended September 30, 2016	2015	% Change
Operating profit (loss):			
Railroad and Utility Products and Services	$46.9	$48.1	-2 %
Carbon Materials and Chemicals	(29.8)	(13.8)	-116 %
Performance Chemicals	52.6	31.6	66 %
Corporate	(2.2)	(4.9)	55 %
	$67.5	$61.0	11 %
Operating profit (loss) as a percentage of net sales:			
Railroad and Utility Products and Services	10.2 %	9.5 %	0.7 %
Carbon Materials and Chemicals	(8.8)%	(2.9)%	-5.9 %
Performance Chemicals	17.3 %	11.4 %	5.9 %
	6.1 %	4.8 %	1.3 %

RUPS operating profit decreased by $1.2 million or two percent compared to the prior year period. Operating profit as a percentage of net sales for RUPS increased to 10.2 percent from 9.5 percent in the prior year quarter. Operating profit as a percentage of net sales for the nine months ended September 30, 2016 was positively impacted by sales mix favoring higher margin products and services including increased crosstie treatment and bridge services, and reduced fixed costs due to the closure of our Green Spring facility.

CMC operating loss increased by $16.0 million or 116 percent over the prior year period. Operating loss for the nine months ended September 30, 2016 was negatively affected by lower sales volumes and prices for carbon pitch, carbon black feedstock and naphthalene, accelerated depreciation, and $11.4 million of costs to restructure operations. This increase was partially offset by lower raw material costs.

PC operating profit increased by $21.0 million or 66 percent compared to the prior year period. Operating profit as a percentage of net sales for PC increased to 17.3 percent from 11.4 percent in the prior year quarter. Operating profit for the nine months ended September 30, 2016 was a result of higher North American sales volumes for copper based preservatives and wood additives. These higher sales volumes were positively impacted through changes in treated wood product application standards, resulting in treated wood dealers stocking and selling more high retention ground contact treated wood. Sales volumes have also improved due to favorable market trends in the repair and remodeling markets and existing home sales.

Corporate operating loss decreased by $2.7 million or 55 percent compared to the prior year period. Operating loss for the nine months ended September 30, 2015 was negatively affected by foreign currency losses associated with the Company’s legal entity restructuring completed at the end of 2014.

Cash Flow

Net cash provided by operating activities for the nine months ended September 30, 2016 was $82.5 million compared to net cash provided by operating activities of $95.1 million in the prior year period. The decrease in net cash provided

by operating activities was due mainly to higher working capital usage compared to the prior year period principally as a result of an increase in accounts receivable in the current year period and the receipt of a cash advance payment of $30 million to KJCC due to the amendment of a soft pitch supply agreement with its customer in the prior year period.

Net cash used in investing activities amounted to $36.7 million for the nine months ended September 30, 2016 compared to net cash used in investing activities of $27.0 million in the prior year period as the prior year period reflected $12.5 million for the acquisition of the KMG creosote business which was partially offset by $12.3 million of cash proceeds from the sale of the North American utility pole business in the first quarter of 2015. The remainder was offset in the current year period by an increase in capital expenditures of $5.8 million and cash transferred to the buyer of our CMC coal tar distillation facilities in the United Kingdom in exchange for the buyer assuming historical environmental and asset retirement obligations.

Net cash used in financing activities was $44.6 million for the nine months ended September 30, 2016 compared to $96.3 million of net cash used in financing activities in the prior year period. The cash used in financing activities in the first nine months of 2016 reflected debt repayments of $43.4 million. The cash used in financing activities in the first nine months of 2015 reflected debt repayments of $86.3 million and dividend payments of $8.7 million.

Dividends paid were $8.7 million for the nine months ended September 30, 2015. There were no dividends paid or declared in the first nine months of 2016. Koppers Holdings suspended its dividend in February 2015 and does not expect to declare any dividends for the foreseeable future.

Liquidity and Capital Resources

Restrictions on Dividends to Koppers Holdings

Koppers Holdings depends on the dividends from the earnings of Koppers Inc. and its subsidiaries to generate the funds necessary to meet its financial obligations, including the payment of any declared dividend of Koppers Holdings. Koppers Inc.'s credit agreement prohibits it from making dividend payments to us unless (1) such dividend payments are permitted by the indenture governing Koppers Inc.'s Senior Notes and (2) no event of default or potential default has occurred or is continuing under the credit agreement. The indenture governing Koppers Inc.'s Senior Notes restricts its ability to finance our payment of dividends if (1) a default has occurred or would result from such financing, (2) a restricted subsidiary of Koppers Inc. which is not a guarantor under the indenture is not able to incur additional indebtedness (as defined in the indenture), and (3) the sum of all restricted payments (as defined in the indenture) have exceeded the permitted amount (which we refer to as the "basket") at such point in time.

The basket is governed by a formula based on the sum of a beginning amount, plus or minus a percentage of Koppers Inc.'s consolidated net income (as defined in the indenture), plus the net proceeds of Koppers Inc.'s qualified stock issuance or conversions of debt to qualified stock, plus the net proceeds from the sale of or a reduction in an investment (as defined in the indenture) or the value of the assets of an unrestricted subsidiary which is designated a restricted subsidiary. At September 30, 2016 the basket totaled $132.4 million. Notwithstanding such restrictions, the indenture governing Koppers Inc.'s Senior Notes permits an additional aggregate amount of $20.0 million each fiscal year to finance dividends on the capital stock of Koppers Holdings, whether or not there is any basket availability, provided that at the time of such payment, no default in the indenture has occurred or would result from financing the dividends.

In addition, certain required coverage ratios in Koppers Inc.'s revolving credit facility may restrict the ability of Koppers Inc. to pay dividends. See "—Debt Covenants." Koppers Holdings suspended its dividend in February 2015 and does not expect to declare any dividends for the foreseeable future.

Liquidity

The Koppers Inc. revolving credit facility agreement provides for a senior secured revolving credit facility of up to $300.0 million and a senior secured term loan of $240.0 million at variable interest rates. Borrowings under the revolving credit facility are secured by a first priority lien on substantially all of the assets of Koppers Inc. and its material domestic subsidiaries. The revolving credit facility contains certain covenants for Koppers Inc. and its restricted subsidiaries that limit capital expenditures, additional indebtedness, liens, dividends and investments or acquisitions. In addition, such covenants give rise to events of default upon the failure by Koppers Inc. and its restricted subsidiaries to meet certain financial ratios.

As of September 30, 2016, we had $148.3 million of unused revolving credit availability for working capital purposes after restrictions by various debt covenants and certain letter of credit commitments. As of September 30, 2016, $41.7 million of commitments were utilized by outstanding letters of credit.

The following table summarizes our estimated liquidity as of September 30, 2016 (dollars in millions):

Cash and cash equivalents[(1)]	$17.7
Amount available under revolving credit facility	148.3
Amount available under other credit facilities	1.2
Total estimated liquidity	$167.2

(1) Cash includes approximately $17.6 million held by foreign subsidiaries, which if repatriated to the United States, would not incur a material cash tax cost.

Our estimated liquidity was $76.5 million at December 31, 2015.

Our need for cash in the next twelve months relates primarily to contractual obligations which include debt service, purchase commitments and operating leases, as well as working capital, capital maintenance programs and the funding of plant consolidation and rationalizations. We may also use cash to pursue strategic acquisitions. Capital expenditures in 2016, excluding acquisitions, are expected to total approximately $42 to $47 million.

Debt Covenants

The covenants that affect availability of the revolving credit facility and which may restrict the ability of Koppers Inc. to pay dividends include the following financial ratios:

- The fixed charge coverage ratio, calculated as of the end of each fiscal quarter for the four fiscal quarters then ended, is not permitted to be less than 1.10. The fixed charge coverage ratio at September 30, 2016 was 1.60.
- The leverage ratio, calculated as of the end of each fiscal quarter for the four fiscal quarters then ended, is not permitted to exceed 5.25. The leverage ratio at September 30, 2016 was 4.11.

We are currently in compliance with all covenants in the credit agreement governing the revolving credit facility. Our continued ability to meet those financial ratios and tests can be affected by events beyond our control, and we cannot assure you that we will meet these ratios and tests in the future.

At September 30, 2016, Koppers Inc. had $300.0 million principal value outstanding of Senior Notes. The Senior Notes include customary covenants that restrict, among other things, our ability to incur additional debt, pay dividends or make certain other restricted payments, incur liens, merge or sell all or substantially all of our assets or enter into various transactions with affiliates. We are currently in compliance with all covenants in the Senior Notes indenture.

Legal Matters

The information set forth in Note 18 to the Condensed Consolidated Financial Statements of Koppers Holdings Inc. included in Item 1 of this Part I is incorporated herein by reference.

Recently Issued Accounting Guidance

The information set forth in Note 2 to the Condensed Consolidated Financial Statements of Koppers Holdings Inc. included in Item 1 Part I is incorporated herein by reference.

Critical Accounting Policies

There have been no material changes to the Company’s critical accounting policies as disclosed in the Company’s Annual Report on Form 10-K for the year ended December 31, 2015.

Environmental and Other Matters

The information set forth in Note 18 to the Condensed Consolidated Financial Statements of Koppers Holdings Inc. included in Item 1 of Part I is incorporated herein by reference.

ITEM 3. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

There are no material changes to the disclosure on this matter made in the Company’s Annual Report on Form 10-K for the year ended December 31, 2015.

ITEM 4. CONTROLS AND PROCEDURES

The Company's management, with the participation of the Chief Executive Officer and Chief Financial Officer, have evaluated the effectiveness of the Company's disclosure controls and procedures, as defined in Rules 13a-15(e) and 15d-15(e) of the Securities Exchange Act of 1934 as of the end of the period covered by this report. Based on that evaluation, the Chief Executive Officer and Chief Financial Officer have concluded that these controls and procedures were effective as of the end of the period covered by this report. There was no change in the Company's internal control over financial reporting (as such term is defined in Rule 13a-15(f) under the Exchange Act) that occurred during the quarter ended September 30, 2016 that has materially affected, or is reasonably likely to materially affect, the Company's internal control over financial reporting.

PART II—OTHER INFORMATION

ITEM 1. LEGAL PROCEEDINGS

The information set forth in Note 18 to the Condensed Consolidated Financial Statements of Koppers Holdings Inc. included in Item 1 of Part I of this report is incorporated herein by reference.

ITEM 1A. RISK FACTORS

There have been no material changes to the Risk Factors previously disclosed in Item 1A of the Company's Annual Report on Form 10-K for the year ended December 31, 2015.

ITEM 2. UNREGISTERED SALES OF EQUITY SECURITIES AND USE OF PROCEEDS

No shares were repurchased in the nine months ended September 30, 2016 under the current $75 million share repurchase program approved in November 2011. The approximate dollar value of common shares that may yet be purchased under this program is $52.8 million. The repurchase program has no expiration date.

ITEM 3. DEFAULTS UPON SENIOR SECURITIES

Not applicable.

ITEM 4. MINE SAFETY DISCLOSURES

Not applicable.

ITEM 5. OTHER INFORMATION

Not applicable.

ITEM 6. EXHIBITS

12.1*	Computation of ratio of earnings to fixed charges
31.1*	Certification of Chief Executive Officer Pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.
31.2*	Certification of Chief Financial Officer Pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.
32.1*	Certification of Chief Executive Officer and Chief Financial Officer pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.
101.INS*	XBRL Instance Document
101.SCH*	XBRL Taxonomy Extension Schema Document
101.CAL*	XBRL Taxonomy Extension Calculation Linkbase Document
101.DEF*	XBRL Taxonomy Extension Definition Linkbase Document
101.LAB*	XBRL Taxonomy Extension Label Linkbase Document
101.PRE*	XBRL Taxonomy Extension Presentation Linkbase Document

*Filed herewith.

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned thereunto duly authorized.

KOPPERS HOLDINGS INC.

(REGISTRANT)

Date: November 3, 2016 By: /s/ MICHAEL J. ZUGAY
Michael J. Zugay

Chief Financial Officer
(Principal Financial Officer,

Principal Accounting Officer and Duly Authorized Officer)