

CARBO CERAMICS INC
Form 10-Q
April 25, 2019

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 March 31, 2019

or

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

For the transition period from to .

Commission File No. 001-15903

CARBO CERAMICS INC.

(Exact name of registrant as specified in its charter)

DELAWARE 72-1100013
(State or other jurisdiction of (I.R.S. Employer
incorporation or organization) Identification Number)

575 North Dairy Ashford

Suite 300

Houston, TX 77079

(Address of principal executive offices)

(281) 921-6400

(Registrant's telephone number)

Edgar Filing: CARBO CERAMICS INC - Form 10-Q

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, if any, every Interactive Data File required to be submitted pursuant to Rule 405 of Regulation S-T (§232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes No

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

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

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

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

As of April 19, 2019, 29,342,216 shares of the registrant's Common Stock, par value \$.01 per share, were outstanding.

CARBO CERAMICS INC.

Index to Quarterly Report on Form 10-Q

PART I. FINANCIAL
INFORMATION

PAGES

Item 1. Financial
Statements 3

Consolidated
Balance
Sheets -
March 31,
2019
(Unaudited)
and
December 31,
2018 3

Consolidated
Statements of
Operations
(Unaudited) -
Three months
ended March
31, 2019 and
2018 4

Consolidated
Statements of
Shareholders'
Equity
(Unaudited) -
Three months
ended March
31, 2019 and
2018 5

Consolidated
Statements of
Cash Flows
(Unaudited) -
Three months
ended March
31, 2019 and
2018 6

Notes to
Consolidated
Financial
Statements
(Unaudited) 7-13

Item 2. Management's
Discussion
and Analysis
of Financial
Condition and
Results of
Operations 14-18

Item 3. Quantitative
and
Qualitative
Disclosures
about Market
Risk 19

Item 4. Controls and
Procedures 19

PART II. OTHER INFORMATION

Item 1. Legal
Proceedings 20

Item 1A. Risk Factors 20

Item 2. Unregistered
Sales of
Equity
Securities and
Use of
Proceeds 20

Item 3. Defaults
Upon Senior
Securities 20

Item 4. Mine Safety
Disclosure 20

Item 5. Other
Information 20

Item 6. Exhibits 21

<u>Exhibit Index</u>	22
<u>Signatures</u>	23

PART I. FINANCIAL INFORMATION

ITEM 1. FINANCIAL STATEMENTS
CARBO CERAMICS INC.

CONSOLIDATED BALANCE SHEETS

(\$ in thousands, except per share data)

	March 31, 2019 (Unaudited)	December 31, 2018 (Note 1)
ASSETS		
Current assets:		
Cash and cash equivalents	\$ 71,190	\$ 72,752
Restricted cash	1,725	1,725
Trade accounts and other receivables, net	29,520	35,693
Inventories:		
Finished goods	35,489	41,422
Raw materials and supplies	19,201	22,592
Total inventories	54,690	64,014
Prepaid expenses and other current assets	4,413	4,754
Income tax receivable	2,383	2,319
Total current assets	163,921	181,257
Restricted cash	8,853	8,840
Property, plant and equipment:		
Land and land improvements	39,584	39,584
Land-use and mineral rights	19,696	19,696
Buildings	75,804	75,815
Machinery and equipment	433,307	432,906
Construction in progress	28,946	29,129
Total property, plant and equipment	597,337	597,130
Less accumulated depreciation and amortization	330,814	323,511
Net property, plant and equipment	266,523	273,619
Goodwill	3,500	3,500
Operating lease right-of-use assets	54,452	—
Intangible and other assets, net	7,669	7,150
Total assets	\$ 504,918	\$ 474,366
LIABILITIES AND SHAREHOLDERS' EQUITY		
Current liabilities:		
Accounts payable	\$ 12,578	\$ 12,174
Accrued payroll and benefits	3,840	6,950
Accrued freight	2,229	2,434
Accrued utilities	656	1,012
Other accrued expenses	7,512	14,020
Notes payable, related parties	27,040	27,040
Long-term debt, current portion	15,733	15,733
Operating lease liabilities	10,557	—
Other current liabilities	745	1,192

Edgar Filing: CARBO CERAMICS INC - Form 10-Q

Total current liabilities	80,890	80,555
Deferred income taxes	1,114	1,114
Long-term debt, net	45,820	45,650
Noncurrent operating lease liabilities	52,805	—
Other long-term liabilities	4,193	10,764
Shareholders' equity:		
Preferred stock, par value \$0.01 per share, 5,000 shares authorized, none outstanding	—	—
Common stock, par value \$0.01 per share, 80,000,000 shares authorized; 28,985,866 and 27,710,861 shares issued and outstanding at March 31, 2019 and December 31, 2018, respectively	290	277
Additional paid-in capital	136,152	132,080
Retained earnings	183,654	203,926
Total shareholders' equity	320,096	336,283
Total liabilities and shareholders' equity	\$ 504,918	\$ 474,366

The accompanying notes are an integral part of these statements.

CARBO CERAMICS INC.

CONSOLIDATED STATEMENTS OF OPERATIONS

(\$ in thousands, except per share data)

(Unaudited)

	Three months ended March 31,	
	2019	2018
Revenues	\$47,458	\$49,367
Cost of sales (exclusive of depreciation and amortization shown below)	47,905	50,971
Depreciation and amortization	7,403	8,411
Gross loss	(7,850)	(10,015)
Selling, general and administrative expenses (exclusive of depreciation and amortization shown below)	10,034	9,607
Depreciation and amortization	398	614
Other operating income	(71)	(4)
Operating loss	(18,211)	(20,232)
Other expense:		
Interest expense, net	(2,077)	(2,017)
Other income (expense), net	294	(23)
	(1,783)	(2,040)
Loss before income taxes	(19,994)	(22,272)
Income tax benefit	—	—
Net loss	\$(19,994)	\$(22,272)
Loss per share:		
Basic	\$(0.73)	\$(0.83)
Diluted	\$(0.73)	\$(0.83)
Other information:		
Dividends declared per common share	\$—	\$—

The accompanying notes are an integral part of these statements.

CARBO CERAMICS INC.

CONSOLIDATED STATEMENTS OF SHAREHOLDERS' EQUITY

(\$ in thousands)

(Unaudited)

	Additional			
	Common	Paid-In	Retained	
	Stock	Capital	Earnings	Total
Balances at January 1, 2019	\$ 277	\$ 132,080	\$203,926	\$336,283
Net loss	—	—	(19,994)	(19,994)
Shares sold under ATM program	9	3,366	—	3,375
Stock granted under restricted stock plan, net	4	(4)	—	—
Stock based compensation	—	710	—	710
Shares surrendered by employees to pay taxes	—	—	(278)	(278)
Balances at March 31, 2019	\$ 290	\$ 136,152	\$183,654	\$320,096

	Additional			
	Common	Paid-In	Retained	
	Stock	Capital	Earnings	Total
Balances at January 1, 2018	\$ 271	\$ 125,715	\$279,779	\$405,765
Net loss	—	—	(22,272)	(22,272)
Stock granted under restricted stock plan, net	3	(3)	—	—
Stock based compensation	—	903	—	903
Shares surrendered by employees to pay taxes	—	—	(421)	(421)
Balances at March 31, 2018	\$ 274	\$ 126,615	\$257,086	\$383,975

The accompanying notes are an integral part of these statements.

CARBO CERAMICS INC.

CONSOLIDATED STATEMENTS OF CASH FLOWS

(\$ in thousands)

(Unaudited)

	Three months ended March 31,	
	2019	2018
Operating activities		
Net loss	\$(19,994)	\$(22,272)
Adjustments to reconcile net loss to net cash used in operating activities:		
Depreciation and amortization	7,801	9,025
Amortization of debt issuance costs and original issue discount	169	169
Provision for doubtful accounts	104	42
Deferred income taxes	—	4
Gain on disposal or impairment of assets	(71)	(4)
Noncash lease expense	640	—
Stock compensation expense	861	891
Change in fair value of derivative instruments	—	(604)
Changes in operating assets and liabilities:		
Trade accounts and other receivables	6,069	2,200
Inventories	9,194	4,975
Prepaid expenses and other current assets	304	(1,404)
Accounts payable	404	1,053
Accrued expenses	(8,533)	(2,578)
Income tax receivable, net	(63)	40
Other, net	(469)	1,380
Net cash used in operating activities	(3,584)	(7,083)
Investing activities		
Capital expenditures	(623)	(391)
Net proceeds from asset sales	71	19
Net cash used in investing activities	(552)	(372)
Financing activities		
Repayments on notes payable	(509)	(375)
Proceeds from issuance of common stock under ATM program	3,375	—
Purchase of common stock	(279)	(421)
Net cash provided by (used in) financing activities	2,587	(796)
Net decrease in cash and cash equivalents and restricted cash	(1,549)	(8,251)
Cash and cash equivalents and restricted cash at beginning of period	83,317	78,385
Cash and cash equivalents and restricted cash at end of period	\$81,768	\$70,134
Supplemental cash flow information		
Interest paid	\$2,949	\$2,906
Income taxes paid	\$—	\$—

The accompanying notes are an integral part of these statements.

CARBO CERAMICS INC.

NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

(\$ in thousands, except per share data)

(Unaudited)

1. Basis of Presentation

The accompanying unaudited consolidated financial statements of CARBO Ceramics Inc. have been prepared in accordance with United States generally accepted accounting principles (“U.S. GAAP”) for interim financial information and with the instructions to Form 10-Q and Article 10 of Regulation S-X. Accordingly, they do not include all of the information and notes required for complete financial statements. In the opinion of management, all adjustments, consisting only of normal recurring adjustments, considered necessary for a fair presentation have been included. The results of the interim periods presented herein are not necessarily indicative of the results to be expected for any other interim period or the full year. The consolidated balance sheet as of December 31, 2018 has been derived from the audited financial statements at that date. These financial statements should be read in conjunction with the audited consolidated financial statements and notes thereto for the year ended December 31, 2018 included in the annual report on Form 10-K of CARBO Ceramics Inc. for the year ended December 31, 2018.

The consolidated financial statements include the accounts of CARBO Ceramics Inc. and its operating subsidiaries (the “Company”). All significant intercompany transactions have been eliminated.

The Company is currently producing ceramic technology proppants from its Eufaula, Alabama manufacturing facility, base ceramic proppants from its Toombsboro, Georgia manufacturing facility, and processing sand at its Marshfield, Wisconsin facility. The Company also produces ceramic media at its McIntyre, Georgia and Eufaula, Alabama facilities. The Company is also using its Toombsboro, Georgia facility for contract manufacturing. In addition, the Company produces resin-coated ceramic proppants at its New Iberia, Louisiana facility. The Company continues to assess liquidity needs and manage cash flows. As a result of the steps the Company has taken to enhance its liquidity, the Company currently believes that cash on hand and cash flows from operations will enable the Company to meet its working capital, capital expenditure, debt service and other funding requirements for at least one year from the date this Form 10-Q is issued. Our financial forecasts in recent periods have proven less reliable given customer demand, which is highly volatile in the current operating environment and no committed sales backlog exists with our customers. As a result, there is no guarantee that our financial forecast, which projects sufficient cash will be available to meet planned operating expenses and other cash needs, will be accurate. In the event that the Company experiences lower customer demand, lower prices for its products and services, or higher expenses than it forecasted, or if the Company underperforms relative to its forecast, the Company could experience negative cash flows from operations, as has been the case in prior years, which would reduce its cash balances and liquidity.

The second phase of the retrofit of our Eufaula, Alabama plant with the new KRYPTOSPHERE® technology has been suspended until such time that market conditions improve enough to warrant completion. As of March 31, 2019, the value of the assets relating to this project totaled approximately 83% of the Company’s total construction in progress and the project is approximately 75% complete.

Deferred Taxes – Valuation Allowance

Accounting Standards Codification (“ASC”) Topic 740, Income Taxes, provides the carrying value of deferred tax assets should be reduced by the amount not expected to be realized. A company should reduce deferred tax assets by a valuation allowance if, based on the weight of all available evidence, it is more likely than not that some portion or all of the deferred tax assets will not be realized. The valuation allowance should be sufficient to reduce the deferred tax asset to the amount that is more likely than not to be realized. ASC 740 requires all available evidence, both positive and negative, be considered to determine whether a valuation allowance for deferred tax assets is needed in the financial statements. Additionally, there can be statutory limitations on the deferred tax assets should certain conditions arise. As a result of the significant decline in oil and gas activities and net losses incurred over the past several years, we believe it is more likely than not that a portion of our deferred tax assets will not be realized in the future. Our valuation allowance against a portion of our deferred tax assets as of March 31, 2019 was \$76,604. Our assessment of the realizability of our deferred tax assets is based on the weight of all available evidence, both positive and negative, including future reversals of deferred tax liabilities.

Restricted Cash

A portion of the Company's cash balance is restricted to its use in order to provide collateral primarily for letters of credit, corporate cards and funds held in escrow relating to the sale of its Millen plant. As of March 31, 2019 and December 31, 2018, total restricted cash was \$10,578 and \$10,565, respectively.

Lower of Cost and Net Realizable Value Adjustments

As of March 31, 2019, the Company reviewed the carrying values of all inventories and concluded that no adjustments were warranted for finished goods and raw materials intended for use in the Company's manufacturing process.

Manufacturing Production Levels Below Normal Capacity

As a result of the Company substantially reducing manufacturing production levels, including by idling certain facilities, certain production costs have been expensed instead of being capitalized into inventory. The Company expenses fixed production overhead amounts in excess of amounts that would have been allocated to each unit of production at normal production levels. For the three months ended March 31, 2019 and 2018, the Company expensed \$8,484 and \$9,723, respectively, in production costs.

Long-lived and Other Noncurrent Assets Impairment

The Company has temporarily idled production at various manufacturing facilities. The Company does not assess temporarily idled assets for impairment unless events or circumstances indicate that the carrying amounts of those assets may not be recoverable. Short-term stoppages of production for less than one year do not generally significantly impact the long-term expected cash flows of the idled facility. As of March 31, 2019, the Company concluded that there were no events or circumstances that would indicate that carrying amounts of long-lived and other noncurrent assets might be impaired. However, the Company continues to monitor market conditions closely. Further deterioration of market conditions could result in impairment charges being taken on the Company's long-lived and other noncurrent assets, including the Company's manufacturing plants, goodwill and intangible assets. The Company will evaluate long-lived and other noncurrent assets for impairment at such time that events or circumstances indicate that carrying amounts might be impaired.

Reclassification of Prior Period Amounts

Certain prior period financial information has been reclassified to conform to current period presentation.

2. Loss Per Share

The following table sets forth the computation of basic and diluted loss per share under the two-class method:

	Three months ended March 31,	
	2019	2018
Numerator for basic and diluted loss per share:		
Net loss	\$(19,994)	\$(22,272)

Effect of reallocating undistributed earnings		
of participating securities	—	—
Net loss available under the two-class method	\$(19,994)	\$(22,272)
Denominator:		
Denominator for basic loss per share--weighted-average		
shares	27,464,717	26,788,591
Effect of dilutive potential common shares	—	—
Denominator for diluted loss per share--adjusted		
weighted-average shares	27,464,717	26,788,591
Basic loss per share	\$(0.73)	\$(0.83)
Diluted loss per share	\$(0.73)	\$(0.83)

3. Natural Gas Derivative Instruments

Natural gas is used to fire the kilns at the Company's manufacturing plants. In an effort to mitigate volatility in the cost of natural gas purchases and reduce exposure to short term spikes in the price of this commodity, we previously contracted in advance for portions

of our future natural gas requirements. Due to the severe decline in industry activity beginning in early 2015, the Company significantly reduced production levels and consequently did not take delivery of all of the contracted natural gas quantities. As a result, the Company had accounted for the relevant contracts as derivative instruments. However, as of December 31, 2018, the last derivative contract expired and no future natural gas obligations existed.

During the three months ended March 31, 2019 and 2018, the Company recognized a gain on derivative instruments of \$0 and \$218, respectively, in cost of sales.

4. Leases

The Company leases certain property, plant and equipment under operating leases, primarily consisting of railroad equipment leases, certain distribution center assets and real estate. Leases with an initial term of twelve months or less are not recorded on the balance sheet.

Most leases include one or more options to renew, with renewal terms that can extend the lease term from one to ten years or more. The exercise of lease renewal options is typically at the Company's sole discretion. Certain leases also include options to purchase the leased property.

As a result of the underutilization of some of the Company's assets, we rent or sublease certain assets to third parties, primarily consisting of a portion of our railroad equipment and distribution center assets.

We determine if an arrangement is a lease at inception. Operating leases are included in operating lease right-of-use ("ROU") assets, operating lease liabilities, and noncurrent operating lease liabilities on our consolidated balance sheets.

Operating lease ROU assets and operating lease liabilities are recognized based on the present value of the future minimum lease payments over the lease term at commencement date. As most of our leases do not provide an implicit rate, we use our incremental borrowing rate based on the information available at commencement date in determining the present value of future payments. The operating lease ROU asset also includes any lease payments made and excludes lease incentives and initial direct costs incurred. Our lease terms may include options to extend or terminate the lease when it is reasonably certain that we will exercise that option. As of March 31, 2019, it is not reasonably certain that we will exercise any of these options. Lease expense for minimum lease payments is recognized on a straight-line basis over the lease term.

We have lease agreements with lease and non-lease components, which are accounted for as a single lease component, primarily related to railroad equipment leases.

The components of lease cost were as follows:

	Three Months Ended March 31, 2019
Operating lease cost	\$4,158
Short-term lease cost	719

Edgar Filing: CARBO CERAMICS INC - Form 10-Q

Sublease income ^(a)	(1,100)
Net lease cost	\$ 3,777

^(a) As a result of the adoption of ASC 842, sublease income is classified within revenues for three-months ended March 31, 2019. Prior to the adoption, sublease income was recorded as a reduction to cost of sales. Sublease income excludes rental income from owned assets of \$406, which is recorded within revenues.

Future minimum lease payments under non-cancellable leases as of March 31, 2019 were as follows:

2019	\$ 12,223
2020	16,893
2021	16,484
2022	12,562
2023	9,216
Thereafter	16,458
Total lease payments	\$83,836
Less: imputed interest	(20,474)
Present value of lease liabilities	\$63,362

The adoption of ASC 842 resulted in the Company recording a right of use asset of \$56,591 and a total lease liability of \$64,877 on January 1, 2019. The Company also reduced its other long-term liabilities by approximately \$6,500 and accrued expenses by approximately \$1,800 as of January 1, 2019 given that deferred rent is now included within the total lease liability. These adjustments represented non-cash changes during the period ended March 31, 2019.

Other information related to leases was as follows:

	Three Months Ended March 31, 2019
Cash paid for amounts included in the measurement of lease liabilities	
Operating cash flows from operating leases	\$ 2,979
Leased assets obtained in exchange for new operating lease liabilities	—

For the three months ended March 31, 2019, the weighted average remaining lease term was 5.75 years and the weighted average discount rate was 10.3%.

5. Stock Based Compensation

The Amended and Restated 2014 CARBO Ceramics Inc. Omnibus Incentive Plan (the “Amended and Restated 2014 Omnibus Incentive Plan”) provides for granting of cash-based awards, stock options (both non-qualified and incentive) and other equity-based awards (including stock appreciation rights, phantom stock, restricted stock, restricted stock units, performance shares, deferred share units or share-denominated performance units) to employees and non-employee directors. As of March 31, 2019, 100,528 shares were available for issuance under the Amended and Restated 2014 Omnibus Incentive Plan.

A summary of restricted stock activity and related information for the three months ended March 31, 2019 is presented below:

	Weighted-Average	
	Grant-Date	
	Fair Value	
	Shares	Per Share
Nonvested at January 1, 2019	541,560	\$ 12.14
Granted	468,984	\$ 4.55
Vested	(246,675)	\$ 12.74
Forfeited	(19,492)	\$ 11.55
Nonvested at March 31, 2019	744,377	\$ 7.17

As of March 31, 2019, there was \$4,844 of total unrecognized compensation cost related to restricted shares granted under the Amended and Restated 2014 Omnibus Incentive Plan. That cost is expected to be recognized over a weighted-average period of 2.4 years. The total fair value of shares vested during the three months ended March 31, 2019 was \$1,011. For restricted stock awards granted to certain executives of the Company, there is a holding period requirement of two years after the vesting date. For the portion of such awards that are not expected to be withheld to satisfy tax withholdings, the grant date fair value for the January 2019 awards was discounted for the restriction of liquidity by 20.6%, which was calculated using the Finnerty model.

The Company made market-based cash awards to certain executives of the Company pursuant to the Amended and Restated 2014 Omnibus Incentive Plan. As of March 31, 2019, the total target award outstanding was \$3,019. The payout of awards can range from 0% to 200% based on the Company's Relative Total Shareholder Return calculated over a three year period beginning January 1 of the year each grant was made. During the three months ended March 31, 2019, a total of \$708 was paid relating to the 2016 grant, which was approximately 61% of the total target award. During the three months ended March 31, 2018, a total of \$526 was paid relating to the 2015 grant, which was approximately 76% of the total target award.

The Company also granted phantom stock and cash-settled restricted stock units (collectively discussed as "phantom stock") to certain key employees pursuant to the Amended and Restated 2014 Omnibus Incentive Plan. The units subject to a phantom stock award vest and cease to be forfeitable in equal annual installments over a three-year period. Participants awarded units of phantom stock are entitled to a lump sum cash payment equal to the fair market value of a share of Common Stock on the vesting date. In no event will Common Stock of the Company be issued with regard to outstanding phantom stock awards. As of March 31, 2019, there were 319,892 units of phantom stock granted under the Amended and Restated 2014 Omnibus Incentive Plan, of which 115,020 have vested and 27,862 have been forfeited. As of March 31, 2019, nonvested units of phantom stock under the Amended and Restated 2014 Omnibus Incentive Plan had a total value of \$620, a portion of which is accrued as a liability within Accrued Payroll and Benefits. Compensation expense for these units of phantom stock will be recognized over the three-year vesting period. The amount

of compensation expense recognized each period will be based on the fair value of the Company's common stock at the end of each period.

6. Long-Term Debt and Notes Payable

On March 2, 2017, the Company entered into an Amended and Restated Credit Agreement (the "New Credit Agreement"), as last amended on June 7, 2018, with Wilks Brothers, LLC ("Wilks") to replace its term loan with Wells Fargo Bank, National Association ("Wells Fargo") and provide the Company with additional liquidity for a longer term. The New Credit Agreement is a \$65,000 facility maturing on December 31, 2022, that consists of a \$52,651 term loan that was made at closing to pay off Wells Fargo and an additional term loan of \$12,349 that was made to the Company after the Company satisfied certain post-closing conditions. The \$52,651 term loan was a non-cash transaction to the Company as Wilks directly paid Wells Fargo and assumed the New Credit Agreement. The Company's obligations bear interest at 9.00% and are guaranteed by its two operating subsidiaries. No principal repayments are required until maturity (except in certain circumstances), and there are no financial covenants.

The loan cannot be prepaid during the first three years without making the lenders whole for interest that would have been payable over the entire remaining term of the loan. The Company's obligations under the New Credit Agreement are secured by: (i) a pledge of all accounts receivable and inventory, (ii) cash in certain accounts, (iii) domestic distribution assets residing on owned real property, (iv) the Company's Marshfield, Wisconsin and Toombsboro, Georgia plant facilities and equipment, and (v) certain real property interests in mines and minerals. Other liens previously in favor of Wells Fargo were released.

As of March 31, 2019, the Company's outstanding debt under its New Credit Agreement was \$65,000. Within 270 days of completion of all post-closing matters relating to the sale of its Millen, Georgia plant, the Company is required to use 100% of the Net Cash Proceeds (as defined in the New Credit Agreement) from the sale to either (1) prepay the outstanding principal amount of the Term Loans or (2) reinvest in fixed or capital assets of any Credit Party (as defined in the New Credit Agreement). The Company continues to evaluate these options, and the Company is currently in negotiations with its lenders with respect to other options. As of March 31, 2019, the Company has classified \$15,733 of the outstanding debt as current liabilities, which represents an estimate of the Net Cash Proceeds that the Company would be required to prepay if it did not reinvest in fixed or capital assets. As of March 31, 2019, the fair value of the Company's long-term debt approximated the carrying value.

As of March 31, 2019, the Company had \$640 of unamortized debt issuance costs relating to the New Credit Agreement that are presented as a direct reduction from the carrying amount of the long-term debt obligation. The Company had \$4,625 and \$2,625 in standby letters of credit issued through its banks as of March 31, 2019 and December 31, 2018, respectively, primarily as collateral relating to railcar leases.

On March 2, 2017, in connection with entry into the New Credit Agreement, the Company issued a Warrant (the "Warrant") to Wilks. Subject to the terms of the Warrant, the Warrant entitles the holder thereof to purchase up to 523,022 shares of the Common Stock, at an exercise price of \$14.91 per share, payable in cash. The Warrant expires on December 31, 2022. Based on a Form 13F filing with the SEC on February 7, 2019 as of December 31, 2018, Wilks owned approximately 10.7% of the Company's outstanding common stock as of March 31, 2019, and should Wilks fully exercise the Warrant to purchase an additional 523,022 shares, it would hold approximately 12.3% of the Company's outstanding common stock. Upon issuance of the Warrant, the Company recorded an increase to

additional paid-in capital of \$3,871. As of March 31, 2019, the unamortized original issue discount was \$2,808.

In May 2016, the Company received proceeds of \$25,000 from the issuance of separate unsecured Promissory Notes (the "Notes") to two of the Company's Directors. Each Note matured on April 1, 2019 and bore interest at 7.00%. On March 2, 2017, in connection with the New Credit Agreement, the Notes were amended to provide for payment-in-kind, or PIK, interest payments at 8.00% until the lenders under the New Credit Agreement receive two consecutive semi-annual cash interest payments. On April 1, 2017, the Company made a \$997 interest payment as PIK, and capitalized the resulting amount to the outstanding principal balance. On October 1, 2017, the Company made a \$1,043 interest payment as PIK, and capitalized the resulting amount to the outstanding principal balance. As of March 31, 2019, the outstanding principal balance of the Notes of \$27,040 was recorded within current liabilities. On April 1, 2019, the Company made a \$27,040 payment to repay the Notes. As of April 25, 2019, the outstanding principal balance of the Notes was \$0.

Interest cost for the three months ended March 31, 2019 and 2018 was \$2,077 and \$2,035, respectively. Interest cost primarily includes interest expense relating to the Company's debts as well as amortization and the write-off of debt issuance costs and amortization of the original issue discount associated with the New Credit Agreement and Warrant.

7. New Accounting Pronouncements

In February 2016, the FASB issued ASU No. 2016-02, "Leases (Topic 842)," which amends current lease guidance. This guidance requires, among other things, that lessees recognize the following for all leases (with the exception of short-term leases) at the commencement date: (1) a lease liability, which is a lessee's obligation to make lease payments arising from a lease, measured on a discounted basis; and (2) a right-of-use asset, which is an asset that represents the lessee's right to use, or control the use of, a specified asset for the lease term. Lessees and lessors must apply a modified retrospective transition approach for leases existing at, or entered into after, the beginning of the earliest comparative period presented in the financial statements. In July 2018, the FASB issued ASU No. 2018-11, "Leases (Topic 842): Targeted Improvements," which simplifies the implementation by allowing entities the option to instead apply the provisions of the new guidance at the effective date, without adjusting the comparative periods presented. The Company adopted this guidance effective January 1, 2019 without adjusting the comparative periods. In addition, the Company elected the package of practical expedients permitted under the guidance, which among other things, allowed the Company to carry forward the historical lease classification. As of March 31, 2019, the Company's operating lease ROU asset was \$54,452 and its total lease liability was \$63,362. In addition, upon implementation, the Company's deferred rent balances, recorded primarily within other long-term liabilities and accrued expenses as of December 31, 2018, of approximately \$8,300 were removed and recorded to the lease liability. The Company has implemented a lease accounting system for accounting for leases under the new standard. There were no significant impacts to the consolidated statement of operations and consolidated statement of cash flows. See Note 4 for additional information.

8. Equity Offering

On July 28, 2016, the Company filed a prospectus supplement and associated sales agreement related to an at-the-market ("ATM") equity offering program pursuant to which the Company may sell, from time to time, common stock with an aggregate offering price of up to \$75,000 through Cowen and Company LLC, as sales agent, for general corporate purposes. During the three months ended March 31, 2019, the Company sold a total of 893,650 shares of its common stock under the ATM program for \$3,453, or an average of \$3.86 per share, and received proceeds of \$3,375, net of commissions of \$78. As of March 31, 2019, the Company had sold a total of 4,599,586 shares of its common stock under the ATM program for \$52,980, or an average of \$11.52 per share, and received proceeds of \$51,788, net of commissions of \$1,192. Subsequent to March 31, 2019, the Company sold an additional 356,350 shares of its common stock under the ATM program for \$1,259, or an average of \$3.53 per share, and received proceeds of \$1,231, net of commissions of \$28.

9. Segment Information

The Company has two operating segments: 1) Oilfield and Industrial Technologies and Services and 2) Environmental Technologies and Services. Discrete financial information is available for each operating segment. Management of each operating segment reports to our Chief Executive Officer, the Company's chief operating decision maker, who regularly evaluates income before income taxes as the measure to evaluate segment performance and to allocate resources. The accounting policies of each segment are the same as those described in the summary of significant accounting policies in Note 1 of the consolidated financial statements included in the annual report on Form 10-K for the year ended December 31, 2018.

The Company's Oilfield and Industrial Technologies and Services segment manufactures and sells ceramic technology products and services, base ceramic proppant and frac sand for both the oilfield and industrial sectors. These products have different technology features and product characteristics, which vary based on the application for which they are intended to be used. The various ceramic products' manufacturing processes are similar.

Oilfield ceramic technology products, base ceramic proppant and frac sand proppant are manufactured and sold to pressure pumping companies and oil and gas operators for use in the hydraulic fracturing of natural gas and oil wells. The Oilfield and Industrial Technologies and Services segment also promotes increased production and Estimated Ultimate Recovery ("EUR") of oil and natural gas by providing industry-leading technology to Design, Build, and Optimize the Frac[®]. Through our wholly-owned subsidiary StrataGen, Inc., we sell one of the most widely used fracture stimulation software under the brand FracPro and provide fracture design and consulting services to oil and natural gas E&P companies under the brand StrataGen.

The Company's industrial ceramic technology products are manufactured at the same facilities and using the same machinery and equipment as the oilfield products, however they are sold to industrial companies. These products are designed for use in various industrial technology applications, including, but not limited to, casting and milling. The Company's chief operating decision maker reviews discreet financial information as a whole for all of the Company's manufacturing, consulting and software businesses. Manufacturing includes the manufacture of technology products, base ceramics, industrial ceramics, sand and contract manufacturing, regardless of the industry the products are ultimately sold to. See Note 10 for disaggregated revenue information.

The Company's Environmental Technologies and Services segment designs, manufactures and sells products and services intended to protect clients' assets, minimize environmental risks, and lower lease operating expense ("LOE"). AGPI, a wholly-owned subsidiary of the Company, provides spill prevention, containment and countermeasure systems for the oil and gas and other industries. AGPI uses proprietary technology designed to enable its clients to extend the life of their storage assets, reduce the potential for spills and provide containment of stored materials.

Summarized financial information for the Company's operating segments for the three months ended March 31, 2019 and 2018 is shown in the following tables. Intersegment sales are not material.

	Oilfield and Industrial Technologies and Services	Environmental Technologies and Services	Total
(\$ in thousands)			
Three Months Ended March 31, 2019			
Revenue from external customers	\$40,087	\$ 7,371	\$47,458
(Loss) income before income taxes	(20,266)	272	(19,994)
Depreciation and amortization	7,533	268	7,801
Three Months Ended March 31, 2018			
Revenue from external customers	\$42,467	\$ 6,900	\$49,367
(Loss) income before income taxes	(22,767)	495	(22,272)
Depreciation and amortization	8,736	289	9,025

10. Disaggregated Revenue

The following table disaggregates revenue by product line:

	Three Months Ended March 31,	
	2019	2018
Oilfield and Industrial Technologies and Services segment		
Technology products and services	\$7,189	\$9,870
Industrial products and services	4,727	3,292
Base ceramic and sand proppants	26,665	29,305
Sublease and rental income	1,506	—
	40,087	42,467
Environmental Technologies and Services segment	7,371	6,900
	\$47,458	\$49,367

Sales of oilfield technology products and services, consulting services, and FracPro software sales are included within Technology products and services. Sales of industrial ceramic products, industrial technology products and contract manufacturing are included within Industrial products and services. Sales of oilfield base ceramic and sand proppants, as well as railcar usage fees are included within Base ceramic and sand proppants. Sublease and rental income primarily consists of the sublease of certain railroad equipment and rental income related to leases on some of our underutilized distribution center assets. As a result of the adoption of ASC 842 as of January 1, 2019, these amounts

were classified within revenues during the three months ended March 31, 2019. These amounts were classified as a reduction of costs for the period ended March 31, 2018. See Note 4.

11. Legal Proceedings

The Company is subject to legal proceedings, claims and litigation arising in the ordinary course of business. While the outcome of these matters is currently not determinable, management does not expect that the ultimate costs to resolve these matters will have a material adverse effect on the Company's consolidated financial position, results of operations, or cash flows.

12. Subsequent Events

On April 1, 2019, the Company repaid a total of \$27,040 related to two separate unsecured Promissory Notes with a current and former Director of the Company.

During April 2019, the Company sold an additional 356,350 shares of its common stock under the ATM program for \$1,259, or an average of \$3.53 per share, and received proceeds of \$1,231, net of commissions of \$28.

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

Overview

CARBO Ceramics Inc. ("we," "us," "our" or our "Company") is a global technology company that provides products and services to the oil and gas, industrial, and environmental markets to enhance value for its clients. The Company conducts its business within two operating segments: 1) Oilfield and Industrial Technologies and Services and 2) Environmental Technologies and Services.

Our Oilfield and Industrial Technologies and Services segment manufactures and sells ceramic technology products and services, base ceramic proppant and frac sand for both the oilfield and industrial sectors. The products have different technology features and product characteristics, which vary based on the application for which they are intended to be used. The various ceramic products' manufacturing processes are similar.

Oilfield ceramic technology products, base ceramic proppant and frac sand proppant are manufactured and sold to pressure pumping companies and oil and gas operators for use in the hydraulic fracturing of natural gas and oil wells. Hydraulic fracturing is the most widely used method of increasing production from oil and natural gas wells. The hydraulic fracturing process consists of pumping fluids down a natural gas or oil well at pressures sufficient to create fractures in the hydrocarbon-bearing rock formation. A granular material, called proppant, is suspended and transported in the fluid and fills the fracture, "propping" it open once high-pressure pumping stops. The proppant filled fracture creates a conductive channel through which the hydrocarbons can flow more freely from the formation to the well and then to the surface.

There are three primary types of proppant that can be utilized in the hydraulic fracturing process: sand, resin coated sand and ceramic. Sand is the least expensive proppant, resin-coated sand is more expensive and ceramic proppant is typically the most expensive. We believe the higher initial cost of ceramic proppant is justified by the fact that its use in certain well conditions typically results in an increase in the production rate of oil and natural gas, an increase in the total oil or natural gas that can be recovered from the well and, consequently, an increase in cash flow for the operators of the well. The increased production rates are primarily attributable to the higher strength and more uniform size and shape of ceramic proppant versus alternative materials. We are one of the world's largest suppliers of ceramic proppant.

Through our wholly-owned subsidiary StrataGen, Inc., we promote increased production and EUR of oil and natural gas by selling a widely used fracture stimulation software under the brand FracPro, and providing fracture design and consulting services to oil and natural gas E&P companies under the brand StrataGen.

FracPro provides a suite of stimulation software solutions used for designing fracture treatments and for on-site real-time analysis and data acquisition. Use of FracPro enables our clients to optimize reservoir stimulation to enhance oil and gas production. FracPro has been integrated with third-party reservoir simulation software, furthering its reach and utility.

The StrataGen consulting team works with operators around the world to help optimize well placement, fracture treatment design and production enhancement. The broad range of expertise of the StrataGen consultants includes: fracture treatment design; completion support; on-site treatment supervision; quality control; post-treatment evaluation and optimization; reservoir and fracture studies; rock mechanics and software application and training.

Our industrial ceramic technology products are manufactured and sold to industrial companies. These products are designed for use in various industrial technology applications, including but not limited to casting and milling.

We also produce industrial products at our manufacturing facilities for third parties under tolling arrangements. These products so far have been primarily used in industrial or agricultural applications. Contract manufacturing has led to increased revenue generation. We continue to develop additional opportunities within the industrial, agricultural and oil and gas industries to grow revenue, and reduce our plants' slowing and idling costs.

Our Environmental Technologies and Services segment is intended to protect operators' assets, minimize environmental risks, and lower lease operating expense ("LOE"). AGPI, the only subsidiary of ours to operate in this segment, provides spill prevention, containment and countermeasure systems for oil and gas, industrial, and retail applications. AGPI uses proprietary technology to make products designed to enable its clients to extend the life of their storage assets, reduce the potential for hydrocarbon spills and provide containment of stored materials.

Industry Conditions

During the three months ended March 31, 2019, the average price of West Texas Intermediate (“WTI”) crude oil decreased 13% to \$54.83 per barrel compared to \$62.89 per barrel during the same period in 2018. The average North American rig count decreased 1% during the three months ended March 31, 2019 to 1,231 rigs compared to 1,238 rigs during the same period in 2018. Commodity prices remain at significantly lower levels than prior to the severe industry downturn that began in late 2014, which has not encouraged a broad move away from low-cost completions. E&P operators that are existing or target customers of ours continued to use more frac sand than ceramic or resin-coated proppants as a percentage of overall proppant consumption during the three months ended March 31, 2019. In addition, customers’ shift to less expensive sand from the recent expansion of competitor regional sand supply has negatively impacted our frac sand revenue. We expect this trend to continue as our customers are under increasing pressure to consider lower up-front cost alternatives in the current commodity price environment, notwithstanding the superior performance results of our ceramic products.

Current demand for proppant is extremely dynamic. Most of our oilfield products and services depend primarily on the supply of and demand for oil and natural gas, as well as on the number of natural gas and oil wells drilled, completed or re-completed worldwide. More specifically, the demand for most of our products and services is dependent on the number of oil and natural gas wells that are hydraulically fractured to stimulate production. The demand for our products and services is also dependent on the commodity price of oil and natural gas, and lower commodity prices result in fewer purchases of our premium products. In addition, our results of operations are also significantly affected by a host of other factors, including but not limited to (a) rig counts, (b) well completions activity, which is not necessarily correlated with rig count, (c) customer preferences, (d) new product and technology adoption, (e) imports and competition, (f) changes in the product mix of what we sell, (g) costs of developing our products and services and running our business, and (h) changes in our strategy and execution.

Critical Accounting Policies

The consolidated financial statements are prepared in accordance with U.S. GAAP, which require us to make estimates and assumptions (see Note 1 to the consolidated financial statements included in our annual report on Form 10-K for the year ended December 31, 2018). We believe that some of our accounting policies involve a higher degree of judgment and complexity than others. As of December 31, 2018, our critical accounting policies included revenue recognition, estimating the recoverability of accounts receivable, inventory valuation, accounting for income taxes, accounting for long-lived assets, accounting for derivative instruments, and accounting for abnormally low production levels. These critical accounting policies are discussed more fully in our annual report on Form 10-K for the year ended December 31, 2018.

There have been no changes in our evaluation of our critical accounting policies since December 31, 2018, other than the addition of a new accounting policy for leases.

The Company accounts for its leases in accordance with the requirements of ASC 842, Leases. We determine if an arrangement is a lease at inception. Leases with an initial term of twelve months or less are not recorded on the balance sheet. Operating lease ROU assets and operating lease liabilities are recognized based on the present value of the future minimum lease payments over the lease term at commencement date. As most of our leases do not provide an implicit rate, we use our incremental borrowing rate based on the information available at commencement date in determining the present value of future payments. The operating lease ROU asset also includes any lease payments made and excludes lease incentives and initial direct costs incurred. Our lease terms may include options to extend or terminate the lease when it is reasonably certain that we will exercise that option. We have lease agreements with lease and non-lease components, which are accounted for as a single lease component, primarily related to railroad equipment leases. Operating leases are included in operating lease right-of-use (“ROU”) assets, operating lease

liabilities, and noncurrent operating lease liabilities on our consolidated balance sheets. Sublease and rental income are recognized as revenue on the consolidated statement of operations.

Results of Operations

Three Months Ended March 31, 2019

Revenues. Oilfield and Industrial Technologies and Services segment revenues of \$40.1 million for the three months ended March 31, 2019 decreased 6% compared to \$42.5 million for the same period in 2018. The decrease was mainly attributable to decreases in base ceramic and frac sand and technology products sales. These decreases were partially offset by increases in industrial products sales and sublease and rental income. As a result of the adoption of ASC 842 as of January 1, 2019, sublease and rental income was classified within revenues during the three months ended March 31, 2019. These amounts were classified as a reduction of costs for the period ended March 31, 2018. Despite the overall decrease in base ceramic revenue, our international base ceramic revenue increased to 46% of total base ceramic revenue for the three months ended March 31, 2019 compared to 23% for the same period in 2018.

Environmental Technologies and Services segment revenues of \$7.4 million for the three months ended March 31, 2019 increased 7% compared to \$6.9 million in the same period in 2018. The increase was mainly attributable to an increase in oil and natural gas industry activity.

Gross Loss. Oilfield and Industrial Technologies and Services segment gross loss for the three months ended March 31, 2019 was \$8.8 million, or 22% of revenues, compared to gross loss of \$11.3 million, or 27% of revenues, for the same period in 2018. Gross loss improved primarily due to lower slowing and idling production costs.

Environmental Technologies and Services segment gross profit for the three months ended March 31, 2019 was \$1.0 million compared to gross profit of \$1.2 million for the same period in 2018. This decrease in gross profit was primarily the result of increased labor and associated costs to support anticipated increased sales.

Depreciation and amortization expense was \$7.4 million for the three months ended March 31, 2019 compared to \$8.4 million for the same period in 2018. This decrease was largely due to the sale of our Millen facility during the fourth quarter of 2018.

Selling, General and Administrative (SG&A) and Other Operating Income. Oilfield and Industrial Technologies and Services segment SG&A (exclusive of depreciation and amortization) totaled \$9.4 million for the three months ended March 31, 2019 compared to \$9.0 million for the same period in 2018, primarily due to increased administrative expenses. Consolidated depreciation and amortization was down \$0.2 million to \$0.4 million for the three months ended March 31, 2019 compared to \$0.6 million for the same period in 2018, primarily due to certain assets becoming fully depreciated or fully amortized. Consolidated other operating income for the three months ended March 31, 2019 and 2018 was \$0.1 million and \$0, respectively, and primarily related to gains on asset sales.

Environmental Technologies and Services segment SG&A (exclusive of depreciation and amortization) was up \$0.1 million to \$0.7 million for the three months ended March 31, 2019 compared to \$0.6 million for the same period in 2018.

Income Taxes. Accounting Standards Codification (“ASC”) Topic 740, Income Taxes, provides the carrying value of deferred tax assets should be reduced by the amount not expected to be realized. A company should reduce deferred tax assets by a valuation allowance if, based on the weight of all available evidence, it is not more likely than not that some portion or all of the deferred tax assets will be realized. The valuation allowance should be sufficient to reduce the deferred tax asset to the amount that is more likely than not to be realized. ASC 740 requires all available evidence, both positive and negative, be considered to determine whether a valuation allowance for deferred tax assets is needed in the financial statements. Additionally, there can be statutory limitations and losses also assessed on the deferred tax assets should certain conditions arise. As a result of the significant decline in oil and gas activities and net losses incurred over the past several years, we believe it is more likely than not that a portion of our deferred tax assets will not be realized in the future. Our valuation allowance against a portion of our deferred taxes as of March 31, 2019 was \$76.6 million. Our assessment of the realizability of our deferred tax assets is based on the weight of all available evidence, both positive and negative, including future reversals of deferred tax liabilities. As a result, income tax benefit was \$0 for the three months ended March 31, 2019 and 2018.

Outlook

We continue to execute our transformation strategy to diversify our revenue streams to the more profitable oilfield ceramic technology products, and industrial and environmental markets. Developing and commercializing new products for all three of our market sectors supports this diversification effort. Despite E&P operators starting the year cautiously with respect to discretionary spending, we still expect our 2019 revenues will be similar to 2018 levels as growth in our ceramic technology, industrial, and environmental sectors will likely offset declines in our base

ceramic and sand revenues.

We expect stronger ceramic technology sales during the second quarter of 2019. One KRYPTOSPHERE HD well is scheduled for late in the second quarter, and our current project list for KRYPTOSPHERE LD is expected to result in a significant uptick in sales during the second quarter. Although we expect 2019 deepwater activity to be down year-on-year, our initial outlook for 2020 is robust with high double-digit growth given the current projects that are known.

Demand for our StrataGen consulting business is expected to increase in the second quarter of 2019 as our clients complete more projects than in the first quarter of 2019. In addition, with improving domestic activity software sales should benefit in the second quarter.

As we look out over the balance of 2019, we expect continued contribution from the international oilfield sector for both technology and base ceramic products.

We remain excited about our industrial ceramic opportunities. In order to continue our growth, we are pursuing product trials with potential clients around the world. Our new industrial product METAKAO, a premium metakaolin product, is seeing early success with an initial sale during the first quarter of 2019 for a large infrastructure concrete project in the Caribbean.

We continue work on the commercialization of the PicOnyx M-Tone™ product, a new family of functional pigments for the plastics, paints, ink, coatings and adhesives markets.

Contract manufacturing is expected to continue its growth throughout 2019. While some clients have postponed decisions on project awards, we are making progress in other areas by expanding the products we produce. These contract manufacturing opportunities that increase our plant utilization and generate cash are important in our path to profitability.

In our environmental segment, we were awarded a contract in the Northeast that started in the second quarter of 2019, and we are adding resources to further develop industrial sales. ASSETGUARD products are seeing success in industrial applications, including evaporation mitigation, pond liners, mobile office flooring and retail applications. We expect these additions to drive increased industrial revenue throughout 2019. Other primary areas of focus will include energy generation and petrochemical facilities.

We are currently pursuing oilfield ceramic technology product, and industrial and environmental market opportunities at an accelerated pace which should improve our overall profitability as these revenues grow over time. In addition, given our minimal capital expenditure requirements we expect to maintain a healthy cash balance.

Liquidity and Capital Resources

At March 31, 2019, we had cash and cash equivalents and restricted cash of \$81.8 million compared to cash and cash equivalents and restricted cash of \$83.3 million at December 31, 2018. Uses of cash included \$3.6 million used in operating activities, \$0.6 million for capital expenditures, \$0.3 million for purchases of our common stock, and \$0.5 million in repayments on notes payable. Proceeds from the ATM program were \$3.4 million and proceeds from asset sales were \$0.1 million.

We estimate our total capital expenditures for the remainder of 2019 will be less than \$4.0 million. In April 2019, we repaid the Notes with two of our directors totaling \$27 million. In addition, within 270 days of completion of all post-closing matters relating to the sale of our Millen, Georgia plant, we are required to use 100% of the Net Cash Proceeds (as defined in the credit agreement) from the sale to either (1) prepay the outstanding principal amount of the Term Loans or (2) reinvest in fixed or capital assets of any Credit Party (as defined in the New Credit Agreement). We continue to evaluate these options, and we are in negotiations with our lenders with respect to other options. As of March 31, 2019, the Company has classified \$15.7 million of the outstanding debt as current liabilities, which represents an estimate of the Net Cash Proceeds, including all post-closing matters and retained liabilities that will be repaid over a multi-year period, that we would be required to prepay if we do not reinvest in fixed or capital assets. As a result of the required repayment of the Director Notes and required use of the Millen Net Cash Proceeds, we are committed to using approximately \$43 million of our unrestricted cash and cash equivalents during 2019.

We anticipate that cash on hand will be sufficient to meet planned operating expenses and other cash needs for at least one year from the date of this Form 10-Q. The Company's view regarding sufficiency of cash and liquidity is primarily based on our financial forecast for the next twelve months, which is impacted by various assumptions regarding demand and sales prices for our products. Generally, we expect demand for our products and the sales prices to remain consistent over the next twelve months compared to the last twelve months. We also expect to decrease our operating costs in the next twelve months compared to the last twelve months while improving our cash

position through continued balance sheet management. Our financial forecasts are based on estimates of customer demand, which is highly volatile in the current operating environment, and we have no committed sales backlog with our customers. As a result, there is inherent uncertainty in our forecasts. In the event that we experience lower customer demand, lower prices for our products and services, or higher expenses than we have forecasted or if we underperform relative to our forecast, we could experience negative cash flows from operations, as has been the case in prior years, which would reduce our cash balances and liquidity.

Off-Balance Sheet Arrangements

The Company had no off-balance sheet arrangements as of March 31, 2019.

Forward-Looking Information

The statements in this Quarterly Report on Form 10-Q that are not historical statements, including statements regarding our future financial and operating performance and liquidity and capital resources, are forward-looking statements within the meaning of the U.S. Private Securities Litigation Reform Act of 1995. Forward-looking statements describe future expectations, plans, results or strategies and can often be identified by the use of terminology such as “may”, “will”, “estimate”, “intend”, “continue”, “believe”, “expect”, “anticipate”, “should”, “could”, “potential”, “opportunity”, or other similar terminology. All forward-looking statements are based on management's current expectations and estimates, which involve risks and uncertainties that could cause actual results to differ materially from those expressed in forward-looking statements. Among these factors are:

- changes in the cost of raw materials and natural gas used in manufacturing our products;
- risks related to our ability to access needed cash and capital;
 - our ability to meet our current and future debt service obligations, including our ability to maintain compliance with our debt covenants;
- our ability to manage distribution costs effectively;
- our ability to successfully implement strategic changes in our business;
- changes in demand and prices charged for our products;
- changes in the demand for, or price of, oil and natural gas;
- changes in overall economic conditions;
- technological, manufacturing and product development risks;
- our dependence on and loss of key customers and end users;
 - potential declines or increased volatility in oil and natural gas prices that adversely affect our customers, the energy industry or our production costs;
- potential reductions in spending on exploration and development drilling in the oil and natural gas industry that could reduce demand for our products and services;
- seasonal sales fluctuations;
- an increase in competition in the proppant market, including imports from foreign countries;
- logistical and distribution challenges relating to certain resource plays that do not have the type of infrastructure systems that are needed to efficiently support oilfield services activities;
- the development of alternative stimulation techniques that would not benefit from the use of our existing products and services, such as extraction of oil or gas without fracturing;
- changes in foreign and domestic governmental regulations, including environmental restrictions on operations and regulation of hydraulic fracturing;
- increased regulation of emissions from our manufacturing facilities;
- the development and utilization of alternative proppants for use in hydraulic fracturing;
- general global economic and business conditions;
- weather-related risks;
- changes in foreign and domestic political and legislative risks;
- risks of war and international and domestic terrorism;
- risks associated with foreign operations and foreign currency exchange rates and controls;
- the potential expropriation of assets by foreign governments; and
- other risks and uncertainties.

Additional factors that could affect our future results or events are described from time to time in our reports filed with the Securities and Exchange Commission (the “SEC”). Please see the discussion set forth under the caption “Risk Factors” in our annual report on Form 10-K for the fiscal year ended December 31, 2018, under the caption “Risk Factors” in this report, and similar disclosures in subsequently filed reports with the SEC. We assume no obligation to update forward-looking statements, except as required by law.

ITEM 3. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

Not required.

ITEM 4. CONTROLS AND PROCEDURES

(a) Evaluation of Disclosure Controls and Procedures

Disclosure controls and procedures are designed to ensure that information required to be disclosed in the reports filed or submitted under the Securities Exchange Act of 1934 (the "Exchange Act") is recorded, processed, summarized and reported, within the time periods specified in the SEC's rules and forms. Disclosure controls and procedures include, without limitation, controls and procedures designed to ensure that information required to be disclosed in the reports filed under the Exchange Act is accumulated and communicated to management, including the Chief Executive Officer and Chief Financial Officer, as appropriate to allow timely decisions regarding required disclosure.

As of March 31, 2019, management had carried out an evaluation, under the supervision and with the participation of the Chief Executive Officer and Chief Financial Officer, of the effectiveness of the design and operation of our disclosure controls and procedures. There are inherent limitations to the effectiveness of any system of disclosure controls and procedures. Accordingly, even effective disclosure controls and procedures can only provide reasonable assurances of achieving their control objectives. Based upon and as of the date of that evaluation, the Chief Executive Officer and Chief Financial Officer have concluded that our disclosure controls and procedures were effective to ensure that information required to be disclosed by the reports that we file or submit under the Exchange Act is recorded, processed, summarized and reported, within the time periods specified in the SEC's rules and forms, and to ensure that information we are required to disclose in the reports that we file or submit under the Exchange Act is accumulated and communicated to our management, including our Chief Executive Officer and Chief Financial Officer, as appropriate to allow timely decisions regarding required disclosure.

(b) Changes in Internal Control over Financial Reporting

There were no changes in the Company's internal control over financial reporting during the quarter ended March 31, 2019 that materially affected, or are reasonably likely to materially affect, our internal controls over financial reporting.

PART II. OTHER INFORMATION

ITEM 1. LEGAL PROCEEDINGS

We are subject to legal proceedings, claims and litigation arising in the ordinary course of business. While the outcome of these matters is currently not determinable, we do not expect that the ultimate costs to resolve these matters will have a material adverse effect on our consolidated financial position, results of operations, or cash flows.

ITEM 1A. RISK FACTORS

There have been no material changes to the risk factors discussed in our Annual Report on Form 10-K for the year ended December 31, 2018.

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

The following table provides information about our repurchases of Common Stock during the quarter ended March 31, 2019:

ISSUER PURCHASES OF EQUITY SECURITIES

Period	Total Number of Shares Purchased	Average Price Paid per Share	Total Number of Shares Purchased as Part of Publicly Announced Plan ⁽¹⁾	Maximum Number of Shares that May be Purchased
				Under the Plan ⁽¹⁾
01/01/19 to 01/31/19	—	—	—	2,000,000
02/01/19 to 02/28/19	68,137	\$ 4.10	—	2,000,000
03/01/19 to 03/31/19	—	—	—	2,000,000
	68,137	(2)	—	

(1) On January 28, 2015, we announced the authorization by our Board of Directors for the repurchase of up to two million shares of our Common Stock. The Plan is effective until all shares have been purchased under the Plan, or until such date that our Board of Directors cancels the Plan. No shares have been purchased under the Plan.

(2) Represents shares of stock withheld for the payment of withholding taxes upon the vesting of restricted stock.

ITEM 3. DEFAULTS UPON SENIOR SECURITIES

Not applicable.

ITEM 4. MINE SAFETY DISCLOSURE

Our U.S. manufacturing facilities process mined minerals, and therefore are viewed as mine operations subject to regulation by the federal Mine Safety and Health Administration under the Federal Mine Safety and Health Act of 1977. Information concerning mine safety violations or other regulatory matters required by section 1503(a) of the Dodd-Frank Wall Street Reform and Consumer Protection Act and the recently proposed Item 106 of Regulation S-K (17 CFR 229.106) is included in Exhibit 95 to this quarterly report.

ITEM 5. OTHER INFORMATION

Not applicable.

20

ITEM 6. EXHIBITS

The following exhibits are filed as part of, or incorporated by reference into, this Quarterly Report on Form 10-Q:

31.1 Rule 13a-14(a)/15d-14(a) Certification by Gary A. Kolstad

31.2 Rule 13a-14(a)/15d-14(a) Certification by Ernesto Bautista III

32 Certification pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002

95 Mine Safety Disclosure

101 The following financial information from the Company's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019, formatted in XBRL: (i) Consolidated Balance Sheets; (ii) Consolidated Statements of Operations; (iii) Consolidated Statements of Shareholders' Equity; (iv) Consolidated Statements of Cash Flows; and (v) Notes to the Consolidated Financial Statements.

EXHIBIT INDEX

EXHIBIT DESCRIPTION

- | | |
|------|---|
| 31.1 | <u>Rule 13a-14(a)/15d-14(a) Certification by Gary A. Kolstad.</u> |
| 31.2 | <u>Rule 13a-14(a)/15d-14(a) Certification by Ernesto Bautista III.</u> |
| 32 | <u>Certification pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.</u> |
| 95 | <u>Mine Safety Disclosure.</u> |
| 101 | The following financial information from the Company's Quarterly Report on Form 10-Q for the quarter ended March 31, 2019, formatted in XBRL: (i) Consolidated Balance Sheets; (ii) Consolidated Statements of Operations; (iii) Consolidated Statements of Shareholders' Equity; (iv) Consolidated Statements of Cash Flows; and (v) Notes to the Consolidated Financial Statements. |

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.

CARBO CERAMICS INC.

/s/ Gary A. Kolstad
Gary A. Kolstad
President and Chief Executive Officer

/s/ Ernesto Bautista III
Ernesto Bautista III
Chief Financial Officer

Date: April 25, 2019