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 JUNE 30, 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 Number 001-34223

CLEAN HARBORS, INC.
(Exact name of registrant as specified in its charter)

Massachusetts	**04-2997780**
(State or Other Jurisdiction of Incorporation or Organization)	(IRS Employer Identification No.)
42 Longwater Drive Norwell MA	**02061-9149**
(Address of Principal Executive Offices)	(Zip Code)

Registrant's Telephone Number, Including area code: **(781) 792-5000**

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

Title of each class	Trading Symbol	Name of each exchange on which registered
Common Stock, $0.01 par value	CLH	New York Stock Exchange

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 x No ☐

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted 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 such files). Yes ☒ No ☐

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

Large accelerated filer ☒	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 by Rule 12b-2 of the Exchange Act). Yes ☐ No ☒

The number of shares of Common Stock, $0.01 par value, of the registrant outstanding at July 26, 2019 was 55,862,092

CLEAN HARBORS, INC.

QUARTERLY REPORT ON FORM 10-Q

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CLEAN HARBORS, INC. AND SUBSIDIARIES

CONSOLIDATED BALANCE SHEETS

(in thousands)

	June 30, 2019 (unaudited)	December 31, 2018
ASSETS		
Current assets:		
Cash and cash equivalents	$ 204,455	$ 226,507
Short-term marketable securities	55,198	52,856
Accounts receivable, net of allowances aggregating $36,398 and $44,315, respectively	632,888	606,952
Unbilled accounts receivable	52,174	54,794
Deferred costs	22,500	18,770
Inventories and supplies	203,331	199,479
Prepaid expenses and other current assets	42,640	42,800
Total current assets	1,213,186	1,202,158
Property, plant and equipment, net	1,596,917	1,561,978
Other assets:		
Operating lease right-of-use assets	173,504	—
Goodwill	525,044	514,189
Permits and other intangibles, net	433,853	441,875
Other	12,817	18,121
Total other assets	1,145,218	974,185
Total assets	$ 3,955,321	$ 3,738,321
LIABILITIES AND STOCKHOLDERS' EQUITY		
Current liabilities:		
Current portion of long-term obligations	$ 7,535	$ 7,535
Accounts payable	253,177	276,461
Deferred revenue	75,170	61,843
Accrued expenses	224,497	233,405
Current portion of closure, post-closure and remedial liabilities	30,747	23,034
Current portion of operating lease liabilities	42,564	—
Total current liabilities	633,690	602,278
Other liabilities:		
Closure and post-closure liabilities, less current portion of $13,491 and $9,592, respectively	62,339	60,339
Remedial liabilities, less current portion of $17,256 and $13,442, respectively	101,019	107,575
Long-term obligations, less current portion	1,562,989	1,565,021
Operating lease liabilities, less current portion	130,704	—
Deferred taxes, unrecognized tax benefits and other long-term liabilities	255,113	233,352
Total other liabilities	2,112,164	1,966,287
Commitments and contingent liabilities (See Note 16)		
Stockholders' equity:		
Common stock, $.01 par value:		
Authorized 80,000,000; shares issued and outstanding 55,859,402 and 55,847,261 shares, respectively	559	558
Additional paid-in capital	648,805	655,415
Accumulated other comprehensive loss	(214,271)	(223,371)
Accumulated earnings	774,374	737,154
Total stockholders' equity	1,209,467	1,169,756
Total liabilities and stockholders' equity	$ 3,955,321	$ 3,738,321

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

CLEAN HARBORS, INC. AND SUBSIDIARIES

UNAUDITED CONSOLIDATED STATEMENTS OF OPERATIONS

(in thousands, except per share amounts)

	Three Months Ended June 30,		Six Months Ended June 30,	
	2019	2018	2019	2018
Revenues:				
Service revenues	$ 715,085	$ 696,779	$ 1,371,743	$ 1,316,498
Product revenues	153,593	152,361	277,774	282,420
Total revenues	868,678	849,140	1,649,517	1,598,918
Cost of revenues: (exclusive of items shown separately below)				
Service revenues	480,229	473,423	943,712	921,072
Product revenues	114,704	110,161	215,585	208,937
Total cost of revenues	594,933	583,584	1,159,297	1,130,009
Selling, general and administrative expenses	123,920	125,995	238,732	241,083
Accretion of environmental liabilities	2,560	2,448	5,134	4,878
Depreciation and amortization	74,217	72,760	149,572	147,604
Income from operations	73,048	64,353	96,782	75,344
Other (expense) income, net	(564)	846	2,419	547
Interest expense, net of interest income of $903, $587, $1,829 and $1,350, respectively	(20,215)	(20,769)	(39,979)	(41,039)
Income before provision for income taxes	52,269	44,430	59,222	34,852
Provision for income taxes	16,025	13,683	22,002	16,736
Net income	$ 36,244	$ 30,747	$ 37,220	$ 18,116
Earnings per share:				
Basic	$ 0.65	$ 0.55	$ 0.67	$ 0.32
Diluted	$ 0.65	$ 0.54	$ 0.66	$ 0.32
Shares used to compute earnings per share - Basic	55,875	56,410	55,861	56,304
Shares used to compute earnings per share - Diluted	56,066	56,505	56,001	56,399

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

CLEAN HARBORS, INC. AND SUBSIDIARIES

UNAUDITED CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME (LOSS)

(in thousands)

	Three Months Ended June 30,		Six Months Ended June 30,	
	2019	2018	2019	2018
Net income	$ 36,244	$ 30,747	$ 37,220	$ 18,116
Other comprehensive income (loss):				
Unrealized (losses) gains on available-for-sale securities (net of tax of $27, $8, $58 and $88, respectively)	(236)	(11)	(93)	(206)
Reclassification adjustment for losses on available-for-sale securities included in net income	332	—	332	—
Unrealized loss on interest rate hedge	(9,014)	—	(14,031)	—
Reclassification adjustment for losses on interest rate hedge included in net income	397	—	755	—
Foreign currency translation adjustments	13,597	(4,931)	22,137	(21,482)
Other comprehensive income (loss)	5,076	(4,942)	9,100	(21,688)
Comprehensive income (loss)	$ 41,320	$ 25,805	$ 46,320	$ (3,572)

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

CLEAN HARBORS, INC. AND SUBSIDIARIES

UNAUDITED CONSOLIDATED STATEMENTS OF CASH FLOWS
(in thousands)

	Six Months Ended June 30, 2019	Six Months Ended June 30, 2018
Cash flows from operating activities:		
Net income	$ 37,220	$ 18,116
Adjustments to reconcile net income to net cash from operating activities:		
Depreciation and amortization	149,572	147,604
Allowance for doubtful accounts	(2,233)	7,389
Amortization of deferred financing costs and debt discount	2,000	1,881
Accretion of environmental liabilities	5,134	4,878
Changes in environmental liability estimates	(748)	(673)
Deferred income taxes	(1,636)	(10)
Other income, net	(2,419)	(547)
Stock-based compensation	9,643	6,639
Environmental expenditures	(6,134)	(4,585)
Changes in assets and liabilities, net of acquisitions		
Accounts receivable and unbilled accounts receivable	(13,284)	(62,764)
Inventories and supplies	(4,129)	(18,625)
Other current and non-current assets	(10,706)	180
Accounts payable	(20,915)	23,605
Other current and long-term liabilities	(2,895)	6,582
Net cash from operating activities	138,470	129,670
Cash flows used in investing activities:		
Additions to property, plant and equipment	(118,372)	(94,139)
Proceeds from sale and disposal of fixed assets	7,389	2,641
Acquisitions, net of cash acquired	(29,479)	(123,750)
Additions to intangible assets including costs to obtain or renew permits	(1,923)	(2,106)
Proceeds from sale of available-for-sale securities	26,518	11,214
Purchases of available-for-sale securities	(24,001)	(10,001)
Net cash used in investing activities	(139,868)	(216,141)
Cash flows used in financing activities:		
Change in uncashed checks	(3,514)	(2,803)
Tax payments related to withholdings on vested restricted stock	(4,980)	(2,175)
Repurchases of common stock	(11,272)	(26,482)
Deferred financing costs paid	—	(468)
Payments on finance lease	(259)	—
Principal payments on debt	(3,768)	(2,000)
Net cash used in financing activities	(23,793)	(33,928)
Effect of exchange rate change on cash	3,139	(1,932)
Decrease in cash and cash equivalents	(22,052)	(122,331)
Cash and cash equivalents, beginning of period	226,507	319,399
Cash and cash equivalents, end of period	$ 204,455	$ 197,068
Supplemental information:		
Cash payments for interest and income taxes:		
Interest paid	$ 39,369	$ 40,745
Income taxes paid	12,697	14,118
Cash paid for amounts included in the measurement of lease liabilities:		
Operating cash flows from operating leases	27,773	—
Operating cash flows from finance lease	612	—
Financing cash flows from finance lease	259	—
Non-cash investing activities:		
Property, plant and equipment accrued	14,103	13,041
ROU assets obtained in exchange for new operating lease liabilities	5,575	—
ROU asset obtained in exchange for new finance lease liability	23,027	—

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

CLEAN HARBORS, INC. AND SUBSIDIARIES

UNAUDITED CONSOLIDATED STATEMENTS OF STOCKHOLDERS' EQUITY

(in thousands)

	Common Stock						
	Number of Shares	$ 0.01 Par Value	Additional Paid-in Capital	Accumulated Other Comprehensive Loss	Accumulated Earnings	Total Stockholders' Equity
Balance at January 1, 2019	55,847	$ 558	$ 655,415	$ (223,371)	$ 737,154	$ 1,169,756
Net income	—	—	—	—	976	976
Other comprehensive income	—	—	—	4,024	—	4,024
Stock-based compensation	—	—	5,809	—	—	5,809
Issuance of restricted shares, net of shares remitted and tax withholdings	78	1	(2,277)	—	—	(2,276)
Repurchases of common stock	(97)	(1)	(6,323)	—	—	(6,324)
Balance at March 31, 2019	55,828	558	652,624	(219,347)	738,130	1,171,965
Net income	—	—	—	—	36,244	36,244
Other comprehensive income	—	—	—	5,076	—	5,076
Stock-based compensation	—	—	3,834	—	—	3,834
Issuance of restricted shares, net of shares remitted and tax withholdings	105	1	(2,705)	—	—	(2,704)
Repurchases of common stock	(74)	—	(4,948)	—	—	(4,948)
Balance at June 30, 2019	55,859	$ 559	$ 648,805	$ (214,271)	$ 774,374	$ 1,209,467

	Common Stock					
	Number of Shares	$ 0.01 Par Value	Additional Paid-in Capital	Accumulated Other Comprehensive Loss	Accumulated Earnings	Total Stockholders' Equity
Balance at January 1, 2018	56,501	$ 565	$ 686,962	$ (172,407)	$ 673,082	$ 1,188,202
Cumulative effect of change in accounting principle	—	—	—	—	(1,564)	(1,564)
Net loss	—	—	—	—	(12,631)	(12,631)
Other comprehensive loss	—	—	—	(16,746)	—	(16,746)
Stock-based compensation	—	—	3,077	—	—	3,077
Issuance of restricted shares, net of shares remitted and tax withholdings	24	—	(548)	—	—	(548)
Repurchases of common stock	(280)	(3)	(14,261)	—	—	(14,264)
Balance at March 31, 2018	56,245	562	675,230	(189,153)	658,887	1,145,526
Net income	—	—	—	—	30,747	30,747
Other comprehensive loss	—	—	—	(4,942)	—	(4,942)
Stock-based compensation	—	—	3,562	—	—	3,562
Issuance of restricted shares, net of shares remitted and tax withholdings	94	1	(1,628)	—	—	(1,627)
Repurchases of common stock	(252)	(2)	(12,216)	—	—	(12,218)
Balance at June 30, 2018	56,087	$ 561	$ 664,948	$ (194,095)	$ 689,634	$ 1,161,048

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

CLEAN HARBORS, INC. AND SUBSIDIARIES

NOTES TO UNAUDITED CONSOLIDATED FINANCIAL STATEMENTS

(1) BASIS OF PRESENTATION

The accompanying consolidated interim financial statements are unaudited and include the accounts of Clean Harbors, Inc. and its subsidiaries (collectively, “Clean Harbors,” the “Company” or "we") and have been prepared pursuant to the rules and regulations of the Securities and Exchange Commission (the “SEC”) and, in the opinion of management, include all adjustments which are of a normal recurring nature, necessary for a fair presentation of the financial position, results of operations and cash flows for the periods presented. Management has made estimates and assumptions affecting the amounts reported in the Company's consolidated interim financial statements and accompanying footnotes, actual results could differ from those estimates and judgments. The results for interim periods are not necessarily indicative of results for the entire year or any other interim periods. The financial statements presented herein should be read in connection with the financial statements included in the Company’s Annual Report on Form 10-K for the year ended December 31, 2018.

(2) SIGNIFICANT ACCOUNTING POLICIES

The Company's significant accounting policies are described in Note 2, "Significant Accounting Policies," and Note 3, "Revenues," in the Company's Annual Report on Form 10-K for the year ended December 31, 2018. There have been no material changes in these policies or their application except for the changes described below.

Recent Accounting Pronouncements

Standards implemented

In February 2016, the Financial Accounting Standards Board ("FASB") issued ASU 2016-02, *Leases (Topic 842)*. The amendment increases transparency and comparability among organizations by recognizing lease assets and lease liabilities on the balance sheet and disclosing key information about leasing arrangements. The Company adopted Topic 842 on January 1, 2019 using the modified retrospective method of adoption. Prior period amounts have not been adjusted and continue to be reported in accordance with the Company's historical accounting methodology pursuant to ASC 840, *Leases*. As permitted under the transition guidance, the Company elected to apply the package of three practical expedients for all existing leases which, among other things, allowed us to maintain the lease classification for all existing leases at the adoption date. The adoption of Topic 842 resulted in the recognition of right-of-use (“ROU”) assets of $185.5 million and total current and noncurrent lease liabilities of $188.5 million at adoption. Additionally, Topic 842 required new and expanded disclosures to enable users of financial statements to assess the amount, timing and uncertainty of cash flows arising from leases. The standard did not have a material impact on the consolidated statements of operations or cash flows.

Leases

The Company’s leases predominately relate to real estate and equipment such as vehicles and industrial equipment utilized in operations as well as rail cars utilized in connection with the Company’s transportation needs. Contracts are reviewed at inception to determine if the arrangement is a lease and, if so, whether it is an operating or finance lease. For all of its leases, the Company has elected not to separate lease and nonlease components, such as common area maintenance.

The Company generally enters into real estate leases with five to ten-year terms and non-real estate leases with two to seven-year terms. In the normal course of business, the Company also enters into short-term leases having terms of less than one-year. These leases are generally equipment leases entered into for short periods of time (e.g. daily, weekly or monthly), and done so to satisfy immediate and/or short-term operational needs of the business which can arise based upon the nature of particular services performed or seasonality factors. The Company has elected not to recognize ROU assets and lease liabilities for these short-term leases. Expense for all such short-term leases is disclosed as short-term lease cost as shown in Note 17, "Leases."

Operating and finance leases with terms exceeding one year are recognized as ROU assets and lease liabilities and measured based on the present value of the future lease payments over the lease term at commencement date. When applicable, the ROU asset includes any lease payments made at or before the commencement date and initial direct costs incurred and is reduced by lease incentives received under the lease agreement, if any.

Certain of the Company's real estate leases contain escalating future lease payments. Escalating lease payments that are based upon explicit amounts contained in the lease or an index (e.g., consumer price index) are included in its determination of future lease payments to determine the ROU asset and lease liability recognized at the commencement date. Any differences in the future lease payments from initial recognition are not anticipated to be material and will be recorded as variable lease cost in the period incurred. The variable lease cost will also include the Company’s portion of property tax, utilities and common area maintenance. A significant portion of the Company’s real estate lease agreements include renewal periods at the Company’s option. The Company includes these renewal periods in the lease term only when renewal is reasonably certain based upon facts and circumstances specific to the lease and known by the Company. The Company uses its incremental borrowing rate on collateralized debt based on the information available at the lease commencement date in determining the present value of future lease payments as the implicit rate is typically not readily determinable.

(3) REVENUES

Revenue Recognition

The Company generates services and product revenues through the following operating segments: Environmental Services and Safety-Kleen. The Company recognizes revenue when control of the promised goods or services is transferred to the Company's customers, in an amount that reflects the consideration the Company expects to be entitled to in exchange for those goods or services. Product revenues are recognized when the products are delivered and control transfers to the customer.

Nature of Goods and Services

The majority of the Company’s contracts are for services, which are recognized based on time and materials incurred at contractually agreed-upon rates. The Company’s payment terms vary by the type and location of its customers and the products or services offered. The periods between invoicing and when payments are due are not significant. Any amounts billed to customers related to shipping and handling are classified as revenue and the Company's shipping and handling costs are included in costs of revenues. In the course of the Company's operations, it collects sales tax and other excise taxes from its customers and recognizes a current liability which is then relieved when the taxes are remitted to the appropriate governmental authorities. The Company excludes sales and other excise taxes that it collects from customers from its revenues.

Disaggregation of Revenue

The following table presents the Company’s third-party revenues disaggregated by revenue source (in thousands):

	For the Three Months Ended June 30, 2019			
	Environmental Services	Safety-Kleen	Corporate	Total
Primary Geographical Markets				
United States	$ 431,749	$ 316,688	$ 202	$ 748,639
Canada	94,545	25,494	—	120,039
Total third-party revenues	$ 526,294	$ 342,182	$ 202	$ 868,678
Sources of Revenue (1)				
Technical Services	$ 275,908	$ —	$ —	$ 275,908
Field and Emergency Response Services	86,722	—	—	86,722
Industrial Services	136,011	—	—	136,011
Oil, Gas and Lodging Services and Other	27,653	—	202	27,855
Safety-Kleen Environmental Services	—	216,434	—	216,434
Safety-Kleen Oil (2)	—	125,748	—	125,748
Total third-party revenues	$ 526,294	$ 342,182	$ 202	$ 868,678

	For the Three Months Ended June 30, 2018			
	Environmental Services	Safety-Kleen	Corporate	Total
Primary Geographical Markets				
United States	$ 408,127	$ 306,059	$ 363	$ 714,549
Canada	111,789	22,656	146	134,591
Total third-party revenues	$ 519,916	$ 328,715	$ 509	$ 849,140
Sources of Revenue (1)				
Technical Services	$ 257,006	$ —	$ —	$ 257,006
Field and Emergency Response Services	76,092	—	—	76,092
Industrial Services	161,046	—	—	161,046
Oil, Gas and Lodging Services and Other	25,772	—	509	26,281
Safety-Kleen Environmental Services	—	200,034	—	200,034
Safety-Kleen Oil (2)	—	128,681	—	128,681
Total third-party revenues	$ 519,916	$ 328,715	$ 509	$ 849,140

	For the Six Months Ended June 30, 2019			
	Environmental Services	Safety-Kleen	Corporate	Total
Primary Geographical Markets				
United States	$ 819,918	$ 603,262	$ 796	$ 1,423,976
Canada	180,074	45,467	—	225,541
Total third-party revenues	$ 999,992	$ 648,729	$ 796	$ 1,649,517
Sources of Revenue (1)				
Technical Services	$ 527,827	$ —	$ —	$ 527,827
Field and Emergency Response Services	158,348	—	—	158,348
Industrial Services	252,109	—	—	252,109
Oil, Gas and Lodging Services and Other	61,708	—	796	62,504
Safety-Kleen Environmental Services	—	423,517	—	423,517
Safety-Kleen Oil (2)	—	225,212	—	225,212
Total third-party revenues	$ 999,992	$ 648,729	$ 796	$ 1,649,517

	For the Six Months Ended June 30, 2018			
	Environmental Services	Safety-Kleen	Corporate	Total
Primary Geographical Markets				
United States	$ 752,099	$ 593,701	$ 508	$ 1,346,308
Canada	207,505	44,932	173	252,610
Total third-party revenues	$ 959,604	$ 638,633	$ 681	$ 1,598,918
Sources of Revenue (1)				
Technical Services	$ 493,312	$ —	$ —	$ 493,312
Field and Emergency Response Services	146,027	—	—	146,027
Industrial Services	264,809	—	—	264,809
Oil, Gas and Lodging Services and Other	55,456	—	681	56,137
Safety-Kleen Environmental Services	—	394,195	—	394,195
Safety-Kleen Oil (2)	—	244,438	—	244,438
Total third-party revenues	$ 959,604	$ 638,633	$ 681	$ 1,598,918

(1) All revenue except oil and oil product sales within Safety-Kleen Oil and product sales within Safety-Kleen Environmental Services, which include various automotive related fluids, shop supplies and direct blended oil sales, are recognized over time. Safety-Kleen Oil and Safety-Kleen Environmental Services product sales are recognized at a point in time.

(2) Safety-Kleen Oil was formerly known as Kleen Performance Products.

Technical Services. Technical Services revenues are generated from fees charged for waste material management and disposal services including onsite environmental management services, collection and transportation, packaging, recycling, treatment and disposal of waste. Revenue is primarily generated by short-term projects, most of which are governed by master service agreements that are long-term in nature. These master service agreements are typically entered into with the Company's larger customers and outline the pricing and legal frameworks for such arrangements. Services are provided based on purchase orders or agreements with the customer and include prices based upon units of volume of waste and transportation and other fees. Collection and transportation revenues are recognized over time, as the customer receives and consumes the benefits of the services as they are being performed and the Company has a right to payment for performance completed to date. The Company uses the input method to recognize revenue over time, based on time and materials incurred. Revenues for treatment and disposal of waste are recognized upon completion of treatment, final disposition in a landfill or incineration or when the waste is shipped to a third party for processing and disposal. The Company periodically enters into bundled arrangements for the collection and transportation and disposal of waste. For such arrangements, transportation and disposal are considered distinct performance obligations and the Company allocates revenue to each based on their relative standalone selling price (i.e., the estimated price that a customer would pay for the services on a standalone basis). Revenues from waste that is not yet completely processed and disposed and the related costs are deferred. The revenue is recognized and the deferred costs are expensed when the related services are completed. The period between collection and transportation and the final processing and disposal ranges depending on the location of the customer, but generally is measured in days.

Field and Emergency Response Services. Field Services revenues are generated from cleanup services at customer sites, including municipalities and utilities, or other locations on a scheduled or emergency response basis. Services include confined space entry for tank cleaning, site decontamination, large remediation projects, demolition, spill cleanup on land and water, railcar cleaning, product recovery and transfer and vacuum services. Additional services include filtration and water treatment services. Response services for environmental emergencies include any scale from man-made disasters such as oil spills, to natural disasters such as hurricanes. These services are provided based on purchase orders or agreements with customers and include prices generally based upon daily, hourly or job rates for equipment, materials and personnel. The Company recognizes revenue for these services over time, as the customer receives and consumes the benefits of the service as they are being performed and the Company has a right to payment for performance completed to date. The Company uses the input method to recognize revenue over time, based on time and materials incurred. The duration of such services can be over a number of hours, days or even months for larger scale projects.

Industrial Services. Industrial Services revenues are generated from industrial and specialty services provided to refineries, mines, upgraders, chemical plants, pulp and paper mills, manufacturing facilities, power generation facilities and other industrial customers throughout North America. Services include in-plant cleaning and maintenance services, plant outage and turnaround services, decoking and pigging, chemical cleaning, high and ultra-high pressure water cleaning, pipeline inspection and coating services, large tank and surface impoundment cleaning, oilfield transport, daylighting, production services and directional boring services supporting drilling, completions and production programs. These services are provided based on purchase orders or agreements with the customer and include prices based upon daily, hourly or job rates for equipment, materials and personnel. The Company recognizes revenue for these services over time, as the customer receives and consumes the benefits of the services as they are being performed and the Company has a right to payment for performance completed to date. The Company uses the input method to recognize revenue over time, based on time and materials incurred.

Oil, Gas and Lodging Services and Other. Oil, Gas and Lodging Services and Other is primarily comprised of revenues generated from providing Oil and Gas Field Services that support upstream activities such as exploration and drilling for oil and gas companies and Lodging Services to customers in Western Canada. The Company recognizes Oil and Gas Field Services revenue over time, as the customer receives and consumes the benefits of the services as they are being performed and the Company has a right to payment for performance completed to date. The Company uses the input method to recognize revenue over time, based on time and materials incurred. Revenue for lodging accommodation services is recognized over time based on passage of time.

Safety-Kleen Environmental Services. Safety-Kleen Environmental Services revenues are generated from providing parts washer services, containerized waste handling and disposal services, oil collection services, direct sales of blended oil products and other complementary services and product sales through a network of branch locations. Containerized waste services consist of profiling, collecting, transporting and recycling or disposing of a wide variety of waste. Other products and services include vacuum services, sale of complementary supply products including automotive fluids and shop supplies and other environmental services. Revenues from parts washer services include fees charged to customers for their use of parts washer equipment, to clean and maintain parts washer equipment and to remove and replace used cleaning fluids. Parts washer services are considered a single performance obligation due to the highly integrated and interdependent nature of the arrangement. Revenue from parts washer services is recognized over the service interval as the customer receives the benefit of the services. Collection and transportation revenues are recognized over time, as the customer receives and consumes the benefits of the services as they are being performed and the Company has a right to payment for performance completed to date. The Company uses the input method to recognize revenue over time, based on time and materials incurred. Product revenue is recognized upon the transfer of control whereby control transfers when the products are delivered to the customer.

Safety-Kleen Oil. Safety-Kleen Oil revenues are generated from sales of high-quality base and blended lubricating oils to third-party distributors, government agencies, fleets, railroads and industrial customers. The business also sells recycled fuel oil to asphalt plants, industrial plants, blenders, pulp and paper companies, vacuum gas oil producers and marine diesel oil producers. Revenue for oil products is recognized at a point in time, upon the transfer of control. Control generally transfers when the products are delivered to the customer.

Contract Balances

	June 30, 2019	December 31, 2018
Receivables	$ 632,888	$ 606,952
Contract assets (unbilled receivables)	52,174	54,794
Contract liabilities (deferred revenue)	75,170	61,843

The timing of revenue recognition, billings and cash collections results in billed accounts receivable, unbilled receivables (contract assets), and customer advances and deposits or deferred revenue (contract liabilities) on the consolidated balance sheets. Generally, billing occurs subsequent to revenue recognition, as a right to payment is not just subject to passage of time, resulting in contract assets. Contract assets are generally classified as current. The Company sometimes receives advances or deposits from its customers before revenue is recognized, resulting in contract liabilities. These assets and liabilities are reported on the consolidated balance sheets on a contract-by-contract basis at the end of each reporting period. The contract liability balances at the beginning of each period presented were fully recognized in the subsequent three-month period.

Variable Consideration

The nature of the Company's contracts give rise to certain types of variable consideration, including in limited cases volume discounts. Accordingly, management establishes a revenue allowance to cover the estimated amounts of revenue that may need to be credited to customers' accounts in future periods. The Company estimates the amount of variable consideration to include in the estimated transaction price based on historical experience, anticipated performance and its best judgment at the time and to the extent it is probable that a significant reversal of cumulative revenue recognized will not occur when the uncertainty associated with the variable consideration is resolved.

Contract Costs

Contract costs include direct and incremental costs to obtain or fulfill a contract. The Company’s contract costs that are subject to capitalization are comprised of costs associated with parts washer services and costs associated with the treatment and disposal of waste. Parts washer costs include costs of solvent, commissions paid relating to revenue generated from parts washer services and transportation costs associated with transferring the product picked up from the services as it is returned to the Company’s facilities or a third-party site. Costs related to the treatment of waste include costs for waste receiving, drum movement and storage, waste consolidation and transportation between facilities. Deferred costs associated with parts washer services are amortized ratably over the average service interval, which ranges between seven and 14 weeks. Deferred costs related to treatment and disposal of waste are recognized when the corresponding waste is disposed of and are included in deferred costs within total current assets in the Company’s Consolidated Balance Sheets. The deferred contract cost balances at the beginning of each period presented were fully recognized in cost of revenue in the subsequent three-month period.

(4) BUSINESS COMBINATIONS

2019 Acquisitions

On May 31, 2019, the Company acquired a privately-owned business which expands the environmental services and hazardous materials management services of the Company for $14.9 million. The acquired company is included in the Environmental Services segment. In connection with this acquisition, a preliminary goodwill amount of $7.3 million was recognized.

On March 1, 2019, the Company acquired certain assets of a privately-owned business for $10.4 million. The acquired business complements the Safety-Kleen segment's core service offerings, such as used motor oil collection, parts washers, oil filter recycling and vacuum services. In connection with this acquisition, a preliminary goodwill amount of $5.2 million was recognized.

2018 Acquisitions

On August 31, 2018, the Company acquired a privately-owned business which expands the environmental services and waste oil capabilities of the Company for a $26.7 million purchase price, net of cash. The acquired company is included in the Safety-Kleen and Environmental Services segments. In connection with this acquisition, a preliminary goodwill amount of $12.3 million was recognized. The results of operations of this acquired business were not material in 2019.

On February 23, 2018, the Company completed the acquisition of the U.S. Industrial Cleaning Business of Veolia Environmental Services North America LLC (the "Veolia Business"). The acquisition provides significant scale and industrial services capabilities while increasing the size of the Company's existing U.S. Industrial Services business. The Company acquired the Veolia Business for a purchase price of $124.5 million. The amount of pre-tax income for the three and six months ended June 30, 2018 was $2.1 million and $3.3 million, respectively. The Veolia Business was integrated into the Environmental Services segment.

The Company finalized purchase accounting for the Veolia Business in the first quarter of 2019. The components and allocation of the purchase price for the Veolia Business consist of the following amounts (in thousands):

	Final Allocation
Accounts receivable, including unbilled receivables	$ 39,558
Inventories and supplies	1,126
Prepaid expenses and other current assets	828
Property, plant and equipment	72,243
Permits and other intangibles	5,140
Current liabilities	(18,372)
Closure and post-closure liabilities	(354)
Total identifiable net assets	100,169
Goodwill	24,331
Total purchase price	$ 124,500

The weighted average amortization period for the intangibles acquired is 8.2 years. The excess of the total purchase price, which includes the aggregate cash consideration paid in excess of the fair value of the tangible net assets and intangible assets acquired, was recorded as goodwill. The goodwill recognized is attributable to the expected operating synergies and growth potential that the Company expects to realize from this acquisition. Goodwill generated from the acquisition is deductible for tax purposes.

(5) INVENTORIES AND SUPPLIES

Inventories and supplies consisted of the following (in thousands):

	June 30, 2019	December 31, 2018
Oil and oil products	$ 70,596	$ 70,823
Supplies and drums	108,713	104,609
Solvent and solutions	10,173	10,657
Other	13,849	13,390
Total inventories and supplies	$ 203,331	$ 199,479

Supplies and drums consist primarily of drums and containers used in providing the Company's products and services as well as critical spare parts to support the Company's incinerator and re-refinery operations. Other inventories consisted primarily of parts washer components, cleaning fluids, absorbents and automotive fluids, such as windshield washer fluid and antifreeze.

(6) PROPERTY, PLANT AND EQUIPMENT

Property, plant and equipment consisted of the following (in thousands):

	June 30, 2019	December 31, 2018
Land	$ 134,306	$ 123,734
Asset retirement costs (non-landfill)	15,358	15,148
Landfill assets	164,816	154,918
Buildings and improvements [(1)]	472,383	440,188
Camp equipment	158,992	152,998
Vehicles	777,968	721,735
Equipment	1,732,020	1,697,490
Furniture and fixtures	5,511	5,453
Construction in progress	34,949	20,931
	3,496,303	3,332,595
Less - accumulated depreciation and amortization	1,899,386	1,770,617
Total property, plant and equipment, net	$ 1,596,917	$ 1,561,978

(1) Inclusive of finance lease.

Interest in the amount of $0.1 million and $0.2 million was capitalized to property, plant and equipment during the three and six months ended June 30, 2019, respectively. Interest in the amount of $0.1 million and $0.4 million was capitalized to property, plant and equipment during the three and six months ended June 30, 2018, respectively. Depreciation expense, inclusive of landfill and finance lease amortization, was $65.5 million and $131.4 million for the three and six months ended June 30, 2019, respectively. Depreciation expense, inclusive of landfill amortization, was $64.2 million and $129.8 million for the three and six months ended June 30, 2018, respectively.

(7) GOODWILL AND OTHER INTANGIBLE ASSETS

The changes in goodwill by segment for the six months ended June 30, 2019 were as follows (in thousands):

	Environmental Services	Safety-Kleen	Totals
Balance at January 1, 2019	$ 207,019	$ 307,170	$ 514,189
Increase from current period acquisitions	7,311	5,225	12,536
Measurement period adjustments from prior period acquisitions	(2,611)	(1,421)	(4,032)
Foreign currency translation	1,089	1,262	2,351
Balance at June 30, 2019	$ 212,808	$ 312,236	$ 525,044

The Company assesses goodwill for impairment on an annual basis as of December 31 or at an interim date when events or changes in the business environment would more likely than not reduce the fair value of a reporting unit below its carrying value.

As of June 30, 2019 and December 31, 2018, the Company's total intangible assets consisted of the following (in thousands):

	June 30, 2019			December 31, 2018		
	Cost	Accumulated Amortization	Net	Cost	Accumulated Amortization	Net
Permits	$ 182,063	$ 83,278	$ 98,785	$ 177,583	$ 79,358	$ 98,225
Customer and supplier relationships	401,296	195,036	206,260	393,487	179,824	213,663
Other intangible assets	38,198	32,266	5,932	37,262	29,743	7,519
Total amortizable permits and other intangible assets	621,557	310,580	310,977	608,332	288,925	319,407
Trademarks and trade names	122,876	—	122,876	122,468	—	122,468
Total permits and other intangible assets	$ 744,433	$ 310,580	$ 433,853	$ 730,800	$ 288,925	$ 441,875

Amortization expense of permits and other intangible assets was $8.7 million and $18.2 million in the three and six months ended June 30, 2019, respectively. Amortization expense of permits and other intangible assets was $8.6 million and $17.8 million in the three and six months ended June 30, 2018, respectively.

The expected amortization of the net carrying amount of finite-lived intangible assets at June 30, 2019 was as follows (in thousands):

Years Ending December 31,	Expected Amortization
2019 (six months)	$ 16,748
2020	31,943
2021	28,661
2022	28,231
2023	24,090
Thereafter	181,304
	$ 310,977

(8) ACCRUED EXPENSES

Accrued expenses consisted of the following (in thousands):

	June 30, 2019	December 31, 2018
Insurance	$ 67,427	$ 70,217
Interest	3,952	3,930
Accrued compensation and benefits	54,353	77,881
Income, real estate, sales and other taxes	40,236	25,670
Other	58,529	55,707
	$ 224,497	$ 233,405

(9) CLOSURE AND POST-CLOSURE LIABILITIES

The changes to closure and post-closure liabilities (also referred to as “asset retirement obligations”) from January 1, 2019 through June 30, 2019 were as follows (in thousands):

	Landfill Retirement Liability	Non-Landfill Retirement Liability	Total
Balance at January 1, 2019	$ 37,809	$ 32,122	$ 69,931
Liabilities assumed in acquisitions	—	220	220
New asset retirement obligations	1,058	—	1,058
Accretion	1,455	1,387	2,842
Changes in estimates recorded to statement of operations	—	107	107
Changes in estimates recorded to balance sheet	2,798	—	2,798
Expenditures	(319)	(1,219)	(1,538)
Currency translation and other	222	190	412
Balance at June 30, 2019	$ 43,023	$ 32,807	$ 75,830

All the landfill facilities included in the above were active as of June 30, 2019. In the six months ended June 30, 2019, there were no significant charges (benefits) resulting from changes in estimates for closure and post-closure liabilities.

New asset retirement obligations incurred during the first six months of 2019 were discounted at the credit-adjusted risk-free rate of 6.02%.

(10) REMEDIAL LIABILITIES

The changes to remedial liabilities from January 1, 2019 through June 30, 2019 were as follows (in thousands):

	Remedial Liabilities for Landfill Sites	Remedial Liabilities for Inactive Sites	Remedial Liabilities (Including Superfund) for Non-Landfill Operations	Total
Balance at January 1, 2019	$ 1,838	$ 65,315	$ 53,864	$ 121,017
Accretion	44	1,359	889	2,292
Changes in estimates recorded to statement of operations	23	171	(1,049)	(855)
Expenditures	(29)	(2,445)	(2,122)	(4,596)
Currency translation and other	—	24	393	417
Balance at June 30, 2019	$ 1,876	$ 64,424	$ 51,975	$ 118,275

In the six months ended June 30, 2019, there were no significant charges (benefits) resulting from changes in estimates for remedial liabilities.

(11) FINANCING ARRANGEMENTS

The following table is a summary of the Company’s financing arrangements (in thousands):

Current Obligations:	June 30, 2019	December 31, 2018
Senior secured Term Loan Agreement ("Term Loan Agreement")	$ 7,535	$ 7,535
Long-Term Obligations:		
Senior secured Term Loan Agreement due June 30, 2024	$ 730,929	$ 734,697
Senior unsecured notes, at 5.125%, due June 1, 2021 ("2021 Notes")	845,000	845,000
Long-term obligations, at par	$ 1,575,929	$ 1,579,697
Unamortized debt issuance costs and premium, net	(12,940)	(14,676)
Long-term obligations, at carrying value	$ 1,562,989	$ 1,565,021

Financing Activities

At June 30, 2019 and December 31, 2018, the fair value of the Term Loan Agreement debt was $739.4 million and $707.0 million, respectively, based on quoted market prices or other available market data. At June 30, 2019 and December 31, 2018, the fair value of the Company's 2021 Notes was $847.1 million and $845.0 million, respectively, based on quoted market prices for the instrument. The fair values of the Company's currently outstanding term loans under the Term Loan Agreement (the "Term Loans") and 2021 Notes are considered Level 2 measures according to the fair value hierarchy.

The Company also maintains a $400.0 million revolving credit facility under which the Company had no outstanding loan balance as of June 30, 2019 and December 31, 2018. At June 30, 2019, approximately $217.0 million was available to borrow and outstanding letters of credit were $153.5 million. At December 31, 2018, $235.4 million was available to borrow and outstanding letters of credit were $130.1 million.

Senior Unsecured Notes. On July 2, 2019, the Company completed a private placement of $545.0 million aggregate principal amount of 4.875% senior unsecured notes due 2027 (the “2027 Notes”) and $300.0 million aggregate principal amount of 5.125% senior unsecured notes due 2029 (the “2029 Notes,” and together with the 2027 Notes, the “New Notes”).

The 2027 Notes will mature on July 15, 2027, and the 2029 Notes will mature on July 15, 2029. Interest payments on each series of the New Notes will be paid semiannually on January 15 and July 15, commencing on January 15, 2020.

The Company may redeem all or any portion of the 2027 Notes prior to July 15, 2022 or the 2029 Notes prior to July 15, 2024 at a redemption price equal to 100% of the principal amount redeemed plus a make whole premium as of the date of redemption including accrued and unpaid interest, if any, to the date of redemption. Additionally, prior to July 15, 2022 for the 2027 Notes and July 15, 2024 for the 2029 Notes, the Company may use cash proceeds of one or more equity offerings to redeem up to 35% in aggregate principal of the 2027 Notes or the 2029 Notes at a redemption price equal to 104.875% or 105.125%, respectively, plus accrued and unpaid interest thereon, if any, up to the date of redemption.

After the dates in the preceding paragraph, the Company may redeem all or any portion of the New Notes which remain outstanding at any time upon proper notice at the following redemption prices if redeemed during the twelve-month period commencing on July 15 of the years set forth below plus accrued and unpaid interest, if any, to the date of redemption:

2027 Notes

Year	Percentage
2022	102.438%
2023	101.210%
2024 and thereafter	100.000%

2029 Notes

Year	Percentage
2024	102.563%
2025	101.281%
2026 and thereafter	100.000%

The New Notes and the related indenture contains various customary non-financial covenants and are guaranteed by substantially all of the Company’s current and future domestic subsidiaries.

Concurrently with the closing of the New Notes on July 2, 2019, the Company purchased, using a portion of the net proceeds from the sale of the New Notes, an aggregate principal amount of $701.0 million of the 2021 Notes. The total amount paid in purchasing the 2021 Notes was $706.2 million including $3.1 million of accrued interest. On July 17, 2019, the Company redeemed the remaining $144.0 million outstanding 2021 Notes, including $0.9 million of accrued interest, using the remaining net proceeds from the sale of the New Notes and available cash. In connection with this early redemption of the 2021 Notes, the Company expects to record a loss on early extinguishment of debt of approximately $6.0 million in the third quarter of 2019. With the repurchase of the 2021 Notes, none of the Company’s outstanding debt is registered under the Securities Act of 1933, as amended.

Cash Flow Hedges

The Company’s strategy to hedge against fluctuations in variable interest rates involves entering into interest rate derivative agreements. Although the interest rate on all $738.5 million aggregate principal amount of Term Loans which were outstanding on June 30, 2019 is variable under the Term Loan Agreement, the Company has effectively fixed the interest rate on $350.0 million aggregate principal amount of the Term Loans outstanding by entering into interest rate swap agreements with a notional amount of $350.0 million. Under the terms of the interest rate swap agreements, the Company receives interest based on the one-month LIBOR index and pays interest at a weighted average annual interest rate of approximately 2.92%. When combined with the 1.75% interest rate margin for Eurocurrency borrowings, the effective annual interest rate on such $350.0 million aggregate principal amount of Term Loans is therefore approximately 4.67%.

The Company recognizes derivative instruments as either assets or liabilities on the balance sheet at fair value. No ineffectiveness has been identified on these swaps and, therefore, all unrealized changes in fair value are recorded in accumulated other comprehensive loss. Amounts are reclassified from accumulated other comprehensive loss into interest expense on the statement of operations in the same period or periods during which the hedged transaction affects earnings.

As of June 30, 2019 and December 31, 2018, the Company has recorded a derivative liability with a fair value of $22.0 million and $8.8 million, respectively, within accrued expenses in connection with these cash flow hedges.

The fair value of the interest rate swaps included in the Level 2 tier of the fair value hierarchy is calculated using discounted cash flow valuation methodologies based upon the one-month LIBOR yield curves that are observable at commonly quoted intervals for the full term of the interest rate swaps. Level 2 utilizes quoted market prices in markets that are not active, broker or dealer quotation, or alternative pricing sources with reasonable levels of price transparency for similar assets and liabilities.

(12) INCOME TAXES

The Company records a tax provision or benefit on an interim basis using an estimated annual effective tax rate. This rate is applied to the current period ordinary income or loss to determine the income tax provision or benefit allocated to the interim period. Losses from jurisdictions for which no benefit can be recognized and the income tax effects of unusual or infrequent items are excluded from the estimated annual effective tax rate and are recognized in the impacted interim period. The estimated annual effective tax rate may be significantly impacted by projected earnings mix by tax jurisdiction. Adjustments to the estimated annual effective income tax rate are recognized in the period when such estimates are revised.

The Company’s effective tax rate for the three and six months ended June 30, 2019 was 30.7% and 37.2%, respectively, compared to 30.8% and 48.0% for the comparable periods in 2018.

As of June 30, 2019 and December 31, 2018, the Company had recorded $4.8 million and $3.2 million, respectively, of liabilities for unrecognized tax benefits and $1.2 million and $0.8 million of interest, respectively.

The Company's tax years 2014-2016 are currently under audit by the Internal Revenue Service (“IRS”). While the examination has recently commenced and ultimate outcomes are unknown, the Company does not believe the examination will result in material adjustments to previously filed returns.

Due to expiring statute of limitation periods, the Company believes that total unrecognized tax benefits will decrease by $0.6 million within the next 12 months.

(13) EARNINGS PER SHARE

The following are computations of basic and diluted earnings per share (in thousands except for per share amounts):

	Three Months Ended June 30,		Six Months Ended June 30,	
	2019	2018	2019	2018
Numerator for basic and diluted earnings per share:				
Net income	$ 36,244	$ 30,747	$ 37,220	$ 18,116
Denominator:				
Basic shares outstanding	55,875	56,410	55,861	56,304
Dilutive effect of stock-based compensation awards	191	95	140	95
Dilutive shares outstanding	56,066	56,505	56,001	56,399
Basic income per share:	$ 0.65	$ 0.55	$ 0.67	$ 0.32
Diluted income per share:	$ 0.65	$ 0.54	$ 0.66	$ 0.32

For the three months ended June 30, 2019 and June 30, 2018, the dilutive effect of all then outstanding restricted stock and performance awards is included in the earnings per share calculation above except for 75,759 and 146,159 of performance stock awards for which the performance criteria were not attained at that time and 4,623 and 136,155, respectively, of restricted stock awards which were antidilutive.

For the six months ended June 30, 2019 and June 30, 2018, the dilutive effect of all then outstanding restricted stock and performance awards is included in the earnings per share calculation above except for 75,759 and 146,159 of performance stock awards for which the performance criteria were not attained at that time and 78,892 and 130,932, respectively, of restricted stock awards which were antidilutive.

(14) ACCUMULATED OTHER COMPREHENSIVE LOSS

The changes in accumulated other comprehensive loss by component and related tax effects for the six months ended June 30, 2019 were as follows (in thousands):

	Foreign Currency Translation	Unrealized (Losses) Gains on Available-For-Sale Securities	Unrealized Losses on Interest Rate Hedge	Unfunded Pension Liability	Total
Balance at January 1, 2019	$ (212,925)	$ (69)	$ (8,773)	$ (1,604)	$ (223,371)
Other comprehensive income (loss) before tax effects	22,137	(35)	(14,031)	—	8,071
Tax impact related to items in other comprehensive income (loss)	—	(58)	—	—	(58)
Amounts reclassified out of accumulated other comprehensive loss	—	332	755	—	1,087
Other comprehensive income (loss)	22,137	239	(13,276)	—	9,100
Balance at June 30, 2019	$ (190,788)	$ 170	$ (22,049)	$ (1,604)	$ (214,271)

The amounts reclassified out of accumulated other comprehensive loss into the consolidated statement of operations, with presentation location, during the three and six months ended June 30, 2019 were as follows (in thousands):

Other Comprehensive Income (Loss) Components	For the Three Months Ended June 30, 2019	For the Six Months Ended June 30, 2019	Location
Unrealized loss on interest rate hedge	$ (397)	$ (755)	Interest expense, net of interest income
Unrealized loss on available-for-sale securities	(332)	(332)	Other (expense) income, net

There were no reclassifications out of accumulated other comprehensive loss during the three and six months ended June 30, 2018.

(15) STOCK-BASED COMPENSATION

Total stock-based compensation cost charged to selling, general and administrative expenses for the three and six months ended June 30, 2019 was $3.8 million and $9.6 million, respectively. Total stock-based compensation cost charged to selling, general and administrative expenses for the three and six months ended June 30, 2018 was $3.5 million and $6.6 million, respectively. The total income tax benefit recognized in the consolidated statements of operations from stock-based compensation was $0.7 million and $1.8 million for the three and six months ended June 30, 2019, respectively. The total income tax benefit recognized in the consolidated statements of operations from stock-based compensation was $0.7 million and $1.3 million for the three and six months ended June 30, 2018, respectively.

Restricted Stock Awards

The following information relates to restricted stock awards that have been granted to employees and directors under the Company's equity incentive plan adopted in 2010 (the "2010 Plan"). The restricted stock awards are not transferable until vested and the restrictions generally lapse upon the achievement of continued employment over a three-to-five-year period or service as a director until the following annual meeting of shareholders. The fair value of each restricted stock grant is based on the closing price of the Company's common stock on the date of grant and is amortized to expense over its vesting period.

The following table summarizes information about restricted stock awards for the six months ended June 30, 2019:

Restricted Stock	**Number of Shares**	**Weighted Average Grant-Date Fair Value**
Balance at January 1, 2019	657,240	$ 54.65
Granted	79,060	65.12
Vested	(207,032)	53.75
Forfeited	(48,166)	54.92
Balance at June 30, 2019	481,102	56.73

As of June 30, 2019, there was $21.3 million of total unrecognized compensation cost arising from restricted stock awards under the Company's 2010 Plan. This cost is expected to be recognized over a weighted average period of 2.4 years. The total fair value of restricted stock vested during the three and six months ended June 30, 2019 was $7.9 million and $11.1 million, respectively. The total fair value of restricted stock vested during the three and six months ended June 30, 2018 was $7.0 million and $8.3 million, respectively.

Performance Stock Awards

The following information relates to performance stock awards that have been granted to employees under the Company's 2010 Plan. Performance stock awards are subject to performance criteria established by the compensation committee of the Company's board of directors prior to or at the date of grant. The vesting of the performance stock awards is based on achieving such targets typically based on revenue, Adjusted EBITDA margin, Adjusted Free Cash Flow and Total Recordable Incident Rate. In addition, performance stock awards include continued service conditions. The fair value of each performance stock award is based on the closing price of the Company's common stock on the date of grant and is amortized to expense over the service period if achievement of performance measures is considered probable.

The following table summarizes information about performance stock awards for the six months ended June 30, 2019:

Performance Stock	**Number of Shares**	**Weighted Average Grant-Date Fair Value**
Balance at January 1, 2019	213,490	$ 55.71
Granted	—	—
Vested	(51,996)	55.77
Forfeited	(23,554)	55.64
Balance at June 30, 2019	137,940	55.69

As of June 30, 2019, there was $3.4 million of total unrecognized compensation cost arising from unvested performance stock awards deemed probable of vesting under the Company's 2010 Plan. No performance awards vested during the three months ended June 30, 2019 and June 30, 2018. The total fair value of performance awards vested during the six months ended June 30, 2019 and June 30, 2018 was $2.9 million and $0.5 million, respectively.

Common Stock Repurchases

The Company's board of directors has authorized the repurchase of up to $600.0 million of the Company's common stock. During the three and six months ended June 30, 2019, the Company repurchased and retired a total of approximately 0.1 million and 0.2 million shares, respectively, of the Company's common stock for total costs of approximately $4.9 million and $11.3 million, respectively. During the three and six months ended June 30, 2018, the Company repurchased and retired a total of approximately 0.2 million and 0.5 million shares, respectively, of the Company's common stock for total costs of approximately $12.2 million and $26.5 million, respectively. Through June 30, 2019, the Company has repurchased and retired a total of approximately 5.7 million shares of its common stock for approximately $305.2 million under this program. As of June 30, 2019, an additional $294.8 million remained available for repurchase of shares under this program.

(16) COMMITMENTS AND CONTINGENCIES

Legal and Administrative Proceedings

The Company and its subsidiaries are subject to legal proceedings and claims arising in the ordinary course of business. Actions filed against the Company arise from commercial and employment-related claims including alleged class actions related to sales practices and wage and hour claims. The plaintiffs in these actions may be seeking damages or injunctive relief or both. These actions are in various jurisdictions and stages of proceedings, and some are covered in part by insurance. In addition, the Company’s waste management services operations are regulated by federal, state, provincial and local laws enacted to regulate discharge of materials into the environment, remediation of contaminated soil and groundwater or otherwise protect the environment. This ongoing regulation results in the Company frequently becoming a party to legal or administrative proceedings involving all levels of governmental authorities and other interested parties. The issues involved in such proceedings generally relate to alleged violations of existing permits and licenses or alleged responsibility under federal or state Superfund laws to remediate contamination at properties owned either by the Company or by other parties (“third-party sites”) to which either the Company or the prior owners of certain of the Company’s facilities shipped wastes.

At June 30, 2019 and December 31, 2018, the Company had recorded reserves of $24.1 million and $25.4 million, respectively, in the Company's financial statements for actual or probable liabilities related to the legal and administrative proceedings in which the Company was then involved, the principal of which are described below. At June 30, 2019 and December 31, 2018, the Company also believed that it was reasonably possible that the amount of these potential liabilities could be as much as $1.8 million more. The Company periodically adjusts the aggregate amount of these reserves when actual or probable liabilities are paid or otherwise discharged, new claims arise or additional relevant information about existing or probable claims becomes available. As of June 30, 2019 and December 31, 2018, the $24.1 million and $25.4 million, respectively, of reserves consisted of (i) $18.0 million and $17.9 million, respectively, related to pending legal or administrative proceedings, including Superfund liabilities, which were included in remedial liabilities on the consolidated balance sheets, and (ii) $6.1 million and $7.5 million, respectively, primarily related to federal, state and provincial enforcement actions, which were included in accrued expenses on the consolidated balance sheets.

As of June 30, 2019, the principal legal and administrative proceedings in which the Company was involved, or which had been terminated during 2019, were as follows:

Ville Mercier. In September 2002, the Company acquired the stock of a subsidiary (the "Mercier Subsidiary") which owns a hazardous waste incinerator in Ville Mercier, Quebec (the "Mercier Facility"). The property adjacent to the Mercier Facility, which is also owned by the Mercier Subsidiary, is now contaminated as a result of actions dating back to 1968, when the Government of Quebec issued two permits to dump organic liquids into lagoons on the property to a company unrelated to the Mercier Subsidiary. In 1999, Ville Mercier and three neighboring municipalities filed separate legal proceedings against the Mercier Subsidiary and the Government of Quebec. In 2012, the municipalities amended their existing statement of claim to seek $2.9 million (CAD) in general damages and $10.0 million (CAD) in punitive damages, plus interest and costs, as well as injunctive relief. Both the Government of Quebec and the Company have filed summary judgment motions against the municipalities. The parties are attempting to negotiate a resolution and hearings on the motions have been delayed. In September 2007, the Quebec Minister of Sustainable Development, Environment and Parks issued a notice pursuant to Section 115.1 of the Environment Quality Act, superseding notices issued in 1992, which are the subject of the pending litigation. The more recent notice notifies the Mercier Subsidiary that, if the Mercier Subsidiary does not take certain remedial measures at the site, the Minister intends to undertake those measures at the site and claim direct and indirect costs related to such measures. The Company has accrued for costs expected to be incurred relative to the resolution of this matter and believes this matter will not have future material effect on its financial position, results of operations or cash flows.

Safety-Kleen Legal Proceedings. On December 28, 2012, the Company acquired Safety-Kleen, Inc. ("Safety-Kleen") and thereby became subject to the legal proceedings in which Safety-Kleen was a party on that date. In addition to certain Superfund proceedings in which Safety-Kleen has been named as a potentially responsible party as described below under "Superfund Proceedings," the principal such legal proceedings involving Safety-Kleen which were outstanding as of June 30, 2019 were as follows:

Product Liability Cases. Safety-Kleen has been named as a defendant in various lawsuits that are currently pending in various courts and jurisdictions throughout the United States, including approximately 57 proceedings (excluding cases which have been settled but not formally dismissed) as of June 30, 2019, wherein persons claim personal injury resulting from the use of Safety-Kleen's parts cleaning equipment or cleaning products. These proceedings typically involve allegations that the solvent used in Safety-Kleen's parts cleaning equipment contains contaminants and/or that Safety-Kleen's recycling process does not effectively remove the contaminants that become entrained in the solvent during their use. In addition, certain claimants assert that Safety-Kleen failed to adequately warn the product user of potential risks, including a historic failure to warn that solvent contains trace amounts of toxic or hazardous substances such as benzene.

Safety-Kleen maintains insurance that it believes will provide coverage for these product liability claims (over amounts accrued for self-insured retentions and deductibles in certain limited cases), except for punitive damages to the extent not insurable under state law or excluded from insurance coverage. Safety-Kleen also believes that these claims lack merit and has historically vigorously defended, and intends to continue to vigorously defend, itself and the safety of its products against all these claims. Such matters are subject to many uncertainties and outcomes are not predictable with assurance. Consequently, Safety-Kleen is unable to ascertain the ultimate aggregate amount of monetary liability or financial impact with respect to these matters as of June 30, 2019. From January 1, 2019 to June 30, 2019, 19 product liability claims were settled or dismissed. Due to the nature of these claims and the related insurance, the Company did not incur any expense as Safety-Kleen's insurance provided coverage in full for all such claims. Safety-Kleen may be named in similar, additional lawsuits in the future, including claims for which insurance coverage may not be available.

Superfund Proceedings

The Company has been notified that either the Company (which, since December 28, 2012, includes Safety-Kleen) or the prior owners of certain of the Company's facilities for which the Company may have certain indemnification obligations have been identified as potentially responsible parties ("PRPs") or potential PRPs in connection with 129 sites which are subject to or are proposed to become subject to proceedings under federal or state Superfund laws. Of the 129 sites, five (including the BR Facility described below) involve facilities that are now owned or leased by the Company and 124 involve third-party sites to which either the Company or the prior owners of certain of the Company's facilities shipped wastes. Of the 124 third-party sites, 31 are now settled, 16 are currently requiring expenditures on remediation and 77 are not currently requiring expenditures on remediation.

In connection with each site, the Company has estimated the extent, if any, to which it may be subject, either directly or as a result of any indemnification obligations, for cleanup and remediation costs, related legal and consulting costs associated with PRP investigations, settlements and related legal and administrative proceedings. The amount of such actual and potential liability is inherently difficult to estimate because of, among other relevant factors, uncertainties as to the legal liability, if any, of the Company or the prior owners of certain of the Company's facilities to contribute a portion of the cleanup costs, the assumptions that must be made in calculating the estimated cost and timing of remediation, the identification of other PRPs and their respective capability and obligation to contribute to remediation efforts and the existence and legal standing of indemnification agreements, if any, with prior owners, which may either benefit the Company or subject the Company to potential indemnification obligations. The Company believes its potential liability could exceed $100,000 at ten of the 124 third-party sites.

BR Facility. The Company acquired in 2002 a former hazardous waste incinerator and landfill in Baton Rouge (the "BR Facility"), for which operations had been previously discontinued by the prior owner. In September 2007, the U.S. Environmental Protection Agency ("EPA")" issued a special notice letter to the Company related to the Devil's Swamp Lake Site ("Devil's Swamp") in East Baton Rouge Parish, Louisiana. Devil's Swamp includes a lake located downstream of an outfall ditch where wastewater and storm water have been discharged, and Devil's Swamp is proposed to be included on the National Priorities List due to the presence of Contaminants of Concern ("COC") cited by the EPA. These COCs include substances of the kind found in wastewater and storm water discharged from the BR Facility in past operations. The EPA originally requested COC generators to submit a good faith offer to conduct a remedial investigation feasibility study directed towards the eventual remediation of the site. In 2018 the Company completed performing corrective actions at the BR Facility under an order issued by the Louisiana Department of Environmental Quality and has also completed conducting the remedial investigation and feasibility study for Devil's Swamp under an order issued by the EPA. The Company cannot presently estimate the potential additional liability for the Devil's Swamp cleanup until a final remedy is selected by the EPA with issuance of a Record of Decision.

Third-Party Sites. Of the 124 third-party sites at which the Company has been notified it is a PRP or potential PRP or may have indemnification obligations, Clean Harbors has an indemnification agreement at 11 of these sites with ChemWaste, a former subsidiary of Waste Management, Inc., and at six additional of these third-party sites, Safety-Kleen has a similar indemnification agreement with McKesson Corporation. These agreements indemnify the Company (which now includes Safety-Kleen) with respect to any liability at the 17 sites for waste disposed prior to the Company's (or Safety-Kleen's) acquisition of the former subsidiaries of Waste Management and McKesson which had shipped wastes to those sites. Accordingly, Waste Management or McKesson are paying all costs of defending those subsidiaries in those 17 cases, including legal fees and settlement costs. However, there can be no guarantee that the Company's ultimate liabilities for those sites will not exceed the amount recorded or that indemnities applicable to any of these sites will be available to pay all or a portion of related costs. Except for the indemnification agreements which the Company holds from ChemWaste, McKesson and two other entities, the Company does not have an indemnity agreement with respect to any of the 124 third-party sites discussed above.

Federal, State and Provincial Enforcement Actions

From time to time, the Company pays fines or penalties in regulatory proceedings relating primarily to waste treatment, storage or disposal facilities. As of June 30, 2019 and December 31, 2018, there were 11 and ten proceedings, respectively, for which the Company reasonably believes that the sanctions could equal or exceed $100,000. The Company believes that the fines or other penalties in these or any of the other regulatory proceedings will, individually or in the aggregate, not have a material effect on its financial condition, results of operations or cash flows.

(17) LEASES

As of June 30, 2019, the Company’s leases were all operating leases except for a single finance lease related to the Company’s corporate headquarters, which was amended during the first quarter of 2019, resulting in the classification as a finance lease.

The Company’s lease expense was as follows (in thousands):

	For the Three Months Ended June 30, 2019	For the Six Months Ended June 30, 2019
Operating lease cost	$ 13,988	$ 27,350
Finance lease cost:		
Amortization of ROU asset	245	490
Interest on lease liability	291	612
Total finance lease cost	536	1,102
Short-term lease cost	18,323	38,037
Variable lease cost	2,991	4,233
Total lease cost	$ 35,838	$ 70,722

Other information related to leases was as follows (in thousands, except lease term and discount rate):

Supplemental Lease Balance Sheet Information:	June 30, 2019
ROU assets:	
Operating leases	$ 173,504
Finance lease (included in property, plant and equipment, net)	22,537
Current portion of lease liabilities:	
Operating leases	42,564
Finance lease (included in accrued expenses)	399
Long-term portion of lease liabilities:	
Operating leases	130,704
Finance lease (included in deferred taxes, unrecognized tax benefits and other long-term liabilities)	23,701

Weighted Average Remaining Lease Term (years)	**June 30, 2019**
Operating leases	5.2
Finance lease	23.0
Weighted Average Discount Rate	
Operating leases	5.34%
Finance lease	5.25%

At June 30, 2019, the Company's future lease payments under non-cancelable leases that have lease terms in excess of one year were as follows (in thousands):

Years Ending December 31,	Operating Leases	Finance Lease
2019 (six months)	$ 27,763	$ 871
2020	47,602	1,777
2021	35,959	1,813
2022	28,374	1,849
2023	20,388	1,886
2024	13,930	1,923
Thereafter	27,429	40,636
Total future lease payments	201,445	50,755
Amount representing interest	(28,177)	(26,655)
Total lease liabilities	$ 173,268	$ 24,100

At June 30, 2019, none of the Company's executed leases that had not yet commenced will create significant rights or obligations in the future and its sublease transactions are not material. Additionally, the Company does not have any related party leases and there were no restrictions or covenants imposed by its leases.

Disclosures related to periods prior to adoption of Topic 842

The following is a summary of future minimum payments under operating leases that have initial or remaining non-cancelable lease terms in excess of one year at December 31, 2018 (in thousands):

Year	Total Operating Leases
2019	$ 56,480
2020	45,467
2021	33,564
2022	24,509
2023	15,253
Thereafter	35,778
Total minimum lease payments	$ 211,051

During the years ended December 31, 2018, 2017 and 2016, rent expense including short-term rentals was approximately $141.1 million, $125.4 million and $121.9 million, respectively.

(18) SEGMENT REPORTING

Segment reporting is prepared on the same basis that the Company's chief executive officer, who is the Company's chief operating decision maker, manages the business, makes operating decisions and assesses performance. The Company's operations are managed in two operating segments: Environmental Services and Safety-Kleen.

Third-party revenue is revenue billed to outside customers by a particular segment. Direct revenue is revenue allocated to the segment providing the product or service. Intersegment revenues represent the sharing of third-party revenues among the segments based on products and services provided by each segment as if the products and services were sold directly to the third-party. The intersegment revenues are shown net. The operations not managed through the Company's operating segments described above are recorded as "Corporate Items."

The following table reconciles third-party revenues to direct revenues for the three and six months ended June 30, 2019 and June 30, 2018 (in thousands):

	For the Three Months Ended June 30, 2019				For the Three Months Ended June 30, 2018			
	Third-party revenues	Intersegment revenues, net	Corporate Items, net	Direct revenues	Third-party revenues	Intersegment revenues, net	Corporate Items, net	Direct revenues
Environmental Services	$ 526,294	$ 36,206	$ 576	$ 563,076	$ 519,916	$ 34,291	$ 607	$ 554,814
Safety-Kleen	342,182	(36,206)	8	305,984	328,715	(34,291)	11	294,435
Corporate Items	202	—	(584)	(382)	509	—	(618)	(109)
Total	$ 868,678	$ —	$ —	$ 868,678	$ 849,140	$ —	$ —	$ 849,140

	For the Six Months Ended June 30, 2019				For the Six Months Ended June 30, 2018			
	Third-party revenues	Intersegment revenues, net	Corporate Items, net	Direct revenues	Third-party revenues	Intersegment revenues, net	Corporate Items, net	Direct revenues
Environmental Services	$ 999,992	$ 70,281	$ 1,825	$ 1,072,098	$ 959,604	$ 66,256	$ 1,401	$ 1,027,261
Safety-Kleen	648,729	(70,281)	13	578,461	638,633	(66,256)	22	572,399
Corporate Items	796	—	(1,838)	(1,042)	681	—	(1,423)	(742)
Total	$ 1,649,517	$ —	$ —	$ 1,649,517	$ 1,598,918	$ —	$ —	$ 1,598,918

The primary financial measure by which the Company evaluates the performance of its segments is "Adjusted EBITDA," which consists of net income plus accretion of environmental liabilities, depreciation and amortization, interest expense, net of interest income, provision for income taxes and other gains or non-cash charges not deemed representative of fundamental segment results and excludes other expense (income), net. Transactions between the segments are accounted for at the Company's best estimate based on similar transactions with outside customers.

The following table presents Adjusted EBITDA information used by management by reported segment (in thousands):

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2019	2018	2019	2018
Adjusted EBITDA:				
Environmental Services	$ 117,868	$ 109,199	$ 207,378	$ 170,616
Safety-Kleen	79,459	73,069	134,252	134,953
Corporate Items	(47,502)	(42,707)	(90,142)	(77,743)
Total	149,825	139,561	251,488	227,826
Reconciliation to Consolidated Statements of Operations:				
Accretion of environmental liabilities	2,560	2,448	5,134	4,878
Depreciation and amortization	74,217	72,760	149,572	147,604
Income from operations	73,048	64,353	96,782	75,344
Other expense (income), net	564	(846)	(2,419)	(547)
Interest expense, net of interest income	20,215	20,769	39,979	41,039
Income before provision for income taxes	$ 52,269	$ 44,430	$ 59,222	$ 34,852

The following table presents certain assets by reportable segment and in the aggregate (in thousands):

	June 30, 2019	December 31, 2018
Property, plant and equipment, net		
Environmental Services	$ 956,381	$ 951,867
Safety-Kleen	559,510	553,220
Corporate Items	81,026	56,891
Total property, plant and equipment, net	$ 1,596,917	$ 1,561,978
Goodwill and Permits and other intangibles, net		
Environmental Services		
Goodwill	$ 212,808	$ 207,019
Permits and other intangibles, net	93,303	93,313
Total Environmental Services	306,111	300,332
Safety-Kleen		
Goodwill	$ 312,236	$ 307,170
Permits and other intangibles, net	340,550	348,562
Total Safety-Kleen	652,786	655,732
Total	$ 958,897	$ 956,064

The following table presents the total assets by reportable segment (in thousands):

	June 30, 2019	December 31, 2018
Environmental Services	$ 1,756,818	$ 1,640,706
Safety-Kleen	1,513,920	1,431,381
Corporate Items	684,583	666,234
Total	$ 3,955,321	$ 3,738,321

The following table presents the total assets by geographical area (in thousands):

	June 30, 2019	December 31, 2018
United States	$ 3,270,464	$ 3,090,311
Canada	684,857	648,010
Total	$ 3,955,321	$ 3,738,321

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

Forward-Looking Statements

In addition to historical information, this Quarterly Report on Form 10-Q contains forward-looking statements, which are generally identifiable by use of the words “believes,” “expects,” “intends,” “anticipates,” “plans to,” “estimates,” “projects,” “may,” “likely” or similar expressions. These forward-looking statements are subject to certain risks and uncertainties that could cause actual results to differ materially from those reflected in these forward-looking statements. Factors that might cause such a difference include, but are not limited to, those discussed under Item 1A, “Risk Factors,” in our Annual Report on Form 10-K filed with the Securities and Exchange Commission on February 27, 2019, under Item 1A, “Risk Factors,” included in Part II—Other Information in this report, and in other documents we file from time to time with the SEC. Readers are cautioned not to place undue reliance on these forward-looking statements, which reflect management’s opinions only as of the date hereof. We undertake no obligation to revise or publicly release the results of any revision to these forward-looking statements.

Overview

We are North America’s leading provider of environmental, energy and industrial services. We believe we operate, in the aggregate, the largest number of hazardous waste incinerators, landfills and treatment, storage and disposal facilities ("TSDFs") in North America. We serve a diverse customer base, including Fortune 500 companies, across the chemical, energy, manufacturing and additional markets, as well as numerous government agencies. These customers rely on us to deliver a broad range of services including but not limited to end-to-end hazardous waste management, emergency response, industrial cleaning and maintenance and recycling services. We are also the largest re-refiner and recycler of used oil in the world and the largest provider of parts cleaning and related environmental services to commercial, industrial and automotive customers in North America.

Performance of our segments is evaluated on several factors of which the primary financial measure is Adjusted EBITDA as described more fully below. The following is a discussion of how management evaluates its segments in regards to other factors including key performance indicators that management uses to assess the segments' results, as well as certain macroeconomic trends and influences that impact each reportable segment:

- **Environmental Services** - Environmental Services segment results are predicated upon the demand by our customers for waste services directly attributable to volume and nature of waste streams generated by them and project work for which waste handling and/or disposal is required. In managing the business and evaluating performance, management tracks the volumes and average price of waste handled and disposed of through our owned incinerators and landfills, as well as utilization of such incinerators, labor and billable hours and equipment among other key metrics. Levels of activity and ultimate performance associated with this segment can be impacted by several factors including overall U.S. GDP and U.S. industrial production, weather conditions, efficiency of our operations, competition and market pricing of our services and the management of our related operating costs. Environmental Services results are also impacted by the demand for planned and unplanned industrial related cleaning and maintenance services at customer sites and for environmental cleanup services on a scheduled or emergency basis, including response to national events such as major oil spills, natural disasters or other events where immediate and specialized services are required.

- **Safety-Kleen** - Safety-Kleen segment results are impacted by an array of core service offerings that serve to attract small quantity waste producers as customers and integrate them into the Clean Harbors waste network. Core service offerings include parts washer services, containerized waste services, vacuum services, used motor oil collection and sale of base and blended oil products as well as complementary products including automotive related fluids and shop supplies. Key performance indicators tracked by management relative to these services include the number of parts washer services performed and used motor oil and waste volumes collected. Results from these services are primarily driven by the overall number of parts washers placed at customer sites and volumes of waste collected. These factors can be impacted by overall economic conditions in the marketplace, especially in the automotive related area. Safety-Kleen offers high quality base and blended oil products to end users including fleet customers, distributors and manufacturers of oil products. Relative to these oil related products, management tracks the Company's volumes and relative percentages of base and blended oil sales along with various pricing metrics associated with the commodity driven marketplace. The segment's results are significantly impacted by the overall market pricing and product mix associated with base and blended oil products and, more specifically, the market prices of Group II base oils, which historically have correlated with overall crude oil prices. Costs incurred in connection with the collection of used oils and other raw materials associated with the segment's oil related products can also be volatile. The implementation of our OilPlus® closed loop initiative resulting in the sale of our renewable oil products directly to our end customers will also impact future operating results.

Highlights

Total revenues for the three and six months ended June 30, 2019 were $868.7 million and $1,649.5 million compared with $849.1 million and $1,598.9 million for the three and six months ended June 30, 2018. In the three and six months ended June 30, 2019, our Environmental Services segment increased direct revenues 1.5% and 4.4% from the comparable periods in 2018 primarily due to continued improvements in average pricing driven by a more profitable mix of waste streams primarily from chemical and manufacturing customers. Incremental revenues resulting from our acquisition of the U.S. Industrial Cleaning Business of Veolia Environmental Services North America LLC (the "Veolia Business") in February 2018 also contributed to the increase in revenue for the six months ended June 30, 2019. In the three and six months ended June 30, 2019, our Safety-Kleen segment increased direct revenues 3.9% and 1.1% from the comparable periods in 2018 as a result of continued growth across Safety-Kleen's core service offerings and our blended oil sales. The fluctuation of the Canadian dollar negatively impacted our consolidated revenues by $5.0 million and $11.6 million in the three and six months ended June 30, 2019.

We reported income from operations for the three and six months ended June 30, 2019 of $73.0 million and $96.8 million compared with $64.4 million and $75.3 million in the three and six months ended June 30, 2018. We reported net income for the three and six months ended June 30, 2019 of $36.2 million and $37.2 million compared with net income of $30.7 million and $18.1 million in the three and six months ended June 30, 2018.

Adjusted EBITDA, which is the primary financial measure by which our segments are evaluated, increased 7.4% to $149.8 million in the three months ended June 30, 2019 from $139.6 million in the three months ended June 30, 2018 and increased 10.4% to $251.5 million in the six months ended June 30, 2019 from $227.8 million in the six months ended June 30, 2018. Additional information, including a reconciliation of Adjusted EBITDA to net income, appears below under the heading *"Adjusted EBITDA."*

Net cash from operating activities for the six months ended June 30, 2019 was $138.5 million, an increase of $8.8 million from the comparable period in 2018. Adjusted free cash flow, which management uses to measure our financial strength and ability to generate cash, was $27.5 million in the six months ended June 30, 2019, compared to $38.2 million in the comparable period of 2018. The decrease in adjusted free cash flow as compared to the comparable period of 2018 was most directly attributable to increased capital spending through the first half of 2019 offset by greater levels of operating income. During the most recent three-month period ended June 30, 2019 adjusted free cash flow was $52.4 million as compared to $29.7 million in the same period of 2018. Additional information, including a reconciliation of adjusted free cash flow to net cash from operating activities, appears below under the heading *"Adjusted Free Cash Flow."*

Segment Performance

The primary financial measure by which we evaluate the performance of our segments is Adjusted EBITDA. The following table sets forth certain financial information associated with our results of operations for the three and six months ended June 30, 2019 and June 30, 2018 (in thousands).

	Summary of Operations (in thousands)							
	For the Three Months Ended				For the Six Months Ended			
	June 30, 2019	June 30, 2018	$ Change	% Change	June 30, 2019	June 30, 2018	$ Change	% Change
Direct Revenues[1]:								
Environmental Services	$ 563,076	$ 554,814	$ 8,262	1.5%	$ 1,072,098	$ 1,027,261	$ 44,837	4.4%
Safety-Kleen	305,984	294,435	11,549	3.9	578,461	572,399	6,062	1.1
Corporate Items	(382)	(109)	(273)	N/M	(1,042)	(742)	(300)	N/M
Total	868,678	849,140	19,538	2.3	1,649,517	1,598,918	50,599	3.2
Cost of Revenues[2]:								
Environmental Services	400,306	401,840	(1,534)	(0.4)	785,413	772,400	13,013	1.7
Safety-Kleen	189,053	181,494	7,559	4.2	369,419	359,231	10,188	2.8
Corporate Items	5,574	250	5,324	N/M	4,465	(1,622)	6,087	N/M
Total	594,933	583,584	11,349	1.9	1,159,297	1,130,009	29,288	2.6
Selling, General & Administrative Expenses:								
Environmental Services	44,902	43,775	1,127	2.6	79,307	84,245	(4,938)	(5.9)
Safety-Kleen	37,472	39,872	(2,400)	(6.0)	74,790	78,215	(3,425)	(4.4)
Corporate Items	41,546	42,348	(802)	(1.9)	84,635	78,623	6,012	7.6
Total	123,920	125,995	(2,075)	(1.6)	238,732	241,083	(2,351)	(1.0)
Adjusted EBITDA:								
Environmental Services	117,868	109,199	8,669	7.9	207,378	170,616	36,762	21.5
Safety-Kleen	79,459	73,069	6,390	8.7	134,252	134,953	(701)	(0.5)
Corporate Items	(47,502)	(42,707)	(4,795)	(11.2)	(90,142)	(77,743)	(12,399)	15.9
Total	$ 149,825	$ 139,561	$ 10,264	7.4%	$ 251,488	$ 227,826	$ 23,662	10.4%

N/M = not meaningful

(1) Direct revenue is revenue allocated to the segment performing the provided service.

(2) Cost of revenue is shown exclusive of items presented separately on the statements of operations which consist of (i) accretion of environmental liabilities and (ii) depreciation and amortization.

Direct Revenues

There are many factors which have impacted and continue to impact our revenues. These factors include, but are not limited to: overall industrial activity and growth in North America, existence or non-existence of large scale environmental waste and remediation projects, competitive industry pricing, impacts of acquisitions and divestitures, the level of emergency response projects, general conditions of the energy related industries, base and blended oil pricing, market changes relative to the collection of used oil, the number of parts washers placed at customer sites and foreign currency translation. In addition, customer efforts to minimalize hazardous waste and changes in regulation can also impact our revenues.

Environmental Services

	For the Three Months Ended				For the Six Months Ended			
	June 30,		2019 over 2018		June 30,		2019 over 2018	
	2019	2018	$ Change	% Change	2019	2018	$ Change	% Change
Direct revenues	$ 563,076	$ 554,814	$ 8,262	1.5%	$ 1,072,098	$ 1,027,261	$ 44,837	4.4%

Environmental Services direct revenues for the three months ended June 30, 2019 increased $8.3 million from the comparable period in 2018 primarily due to increased levels of higher priced waste streams disposed of in our network of facilities. These pricing strategies and positive mix factors more than offset reductions in our incinerator utilization and landfill volume. The utilization rate at our incinerators on a practical capacity of 561,721 tons was 81.7% for the three months ended June 30, 2019, compared with 89.8% in the comparable period of 2018. The decrease in utilization rate in the three months ended June 30, 2019 from the comparable period in 2018 was primarily due to a high number of down days during the current quarter for maintenance-related turnarounds at our incinerator facilities. The high number of down days also resulted in an increased level of deferred revenue at the end of the current quarter. We expect fewer down days during the second half of 2019 as compared to the second half of 2018. Also included in the change within this segment was the negative impact of foreign currency translation on our Canadian operations of $3.7 million.

Environmental Services direct revenues for the six months ended June 30, 2019 increased $44.8 million from the comparable period in 2018. Incremental revenues from the comparable period in 2018 were generated by the Veolia Business, which we acquired on February 23, 2018, as well as increased levels of higher priced waste streams disposed of in our network of facilities. The utilization rate at our incinerators on a practical capacity of 561,721 tons was 79.2% for the six months ended June 30, 2019, compared with 88.5% in the comparable period of 2018. The decrease in utilization rate in the six months ended June 30, 2019 from the comparable period in 2018 was primarily due to a high number of down days at our Deer Park facility during the first quarter which was attributable to a fire at a neighboring facility, as well as additional down days during the second quarter. Also included in the change within this segment was the negative impact of foreign currency translation on our Canadian operations of $8.4 million.

Safety-Kleen

	For the Three Months Ended				For the Six Months Ended			
	June 30,		2019 over 2018		June 30,		2019 over 2018	
	2019	2018	$ Change	% Change	2019	2018	$ Change	% Change
Direct revenues	$ 305,984	$ 294,435	$ 11,549	3.9%	$ 578,461	$ 572,399	$ 6,062	1.1%

Safety-Kleen direct revenues for the three months ended June 30, 2019 increased $11.5 million from the comparable period in 2018 primarily due to growth in the Safety Kleen branch network’s core service offerings, including handling of containerized waste and vacuum services which accounted for $7.1 million of incremental revenues from the comparable period in 2018. Also contributing to the increase in direct revenue as compared to prior year was an incremental $3.6 million of blended oil sales and $1.4 million of revenue related to the collection of used motor oil. Inclusive in the change within this segment was the negative impact of foreign currency translation on our Canadian operations of $1.3 million.

Safety-Kleen direct revenues for the six months ended June 30, 2019 increased $6.1 million from the comparable period in 2018 due to growth in the business' core service offerings as well as higher blended oil sales. Revenue generated through the Safety-Kleen branch network's core service offerings accounted for $12.9 million of incremental revenues. Also contributing to the incremental revenue from the comparable period in 2018 was an increase in blended oil sales of $8.0 million due to higher volume and a $2.5 million increase in revenue from used motor oil collections. These increases were partially offset by a $12.7 million decrease due to lower volumes of our base oil sales and a reduction in base oil pricing. Inclusive in the change within this segment was the negative impact of foreign currency translation on our Canadian operations of $3.0 million.

Cost of Revenues

We believe that our ability to manage operating costs is important to our ability to remain price competitive. We continue to upgrade the quality and efficiency of our services through the development of new technology and continued modifications at our facilities, invest in new business opportunities and aggressively implement strategic sourcing and logistics solutions as well as other cost reduction initiatives while also continuing to optimize our management and operating structure in an effort to maintain and increase operating margins.

Environmental Services

	For the Three Months Ended				For the Six Months Ended			
	June 30,		2019 over 2018		June 30,		2019 over 2018	
	2019	2018	Change	% Change	2019	2018	Change	% Change
Cost of revenues	$ 400,306	$ 401,840	$ (1,534)	(0.4)%	$ 785,413	$ 772,400	$ 13,013	1.7 %
As a % of Direct Revenue	71.1%	72.4%	(1.3)%	(1.8)%	73.3%	75.2%	(1.9)%	(2.5)%

Environmental Services cost of revenues for the three months ended June 30, 2019 decreased $1.5 million from the comparable period in 2018 primarily due to reduced labor and benefit related costs of $3.2 million and transportation and outside disposal costs of $0.9 million resulting from cost saving initiatives. These reductions were partially offset by increased equipment and supply costs of $3.2 million. As a percentage of direct revenues, these costs decreased as a result of greater leverage of our fixed costs and higher revenue levels during the three months ended June 30, 2019.

Environmental Services cost of revenues for the six months ended June 30, 2019 increased $13.0 million from the comparable period in 2018 primarily due to increased labor and benefit related costs of $5.6 million, transportation and outside disposal costs of $2.5 million and equipment and supply cost of $1.8 million. As a percentage of direct revenues, these costs decreased 2.5% as a result of incremental revenues which outpaced the increase in costs during the six months ended June 30, 2019.

Safety-Kleen

	For the Three Months Ended				For the Six Months Ended			
	June 30,		2019 over 2018		June 30,		2019 over 2018	
	2019	2018	Change	% Change	2019	2018	Change	% Change
Cost of revenues	$ 189,053	$ 181,494	$ 7,559	4.2%	$ 369,419	$ 359,231	$ 10,188	2.8%
As a % of Direct Revenue	61.8%	61.6%	0.2%	0.3%	63.9%	62.8%	1.1%	1.8%

Safety-Kleen cost of revenues for the three months ended June 30, 2019 increased $7.6 million from the comparable period in 2018 primarily due to increased raw material costs of $3.5 million, labor related costs of $2.9 million and transportation costs of $1.7 million. These increases were partially offset by decreased equipment and supply costs of $1.0 million. The increase in cost of revenues from the comparable period in prior year was consistent with the growth of our core service offerings and blended oil sales. Cost as a percentage of direct revenue remained consistent with the comparable period of 2018.

Safety-Kleen cost of revenues for the six months ended June 30, 2019 increased $10.2 million from the comparable period in 2018 primarily due to increased raw material costs of $6.1 million and labor related cost of $3.3 million. These increases in cost of revenues were consistent with the growth of our core service offerings and blended oil sales. Cost as a percentage of direct revenue increased over the comparable period of 2018 due to these increased costs, which outpaced the increase in revenue.

Selling, General and Administrative Expenses

We strive to manage our selling, general and administrative expenses ("SG&A") commensurate with the overall performance of our segments and corresponding revenue levels. We believe that our ability to properly align these costs with business performance is reflective of our strong management of the businesses and further promotes our ability to remain competitive in the marketplace.

Environmental Services

	For the Three Months Ended June 30,		2019 over 2018		For the Six Months Ended June 30,		2019 over 2018	
	2019	2018	Change	% Change	2019	2018	Change	% Change
SG&A	$ 44,902	$ 43,775	$ 1,127	2.6%	$ 79,307	$ 84,245	$ (4,938)	(5.9)%
As a % of Direct Revenue	8.0%	7.9%	0.1%	1.3%	7.4%	8.2%	(0.8)%	(9.8)%

Environmental Services selling, general and administrative expenses for the three months ended June 30, 2019 increased $1.1 million from the comparable period in 2018 due to increases in salary, benefits and variable compensation related costs, which are consistent with the growth of the business for the three months ended June 30, 2019 as compared to June 30, 2018. As a percentage of direct revenue, SG&A costs remained consistent with the comparable period in 2018. We expect this trend to continue through the remainder of the year as revenues continue to exceed prior year levels.

Environmental Services selling, general and administrative expenses for the six months ended June 30, 2019 decreased $4.9 million from the comparable period in 2018 due to a $5.5 million favorable resolution of litigation and a $5.4 million reduction in bad debt expense resulting from the recovery of certain trade receivables, which were fully reserved in 2018. These decreases were partially offset by increases in salary, benefits and variable compensation related costs of $4.8 million, which are consistent with the growth of the business, for the six months ended June 30, 2019 as compared to June 30, 2018.

Safety-Kleen

	For the Three Months Ended June 30,		2019 over 2018		For the Six Months Ended June 30,		2019 over 2018	
	2019	2018	Change	% Change	2019	2018	Change	% Change
SG&A	$ 37,472	$ 39,872	$ (2,400)	(6.0)%	$ 74,790	$ 78,215	$ (3,425)	(4.4)%
As a % of Direct Revenue	12.2%	13.5%	(1.3)%	(9.6)%	12.9%	13.7%	(0.8)%	(5.8)%

Safety-Kleen selling, general and administrative expenses for the three and six months ended June 30, 2019 decreased $2.4 million and $3.4 million, respectively, from the comparable periods in 2018 primarily due to lower headcount and related costs resulting from cost saving initiatives. As a percentage of direct revenue, selling, general and administrative expenses decreased with the comparable periods in 2018 as a result of lower costs and increased revenues generated by the business.

Corporate Items

	For the Three Months Ended June 30,		2019 over 2018		For the Six Months Ended June 30,		2019 over 2018	
	2019	2018	$ Change	% Change	2019	2018	$ Change	% Change
SG&A	$ 41,546	$ 42,348	$ (802)	(1.9)%	$ 84,635	$ 78,623	$ 6,012	7.6%

Corporate Items selling, general and administrative expenses for the three months ended June 30, 2019 decreased $0.8 million from the comparable period in 2018 primarily due to a reduction in professional fees.

Corporate Items selling, general and administrative expenses for the six months ended June 30, 2019 increased $6.0 million from the comparable period in 2018 primarily due to our increased investment in our employees. During the six months ended June 30, 2019, salary and benefit-related costs increased by $4.8 million and stock-based compensation increased by $3.0 million from the comparable period in 2018. These increases were partially offset by a $2.3 million reduction in professional fees. For the full year, we expect Corporate Items SG&A expenses to be slightly higher than 2018.

Adjusted EBITDA

Management considers Adjusted EBITDA to be a measurement of performance which provides useful information to both management and investors. Adjusted EBITDA should not be considered an alternative to net income or other measurements under generally accepted accounting principles ("GAAP"). Adjusted EBITDA is not calculated identically by all companies and therefore our measurements of Adjusted EBITDA, while defined consistently and in accordance with our existing credit agreement, may not be comparable to similarly titled measures reported by other companies.

	For the Three Months Ended				For the Six Months Ended			
	June 30,		2019 over 2018		June 30,		2019 over 2018	
	2019	2018	$ Change	% Change	2019	2018	$ Change	% Change
Adjusted EBITDA:								
Environmental Services	$ 117,868	$ 109,199	$ 8,669	7.9 %	$ 207,378	$ 170,616	$ 36,762	21.5 %
Safety-Kleen	79,459	73,069	6,390	8.7	134,252	134,953	(701)	(0.5)
Corporate Items	(47,502)	(42,707)	(4,795)	(11.2)	(90,142)	(77,743)	(12,399)	(15.9)
Total	$ 149,825	$ 139,561	$ 10,264	7.4 %	$ 251,488	$ 227,826	$ 23,662	10.4 %

We use Adjusted EBITDA to enhance our understanding of our operating performance, which represents our views concerning our performance in the ordinary, ongoing and customary course of our operations. We historically have found it helpful, and believe that investors have found it helpful, to consider an operating measure that excludes certain expenses relating to transactions not reflective of our core operations.

The information about our operating performance provided by this financial measure is used by our management for a variety of purposes. We regularly communicate Adjusted EBITDA results to our lenders since our loan covenants are based upon levels of Adjusted EBITDA achieved and to our board of directors and we discuss with the board our interpretation of such results. We also compare our Adjusted EBITDA performance against internal targets as a key factor in determining cash and stock bonus compensation for executives and other employees, largely because we believe that this measure is indicative of how the fundamental business is performing and is being managed.

We also provide information relating to our Adjusted EBITDA so that analysts, investors and other interested persons have the same data that we use to assess our core operating performance. We believe that Adjusted EBITDA should be viewed only as a supplement to the GAAP financial information. We also believe, however, that providing this information in addition to, and together with, GAAP financial information permits the users of our financial statements to obtain a better understanding of our core operating performance and to evaluate the efficacy of the methodology and information used by management to evaluate and measure such performance on a standalone and a comparative basis.

The following is a reconciliation of net income to Adjusted EBITDA for the following periods (in thousands):

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2019	2018	2019	2018
Net income	$ 36,244	$ 30,747	$ 37,220	$ 18,116
Accretion of environmental liabilities	2,560	2,448	5,134	4,878
Depreciation and amortization	74,217	72,760	149,572	147,604
Other expense (income), net	564	(846)	(2,419)	(547)
Interest expense, net of interest income	20,215	20,769	39,979	41,039
Provision for income taxes	16,025	13,683	22,002	16,736
Adjusted EBITDA	$ 149,825	$ 139,561	$ 251,488	$ 227,826
As a % of Direct Revenue	17.2%	16.4%	15.2%	14.2%

Depreciation and Amortization

	For the Three Months Ended June 30,		2019 over 2018		For the Six Months Ended June 30,		2019 over 2018	
	2019	2018	$ Change	% Change	2019	2018	$ Change	% Change
Depreciation of fixed assets and amortization of landfills and finance lease	$ 65,523	$ 64,191	$ 1,332	2.1%	$ 131,394	$ 129,791	$ 1,603	1.2%
Permits and other intangibles amortization	8,694	8,569	125	1.5	18,178	17,813	365	2.0
Total depreciation and amortization	$ 74,217	$ 72,760	$ 1,457	2.0%	$ 149,572	$ 147,604	$ 1,968	1.3%

Depreciation and amortization for the three months ended June 30, 2019 increased by $1.5 million from the comparable period in 2018 primarily due to an increase in capital spending.

Depreciation and amortization for the six months ended June 30, 2019 increased by $2.0 million from the comparable period in 2018 due to incremental depreciation from acquisitions and increased capital spending, partially offset by lower volumes at our landfills in 2019, which reduced landfill amortization.

Provision for Income Taxes

	For the Three Months Ended June 30,		2019 over 2018		For the Six Months Ended June 30,		2019 over 2018	
	2019	2018	$ Change	% Change	2019	2018	$ Change	% Change
Provision for income taxes	$ 16,025	$ 13,683	$ 2,342	17.1%	$ 22,002	$ 16,736	$ 5,266	31.5%

The provision for income taxes for the three and six months ended June 30, 2019 increased $2.3 million and $5.3 million, respectively, from the comparable periods in 2018. The increase in the three and six months ended June 30, 2019 was primarily due to increased taxable income in the United States. Our effective tax rate for the three and six months ended June 30, 2019 was 30.7% and 37.2%, respectively, compared to 30.8% and 48.0%, respectively, for the same periods in 2018.

For the six months ended June 30, 2019, we did not record $4.8 million of income tax benefits generated from losses at certain of our Canadian entities. This compares to $6.1 million of income tax benefits generated in the comparable period of 2018 which also were not recorded in that period's income tax provision.

Liquidity and Capital Resources

	Six Months Ended June 30,	
(in thousands)	**2019**	**2018**
Net cash from operating activities	$ 138,470	$ 129,670
Net cash used in investing activities	(139,868)	(216,141)
Net cash used in financing activities	(23,793)	(33,928)

Net cash from operating activities

Net cash from operating activities for the six months ended June 30, 2019 was $138.5 million, an increase of $8.8 million from the comparable period in 2018. The increase in operating cash flows as compared to the comparable period of 2018 was mostly attributable to greater levels of operating income. We believe that net cash from operating activities for 2019 will continue to improve year-over-year as we continue to generate higher earnings.

Net cash used in investing activities

Net cash used in investing activities for the six months ended June 30, 2019 was $139.9 million, a decrease of $76.3 million from the comparable period in 2018. The change was primarily driven by a decrease in cash paid for acquisitions, which was greater during the six months ended June 30, 2018 due to the acquisition of the Veolia Business on February 23, 2018. This decrease was partially offset by increased capital expenditure levels, net of disposals, which we expect to be approximately $200.0 million by the end of 2019.

Net cash used in financing activities

Net cash used in financing activities for the six months ended June 30, 2019 was $23.8 million, a decrease of $10.1 million from the comparable period in 2018. The change was primarily due to a decrease in repurchases of common stock, which was partially offset by an increase in tax payments related to withholdings on vested restricted stock and quarterly principal payments on debt as a result of the expansion of our Term Loan Agreement in the third quarter of 2018.

Adjusted Free Cash Flow

Management considers adjusted free cash flow to be a measurement of liquidity which provides useful information to both management, creditors and investors about our financial strength and our ability to generate cash. Additionally, adjusted free cash flow is a metric on which a portion of management incentive compensation is based. We define adjusted free cash flow as net cash from operating activities excluding cash impacts of items derived from non-operating activities, such as taxes paid in connection with divestitures, less additions to property, plant and equipment plus proceeds from sales or disposals of fixed assets. Adjusted free cash flow should not be considered an alternative to net cash from operating activities or other measurements under GAAP. Adjusted free cash flow is not calculated identically by all companies, and therefore our measurements of adjusted free cash flow may not be comparable to similarly titled measures reported by other companies.

The following is a reconciliation of net cash from operating activities to adjusted free cash flow for the following periods (in thousands):

	Six Months Ended June 30,	
	2019	2018
Net cash from operating activities	$ 138,470	$ 129,670
Additions to property, plant and equipment	(118,372)	(94,139)
Proceeds from sale and disposal of fixed assets	7,389	2,641
Adjusted free cash flow	$ 27,487	$ 38,172

Working Capital

At June 30, 2019, cash and cash equivalents and marketable securities totaled $259.7 million, compared to $279.4 million at December 31, 2018. At June 30, 2019, cash and cash equivalents held by our foreign subsidiaries totaled $72.8 million and were readily convertible into other currencies including U.S. dollars. At June 30, 2019, the cash and cash equivalents and marketable securities balance for our U.S. operations was $186.9 million, and our U.S. operations had net operating cash flows of $131.0 million for the six months ended June 30, 2019. Additionally, we have a $400.0 million revolving credit facility of which approximately $217.0 million was available to borrow at June 30, 2019. Based on the above and on our current plans, we believe that our U.S. operations have and will continue to have adequate financial resources to satisfy their current liquidity needs.

We assess our liquidity in terms of our ability to generate cash to fund our operating, investing and financing activities. Our primary ongoing cash requirements will be to fund operations, capital expenditures, interest payments and investments in line with our business strategy. We believe our future operating cash flows will be sufficient to meet our future operating and internal investing cash needs as well as any cash needs relating to our stock repurchase program. Furthermore, our existing cash balance and the availability of additional borrowings under our revolving credit facility provide additional potential sources of liquidity should they be required.

Financing Arrangements

Financing arrangements are discussed in Note 11, “Financing Arrangements,” to our consolidated financial statements included in this report. We continue to monitor our debt instruments and evaluate opportunities where it may be beneficial to refinance or reallocate the portfolio.

As of June 30, 2019, we were in compliance with the covenants of all our debt agreements, and we believe it is reasonably likely that we will continue to meet such covenants.

As discussed in Note 11, “Financing Arrangements,” to our consolidated financial statements, we refinanced a portion of our debt portfolio in July 2019 whereby the $845.0 million of previously outstanding 5.125% senior unsecured notes due 2021 were replaced by $545.0 million of 4.875% unsecured senior notes due 2027 and $300.0 million 5.125% unsecured senior notes due 2029.

Environmental Liabilities

(in thousands)	June 30, 2019	December 31, 2018	$ Change	% Change
Closure and post-closure liabilities	$ 75,830	$ 69,931	$ 5,899	8.4 %
Remedial liabilities	118,275	121,017	(2,742)	(2.3)
Total environmental liabilities	$ 194,105	$ 190,948	$ 3,157	1.7 %

Total environmental liabilities as of June 30, 2019 were $194.1 million, an increase of $3.2 million compared to December 31, 2018 primarily due to accretion of $5.1 million, changes in environmental liability estimates recorded to the balance sheet of $2.8 million and new asset retirement obligations and liabilities assumed in acquisitions of $1.3 million, partially offset by expenditures of $6.1 million.

We anticipate our environmental liabilities, substantially all of which we assumed in connection with our acquisitions, will be payable over many years and that cash flow from operations will generally be sufficient to fund the payment of such liabilities when required. However, events not anticipated (such as future changes in environmental laws and regulations) could require that such payments be made earlier or in greater amounts than currently anticipated, which could adversely affect our results of operations, cash flow and financial condition.

Capital Expenditures

We anticipate that 2019 capital spending, net of disposals, will be in the range of $190.0 million to $210.0 million. However, unanticipated changes in environmental regulations could require us to make significant capital expenditures for our facilities and adversely affect our results of operations and cash flow.

Critical Accounting Policies and Estimates

There were no material changes in the first six months of 2019 to the information provided under the heading “Critical Accounting Policies and Estimates” included in our Annual Report on Form 10-K for the year ended December 31, 2018. New accounting policies adopted during the quarter are described in Note 2, "Significant Accounting Policies," to our unaudited consolidated financial statements included in this report.

ITEM 3. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

There were no material changes in the first six months of 2019 to the information provided under Item 7A. “Quantitative and Qualitative Disclosures about Market Risk” in the Company's Annual Report on Form 10-K for the year ended December 31, 2018.

ITEM 4. CONTROLS AND PROCEDURES

Evaluation of Disclosure Controls and Procedures

Based on an evaluation under the supervision and with the participation of our Chief Executive Officer and Chief Financial Officer, as of the end of the period covered by this Quarterly Report on Form 10-Q, our Chief Executive Officer and Chief Financial Officer have concluded that our disclosure controls and procedures (as defined under Rule 13a-15(e) and 15d-15(e) under the Securities Exchange Act of 1934, as amended (the “Exchange Act”)) were effective as of June 30, 2019 to ensure that information required to be disclosed by us in reports that we file or submit under the Exchange Act is recorded, processed, summarized and reported within the time periods specified in Securities and Exchange Commission rules and forms and 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.

Changes in Internal Control over Financial Reporting

There were no changes in the Company's internal control over financial reporting identified in connection with the evaluation required by paragraph (d) of Exchange Act Rules 13a-15 or 15d-15 that was conducted during the quarter ended June 30, 2019 that have materially affected, or are reasonably likely to materially affect, the Company’s internal control over financial reporting.

CLEAN HARBORS, INC. AND SUBSIDIARIES

PART II—OTHER INFORMATION

ITEM 1. LEGAL PROCEEDINGS

See Note 16, “Commitments and Contingencies,” to the financial statements included in Item 1 of this report, which description is incorporated herein by reference.

ITEM 1A. RISK FACTORS

During the six months ended June 30, 2019, there were no material changes from the risk factors as previously disclosed in Item 1A in the Company's Annual Report on Form 10-K for the year ended December 31, 2018.

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

Common Stock Repurchase Program

The following table provides information with respect to the shares of common stock repurchased by us for the periods indicated.

Period	Total Number of Shares Purchased (1)	Average Price Paid Per Share (2)	Total Number of Shares Purchased as Part of Publicly Announced Plans or Programs	Approximate Dollar Value of Shares that May Yet Be Purchased Under the Plans or Programs (3)
April 1, 2019 through April 30, 2019	17,702	$ 72.01	—	$ 299,748,915
May 1, 2019 through May 31, 2019	18,059	$ 65.30	17,500	$ 298,609,241
June 1, 2019 through June 30, 2019	78,192	$ 66.50	56,500	$ 294,800,437
Total	113,953	$ 67.17	74,000	$ 294,800,437

(1) Includes 39,953 shares withheld by us from employees to satisfy employee tax obligations upon vesting of restricted stock units granted to our employees under the Company's equity incentive plans.

(2) The average price paid per share of common stock repurchased under the stock repurchase program includes the commissions paid to brokers.

(3) Our board of directors has authorized the repurchase of up to $600.0 million of our common stock. We have funded and intend to fund the repurchases through available cash resources. The stock repurchase program authorizes us to purchase our common stock on the open market or in privately negotiated transactions periodically in a manner that complies with applicable U.S. securities laws. The number of shares purchased and the timing of the purchases has depended and will depend on several factors, including share price, cash required for business plans, trading volume and other conditions. During April 2018, we implemented a repurchase plan in accordance with Rule 10b5-1 promulgated under the Securities Exchange Act of 1934, as amended. Future repurchases will be made under the Rule 10b5-1 plan as well as open market or privately negotiated transactions as described above. We have no obligation to repurchase stock under this program and may suspend or terminate the repurchase program at any time.

ITEM 3. DEFAULTS UPON SENIOR SECURITIES

None

ITEM 4. MINE SAFETY DISCLOSURE

Not applicable

ITEM 5. OTHER INFORMATION

None

ITEM 6. EXHIBITS

Item No.	Description	Location
31.1	Rule 13a-14a/15d-14(a) Certification of the CEO Alan S. McKim	Filed herewith
31.2	Rule 13a-14a/15d-14(a) Certification of the CFO Michael L. Battles	Filed herewith
32	Section 1350 Certifications	Filed herewith
101	Interactive Data Files Pursuant to Rule 405 of Regulation S-T: Financial statements from the quarterly report on Form 10-Q of Clean Harbors, Inc. for the quarter ended June 30, 2019, formatted in XBRL: (i) Consolidated Balance Sheets, (ii) Unaudited Consolidated Statements of Operations, (iii) Unaudited Consolidated Statements of Comprehensive Income (Loss), (iv) Unaudited Consolidated Statements of Cash Flows, (v) Unaudited Consolidated Statements of Stockholders' Equity, and (vi) Notes to Unaudited Consolidated Financial Statements.	*

* Interactive data files are furnished and deemed not filed or part of a registration statement or prospectus for purposes of Sections 11 or 12 of the Securities Act of 1933, as amended, are deemed not filed for purposes of Section 18 of the Securities Exchange Act of 1934, as amended, and otherwise are not subject to liability under those sections.

CLEAN HARBORS, INC. AND SUBSIDIARIES

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.

CLEAN HARBORS, INC.
Registrant

By: /s/ ALAN S. MCKIM
Alan S. McKim
Chairman, President and Chief Executive Officer

Date: July 31, 2019

By: /s/ MICHAEL L. BATTLES
Michael L. Battles
Executive Vice President and Chief Financial Officer

Date: July 31, 2019

EXHIBIT 31.1

CERTIFICATION OF CHIEF EXECUTIVE OFFICER

I, Alan S. McKim, certify that:

1. I have reviewed this Quarterly Report on Form 10-Q of Clean Harbors, Inc.;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this report;

4. The registrant's other certifying officer(s) and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:

(a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

(b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;

(c) Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

(d) Disclosed in this report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of an annual report) that has materially affected, or is reasonably likely to materially affect, the registrant's internal control over financial reporting; and

5. The registrant's other certifying officer(s) and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of the registrant's board of directors (or persons performing the equivalent functions):

(a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and

(b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal control over financial reporting.

/s/ Alan S. McKim

Alan S. McKim

Chairman, President and Chief Executive Officer

Date: July 31, 2019

Exhibit 31.2

CERTIFICATION OF CHIEF FINANCIAL OFFICER

I, Michael L. Battles, certify that:

1. I have reviewed this quarterly report on Form 10-Q of Clean Harbors, Inc.;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this report;

4. The registrant’s other certifying officer(s) and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:

(a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

(b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;

(c) Evaluated the effectiveness of the registrant’s disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

(d) Disclosed in this report any change in the registrant’s internal control over financial reporting that occurred during the registrant’s most recent fiscal quarter (the registrant’s fourth fiscal quarter in the case of an annual report) that has materially affected, or is reasonably likely to materially affect, the registrant’s internal control over financial reporting; and

5. The registrant’s other certifying officer(s) and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant’s auditors and the audit committee of the registrant’s board of directors (or persons performing the equivalent functions):

(a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant’s ability to record, process, summarize and report financial information; and

(b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant’s internal control over financial reporting.

/s/ Michael L. Battles

Michael L. Battles

Executive Vice President and Chief Financial Officer

Date: July 31, 2019

EXHIBIT 32

CLEAN HARBORS, INC. AND SUBSIDIARIES

CERTIFICATION PURSUANT TO
SECTION 1350, CHAPTER 63 OF TITLE 18, UNITED STATES CODE,
AS ADOPTED PURSUANT TO
SECTION 906 OF THE SARBANES OXLEY ACT OF 2002

Pursuant to 18 U.S.C. §1350, each of the undersigned certifies that, to his knowledge, this Quarterly Report on Form 10-Q for the period ended June 30, 2019 fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934 and the information contained in this report fairly presents, in all material respects, the financial condition and results of operations of Clean Harbors, Inc.

By: /s/ ALAN S. MCKIM

Alan S. McKim

Chairman, President and Chief Executive Officer

Date: July 31, 2019

By: /s/ MICHAEL L. BATTLES

Michael L. Battles

Executive Vice President and Chief Financial Officer

Date: July 31, 2019