

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 quarter ended December 28, 2018

Commission File Number 1-7635

TWIN DISC, INCORPORATED

(Exact name of registrant as specified in its charter)

Wisconsin

(State or other jurisdiction of
Incorporation or organization)

39-0667110

(I.R.S. Employer
Identification No.)

1328 Racine Street, Racine, Wisconsin 53403

(Address of principal executive offices)

(262) 638-4000

(Registrant's telephone number, including area code)

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15 (d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports) and (2) has been subject to such filing requirements for the past 90 days.

Yes No

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

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

Large Accelerated Filer

Accelerated Filer

Non-accelerated filer

Smaller reporting company

Emerging growth company

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

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act).

Yes No

At January 31, 2019, the registrant had 13,099,512 shares of its common stock outstanding.

Part I. FINANCIAL INFORMATION

Item 1. Financial Statements

TWIN DISC, INCORPORATED
CONDENSED CONSOLIDATED BALANCE SHEETS
(IN THOUSANDS, EXCEPT SHARE AMOUNTS)
(UNAUDITED)

	<u>December 28, 2018</u>	<u>June 30, 2018</u>
ASSETS		
Current assets:		
Cash	\$ 18,542	\$ 15,171
Trade accounts receivable, net	47,890	45,422
Inventories	130,234	84,001
Prepaid expenses	7,314	8,423
Other	8,320	6,252
Total current assets	212,300	159,269
Property, plant and equipment, net	70,309	55,467
Goodwill, net	27,829	2,692
Intangible assets, net	22,362	1,906
Deferred income taxes	13,907	18,056
Other assets	4,123	3,850
Total assets	\$ 350,830	\$ 241,240
LIABILITIES AND EQUITY		
Current liabilities:		
Accounts payable	\$ 35,123	\$ 29,368
Accrued liabilities	42,266	32,976
Total current liabilities	77,389	62,344
Long-term debt	46,686	4,824
Lease obligations	16,467	6,527
Accrued retirement benefits	19,552	21,068
Deferred income taxes	7,053	1,203
Other long-term liabilities	1,839	1,658
Total liabilities	168,986	97,624
Commitments and contingencies (Note F)		
Equity:		
Twin Disc shareholders' equity:		
Preferred shares authorized: 200,000; issued: none; no par value	-	-
Common shares authorized: 30,000,000; issued: 14,632,802 and 13,099,468, respectively; no par value	44,137	11,570
Retained earnings	192,734	178,896
Accumulated other comprehensive loss	(32,055)	(23,792)
	204,816	166,674
Less treasury stock, at cost (1,533,290 and 1,545,783 shares, respectively)	23,485	23,677
Total Twin Disc shareholders' equity	181,331	142,997
Noncontrolling interest	513	619
Total equity	181,844	143,616
Total liabilities and equity	\$ 350,830	\$ 241,240

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

TWIN DISC, INCORPORATED
CONDENSED CONSOLIDATED STATEMENTS OF OPERATIONS AND COMPREHENSIVE INCOME
(IN THOUSANDS, EXCEPT PER SHARE DATA)
(UNAUDITED)

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Net sales	\$ 78,107	\$ 56,546	\$ 152,796	\$ 101,611
Cost of goods sold	52,019	38,323	102,723	69,396
Gross profit	26,088	18,223	50,073	32,215
Marketing, engineering and administrative expenses	18,909	15,070	37,894	28,464
Restructuring expenses	434	831	607	2,049
Income from operations	6,745	2,322	11,572	1,702
Interest expense	417	83	1,134	147
Other expense (income), net	798	364	1,118	934
	1,215	447	2,252	1,081
Income before income taxes and noncontrolling interest	5,530	1,875	9,320	621
Income tax expense	1,451	5,925	2,338	1,267
Net income (loss)	4,079	(4,050)	6,982	(646)
Less: Net earnings attributable to noncontrolling interest, net of tax	(6)	(63)	(47)	(76)
Net income (loss) attributable to Twin Disc	\$ 4,073	\$ (4,113)	\$ 6,935	\$ (722)
Income (loss) per share data:				
Basic income (loss) per share attributable to Twin Disc common shareholders	\$ 0.31	\$ (0.36)	\$ 0.56	\$ (0.06)
Diluted income (loss) per share attributable to Twin Disc common shareholders	\$ 0.31	\$ (0.36)	\$ 0.56	\$ (0.06)
Weighted average shares outstanding data:				
Basic shares outstanding	12,909	11,297	12,233	11,278
Diluted shares outstanding	12,997	11,297	12,304	11,278
Comprehensive income (loss):				
Net income (loss)	\$ 4,079	\$ (4,050)	\$ 6,982	\$ (646)
Benefit plan adjustments, net of income taxes of \$146, \$674, \$292 and \$952, respectively	478	1,734	949	2,208
Foreign currency translation adjustment	(1,786)	488	(2,347)	3,029
Comprehensive income (loss)	2,771	(1,828)	5,584	4,591
Less: Comprehensive loss (income) attributable to noncontrolling interest	7	(62)	(9)	(69)
Comprehensive income (loss) attributable to Twin Disc	\$ 2,778	\$ (1,890)	\$ 5,575	\$ 4,522

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

TWIN DISC, INCORPORATED
CONDENSED CONSOLIDATED STATEMENTS OF CASH FLOWS
(IN THOUSANDS)
(UNAUDITED)

For the Two Quarters Ended
December 28, 2018 December 29, 2017

Cash flows from operating activities:			
Net income (loss)	\$	6,982	\$ (646)
Adjustments to reconcile net income (loss) to net cash (used) provided by operating activities, net of acquired assets:			
Depreciation and amortization		4,510	3,263
Amortization of inventory fair value step-up		2,173	-
Restructuring expenses		-	162
Provision for deferred income taxes		2,555	1,613
Stock compensation expense and other non-cash changes, net		1,506	1,064
Net change in operating assets and liabilities		(21,505)	(1,644)
Net cash (used) provided by operating activities		<u>(3,779)</u>	<u>3,812</u>
Cash flows from investing activities:			
Acquisition of Veth Propulsion, less cash acquired		(59,651)	-
Acquisitions of fixed assets		(6,676)	(3,013)
Proceeds from sale of fixed assets		63	79
Other, net		(129)	(129)
Net cash used by investing activities		<u>(66,393)</u>	<u>(3,063)</u>
Cash flows from financing activities:			
Proceeds from issuance of common stock, net		32,210	-
Borrowings under long-term debt agreement		35,000	-
Borrowings under revolving loan agreement		93,675	35,315
Proceeds from exercise of stock options		36	-
Repayments under revolving loan agreement		(62,326)	(36,957)
Repayments of long-term borrowings		(24,230)	-
Dividends paid to noncontrolling interest		(115)	(172)
Payments of withholding taxes on stock compensation		(926)	(400)
Net cash provided (used) by financing activities		<u>73,324</u>	<u>(2,214)</u>
Effect of exchange rate changes on cash		<u>219</u>	<u>864</u>
Net change in cash		3,371	(601)
Cash:			
Beginning of period		<u>15,171</u>	<u>16,367</u>
End of period	\$	<u>18,542</u>	\$ <u>15,766</u>

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

TWIN DISC, INCORPORATED
NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS
(AMOUNTS IN THOUSANDS, EXCEPT PER SHARE DATA)
(UNAUDITED)

A. Basis of Presentation

The unaudited condensed consolidated financial statements have been prepared by Twin Disc, Incorporated (the “Company”) pursuant to the rules and regulations of the Securities and Exchange Commission (“SEC”) and, in the opinion of the Company, include all adjustments, consisting only of normal recurring items, necessary for a fair statement of results for each period. Certain information and footnote disclosures normally included in financial statements prepared in accordance with generally accepted accounting principles have been condensed or omitted pursuant to such SEC rules and regulations. The Company believes that the disclosures made are adequate to make the information presented not misleading. It is suggested that these financial statements be read in conjunction with the consolidated financial statements and the notes thereto included in the Company’s Annual Report filed on Form 10-K for June 30, 2018. The year-end condensed balance sheet data was derived from audited financial statements, but does not include all disclosures required by accounting principles generally accepted in the United States.

The unaudited condensed consolidated financial statements and information included in this Quarterly Report on Form 10-Q (“Form 10-Q”) includes the financial results of Veth Propulsion Holding BV (“Veth Propulsion”) for the period beginning July 2, 2018 through December 28, 2018. The financial results included in this Form 10-Q related to the acquisition method of accounting for the Veth Propulsion acquisition are subject to change as the acquisition method accounting is not yet finalized and dependent upon the finalization of management’s review of certain independent valuations and studies that are still in process. See Note B, “Acquisition of Veth Propulsion Holding BV” for further information about the acquisition and related transactions and the acquisition accounting.

Recently Adopted Accounting Standards

- a. In May 2014, the Financial Accounting Standards Board (“FASB”) issued updated guidance (ASU 2014-09) on revenue from contracts with customers. This revenue recognition guidance supersedes existing guidance, including industry-specific guidance. The core principle is that an entity should recognize revenue to depict the transfer of control over promised goods or services to customers in an amount that reflects the consideration to which the entity expects to be entitled in exchange for those goods or services. The guidance identifies steps to apply in achieving this principle. The Company adopted this guidance effective July 1, 2018, using the modified retrospective method and applied the cumulative effect to its retained earnings balance as of that date. Prior periods presented were not retrospectively adjusted for this change. The Company has applied the new revenue recognition standard only to contracts that were not completed as of July 1, 2018.

The Company determined that deferral of revenue is appropriate for certain agreements where the performance of services after product delivery is required. Such services primarily pertain to technical commissioning services by its distribution entities in its marine business, whereby the Company’s technicians calibrate the controls and transmission to ensure proper performance for the customer’s specific application. This service helps identify issues with the ship’s design or performance that need to be remediated by the ship builder or other component suppliers prior to the ship being officially accepted into service by the ship buyer. The cumulative effect adjustment of adopting the new standard is not significant to the Company’s results of operations and financial condition.

- b. In February 2016, the FASB issued guidance (ASU 2016-02) which replaces the existing guidance for leases. The new standard establishes a right-of-use (“ROU”) model that requires a lessee to record a ROU asset and a lease liability on the balance sheet for all leases with terms longer than 12 months. The Company elected to early adopt the standard effective July 1, 2018, concurrent with the adoption of ASU 2014-09, Revenue from Contracts with Customers, using the modified retrospective approach at the beginning of the earliest comparative period presented in the financial statements, which required the Company to restate each prior reporting period presented.

For operating leases in which the Company is a lessee, the Company concluded that all existing operating leases under the old guidance continue to be classified as operating leases under the new guidance, and all existing capital leases under the old guidance are classified as finance leases under the new guidance. The Company excluded any lease contracts with terms of twelve months or less as of the adoption date. The Company has lease agreements with lease and non-lease components, which are generally accounted for as separate lease components. The Company accounts for short-term leases on a straight-line basis over the lease term.

The following table presents the effect of the adoption of ASU 2016-02 on the Company's condensed consolidated balance sheet as of June 30, 2018:

	June 30, 2018 As Reported	Adoption Impact	June 30, 2018 Restated
Property, plant and equipment, net	\$ 48,940	\$ 6,527	\$ 55,467
Lease obligations	-	6,527	6,527

The adoption of ASU 2014-09 and ASU 2016-02 did not have an impact on the Company's condensed consolidated statement of operations and comprehensive income for the quarter and two quarters ended December 29, 2017, or condensed consolidated statement of cash flows for the two quarters ended December 29, 2017.

- c. In March 2017, the FASB issued guidance (ASU 2017-07) intended to improve the presentation of net periodic pension cost and net periodic postretirement cost. This guidance requires that an employer report the service cost component in the same line item as other compensation costs arising from services rendered by the pertinent employees during the period. The other components of net benefit cost are required to be presented in the statement of operations separately from the service cost component and outside the subtotal of income from operations. The Company adopted this guidance effective July 1, 2018 on a retrospective basis, which resulted in the reclassification of certain amounts from cost of goods sold and marketing, engineering and administrative expenses to other expense (income), net in the condensed consolidated statements of operations and comprehensive income. As a result, prior period amounts impacted have been revised accordingly.

The following table presents the effect of the adoption of ASU 2017-07 on the Company's condensed consolidated statements of operations and comprehensive income for the quarter and two quarters ended December 29, 2017:

	For the Quarter Ended			For the Two Quarters Ended		
	December 29, 2017	Adoption Impact	December 29, 2017	December 29, 2017	Adoption Impact	December 29, 2017
	As Reported	Restated	As Reported	Restated	Restated	
Cost of goods sold	\$ 38,420	\$ (97)	\$ 38,323	\$ 69,590	\$ (194)	\$ 69,396
Gross profit	18,126	97	18,223	32,021	194	32,215
Marketing, engineering and administrative expenses	15,268	(198)	15,070	28,936	(472)	28,464
Income from operations	2,027	295	2,322	1,036	666	1,702
Other expense (income), net	69	295	364	268	666	934

- d. In February 2018, the FASB issued guidance (ASU 2018-02) intended to eliminate the stranded tax effects resulting from the Tax Cuts and Jobs Act by allowing a reclassification from accumulated other comprehensive income to retained earnings. The Company elected to early adopt this guidance effective July 1, 2018 by making a reclassification of \$6,903 from accumulated other comprehensive loss to retained earnings.
- e. In October 2016, the FASB issued updated guidance (ASU 2016-16) that changes the recognition of income tax consequences of an intra-entity transfer of an asset other than inventory. The Company adopted this guidance effective July 1, 2018. The adoption of this guidance did not have a material impact on the Company's financial statements and disclosures.
- f. In August 2016, the FASB issued updated guidance (ASU 2016-15) that addresses eight specific cash flow issues with the objective of reducing the existing diversity in practice. The Company adopted this guidance effective July 1, 2018. The adoption of this guidance did not have a material impact on the Company's financial statements and disclosures.
- g. In August 2018, the SEC issued Release No. 33-10532, Disclosure Update and Simplification. In addition to eliminating certain disclosure requirements, this release also amends the interim financial statement requirements to require provision of the information required by Regulation S-X Rule 3-04 for the current and comparative year-to-date periods, with subtotals for each interim period. Rule 3-04 requires a reconciliation of stockholders' equity beginning and ending balances for each period for which a statement of comprehensive income is required to be filed. The Company adopted this guidance during the Company's second quarter of fiscal year 2019. The adoption of this guidance did not have a material impact on the Company's disclosures.

New Accounting Releases

In August 2018, the FASB issued updated guidance (ASU 2018-13) as part of the disclosure framework project, which focuses on improving the effectiveness of disclosures in the notes to the financial statements. The amendments in this update modify the disclosure requirements on fair value measurements in Topic 820, Fair Value Measurement. The amendments in this guidance are effective for fiscal years, and interim periods within those fiscal years, beginning after December 15, 2019 (the Company's fiscal 2021), with early adoption permitted. The Company is currently evaluating the potential impact of this guidance on the Company's disclosures.

In August 2018, the FASB issued updated guidance (ASU 2018-14) intended to modify the disclosure requirements for employers that sponsor defined pension or postretirement plans. The amendments in this guidance are effective for fiscal years ending after December 15, 2020 (the Company's fiscal 2021), with early adoption permitted. The Company is currently evaluating the potential impact of this guidance on the Company's disclosures.

Special Note Regarding Smaller Reporting Company Status

In June 2018, the SEC issued Release 33-10513; 34-83550, Amendments to Smaller Reporting Company Definition, which changes the definition of a smaller reporting company in Rule 12b-2 of the Securities Exchange Act of 1934, as amended. Under this release, the new thresholds for qualifying are (1) public float of less than \$250 million or (2) annual revenue of less than \$100 million and public float of less than \$700 million (including no public float). The rule change is effective on September 10, 2018, the Company's first fiscal quarter of fiscal year 2019. Under this release, the Company continues to qualify as a smaller reporting company based on its public float as of the last business day of its second fiscal quarter of fiscal year 2019. A smaller reporting company may choose to comply with scaled or non-scaled financial and non-financial disclosure requirements on an item-by-item basis. The Company has not scaled its disclosures of financial and non-financial information in this Quarterly Report. The Company may determine to provide scaled disclosures of financial or non-financial information in future quarterly reports, annual reports and/or proxy statements if it remains a smaller reporting company under SEC rules.

B. Acquisition of Veth Propulsion Holding BV

On July 2, 2018, the Company completed the acquisition of 100% of the outstanding common stock of Veth Propulsion. Veth Propulsion is a global manufacturer of highly-engineered primary and auxiliary propulsions and propulsion machinery for maritime vessels, including rudder propellers, bow thrusters, generator sets and engine service and repair, based in the Netherlands. These products are complementary to and expand the Company's current product offerings in the marine and propulsion markets. Prior to the acquisition, the Company was a distributor of Veth products in North America and Asia. This acquisition was pursuant to a Share Purchase Agreement ("Purchase Agreement") entered into by Twin Disc NL Holding B.V., a wholly-owned subsidiary of the Company, with Het Komt Vast Goed B.V., the prior parent of Veth Propulsion, on June 13, 2018. Veth Propulsion is reported as part of the Company's manufacturing segment.

Under the terms of the Purchase Agreement, the Company paid an aggregate of approximately \$60,729 in cash at closing, which included a base payment plus adjustments for net cash and working capital. This amount is subject to a final determination of working capital adjustments and an earn-out. The maximum earn-out is approximately \$3,800. The earn-out will be paid if the earnings before interest, tax, depreciation and amortization of Veth Propulsion in the period January 1, 2018 through December 31, 2018 exceeds the agreed upon threshold amount. The earn-out is payable in the form of Company stock or cash, and will be determined by April 2019.

The Company financed the payment of the cash consideration through borrowings of \$60,729 under a new credit agreement entered into on June 29, 2018 with BMO Harris Bank N.A. (the "Credit Agreement"). The Credit Agreement is further discussed in Note L, Debt.

Consideration Transferred

The following table summarizes the consideration transferred at the acquisition date. This amount is subject to a final determination of a working capital adjustment and earn-out, which will be settled prior to the end of the measurement period ending July 1, 2019.

Cash (a)	\$	60,729
Fair value of contingent consideration (b)		2,920
Total	\$	<u>63,649</u>

- a) In the statement of cash flows, the cash used in the acquisition of Veth Propulsion in the amount of \$59,651 is net of the cash, including restricted cash, acquired in the transaction, of \$1,078 (see below for fair value of assets acquired and liabilities assumed).
- b) This pertains to the fair value of the earn-out, which was estimated based on a probability-weighted approach.

Fair Value Estimate of Assets Acquired and Liabilities Assumed

The Company is continuing its review of the fair value estimate of assets acquired and liabilities assumed during the measurement period, which will conclude as soon as the necessary information regarding the facts and circumstances that existed as of the acquisition date is obtained, or otherwise not available. This measurement period will not exceed one year from the acquisition date. At the effective date of the acquisition, the assets acquired and liabilities assumed are required to be measured at fair value. The fair value estimates are pending completion of several elements, including the finalization of an independent appraisal and final review by the Company. Accordingly, until the fair values are final, there could be material adjustments to the Company's consolidated financial statements, including changes to depreciation and amortization expense related to the valuation of property and equipment and intangible assets acquired and their respective useful lives, among other adjustments.

Upon the final determination of the fair value of assets acquired and liabilities assumed, the excess of the purchase price over such fair values is allocated to goodwill. The final determination of the purchase price, fair values and resulting goodwill may differ significantly from what is reflected in these consolidated financial statements.

The following summarizes the preliminary estimate of fair value of the assets acquired and liabilities assumed at the acquisition date. Some of these amounts reflect updated values from those previously reported as of September 28, 2018, the Company's prior fiscal quarter, due to management's ongoing fair value assessment during the measurement period.

Cash, including restricted cash	\$	1,078 (a)
Accounts receivable and other current assets		9,999 (b)
Inventories		27,273 (c)
Property, plant and equipment		2,641 (d)
Intangibles		22,000 (e)
Other assets		258
Accounts payable and customer deposits and other current liabilities		(18,402)
Deferred tax liability		(6,877) (f)
Total net assets acquired		37,970
Goodwill		25,679 (g)
Total consideration	\$	<u>63,649</u>

The following information provides further details about the estimated net step-up in fair value and/or the estimated fair value at the acquisition date for some key balance sheet items.

(a) Included in cash is restricted cash in the amount of \$685. This amount is restricted and not available for general business use in order to guarantee performance obligations by Veth Propulsion under certain customer contracts. A significant majority of these arrangements have expired as of December 28, 2018 and they are not expected to be renewed.

(b) Accounts receivable represents contractual amounts receivable from customers less an allowance for doubtful accounts. This amount approximates fair value.

(c) Inventories consist of:

Raw materials	\$	12,804
Projects work in progress at fair value		14,469
Inventories at fair value		<u>27,273</u>
Inventories at book value		22,871
Step-up	\$	<u>4,402</u>

As of the effective date of the acquisition, inventory is required to be measured at fair value. Raw materials are typically utilized in operations within one year of purchase and therefore book values approximate fair value. Projects work in progress are estimated to be approximately 70% complete, and the step-up to fair value less estimated costs to complete and sell resulted in a step-up value of approximately \$4,402.

(d) The fair value of property, plant and equipment is estimated at \$2,641. These assets primarily consist of manufacturing equipment, test equipment, vehicles, and office and plant fixtures. Their estimated useful lives range from 2 to 13 years.

(e) Intangible assets consist of:

	Estimated fair value	Estimated average useful lives	Annual amortization
Customer relationships	\$ 12,300	12	\$ 1,025
Technology and know-how	8,000	7	1,143
Tradenname	1,700	10	170
Total	<u>\$ 22,000</u>		<u>\$ 2,338</u>

The preliminary fair values were determined primarily using an income method, which utilizes financial forecasts of expected future cash flows. Some of the more significant assumptions used in the development of intangible asset values include: the amount and timing of projected future cash flows, the discount rate selected to measure the risks inherent in future cash flows, and the assessment of the asset's life cycle and competitive trends impacting the asset, as well as other factors.

(f) This represents the net deferred tax liability associated with the fair value of assets acquired and liabilities assumed.

(g) The Company is not able to deduct any of the goodwill for tax purposes.

The fair values presented above are preliminary until the final purchase price consideration is determined and the Company completes its work with the use of a third party valuation firm. These values are subject to change. Any changes to the initial estimates of the fair value of assets and liabilities will impact residual goodwill and may affect future earnings.

As part of the acquisition, the Company entered into a fifteen-year lease with Het Komt Vast Goed B.V., the owner of the real property where Veth Propulsion's operations are located. Under this lease, the Company pays an annual market-based rent of \$1,249, with provisions for increasing rent based on the prevailing consumer price index.

Summary Financial Information

The following table presents financial information for Veth Propulsion that is included in the Company's consolidated statement of operations for the quarter and two quarters ended December 28, 2018:

	Quarter Ended December 28, 2018	Two Quarters Ended December 28, 2018
Net sales	\$ 14,083	\$ 27,436
Gross profit (a)	3,706	5,892
Operating income (loss) (b)	681	(40)
Net income (loss) attributable to Twin Disc	376	(575)

(a) Gross profit includes the non-recurring charge for the step-up of inventories acquired of \$1,002 and \$2,173 for the quarter and two quarters ended December 28, 2018, respectively.

(b) In addition to (a), operating income (loss) includes the depreciation of property, plant and equipment and amortization of intangible assets acquired of \$647 and \$1,268 for the quarter and two quarters ended December 28, 2018, respectively. Operating income (loss) also includes one-time transaction charges related to the acquisition of \$256 and \$460 for the quarter and two quarters ended December 28, 2018, respectively.

The following table presents unaudited supplemental pro forma information as if the acquisition of Veth Propulsion had occurred on July 1, 2017.

	Quarter Ended December 29, 2017	Two Quarters Ended December 29, 2017
Net sales	\$ 71,191	\$ 130,902
Gross profit (a)	21,420	38,609
Net loss attributable to Twin Disc (b)	(4,790)	(2,075)
Basic loss per share attributable to Twin Disc common shareholders	\$ (0.42)	\$ (0.18)
Diluted loss per share attributable to Twin Disc common shareholders	\$ (0.42)	\$ (0.18)
Weighted average number of common shares outstanding:		
Basic	11,297	11,278
Diluted	11,297	11,278

- (a) Gross profit includes the amortization of the step-up of inventories of \$1,179 and \$2,358 for the quarter and two quarters ended December 29, 2017, respectively.
- (b) In addition to (a), this includes the amortization of intangible assets acquired and interest expense on borrowings under the Credit Agreement net of other expenses, amounting to \$1,136 and \$2,271, before tax, for the quarter and two quarters ended December 29, 2017, respectively.

C. Revenue Recognition

Revenue from contracts with customers is recognized using a five-step model consisting of the following: (1) identify the contract with a customer; (2) identify the performance obligations in the contract; (3) determine the transaction price; (4) allocate the transaction price to the performance obligations in the contract; and (5) recognize revenue when (or as) the Company satisfies a performance obligation. Performance obligations are satisfied when the Company transfers control of a good or service to a customer, which can occur over time or at a point in time. The amount of revenue recognized is based on the consideration to which the Company expects to be entitled in exchange for those goods or services, including the expected value of variable consideration. The customer's ability and intent to pay the transaction price is assessed in determining whether a contract exists with the customer. If collectibility of substantially all of the consideration in a contract is not probable, consideration received is not recognized as revenue unless the consideration is nonrefundable and the Company no longer has an obligation to transfer additional goods or services to the customer or collectibility becomes probable.

The Company designs, manufactures and sells marine and heavy duty off highway power transmission equipment. Products offered include: marine transmissions, azimuth drives, surface drives, propellers and boat management systems as well as power-shift transmissions, hydraulic torque converters, power take-offs, industrial clutches and controls systems. The Company sells its products to customers primarily in the commercial, pleasure craft, and military marine markets as well as in the energy and natural resources, government and industrial markets. The Company's worldwide sales to both domestic and foreign customers are transacted through a direct sales force and a distributor network.

Identify contract with customer:

The Company gathered customer contracts and representative customer purchase orders of its various locations. The Company's customers consist of distributors and direct end-users. With regard to distributors, the Company generally has written distribution agreements which describe the terms of the distribution arrangement, such as the product range, the sales territory, product pricing, sales support, payment and returns policy, etc. Customer contracts are generally in the form of acknowledged purchase orders. Services to be rendered, as part of the delivery of those products, are also generally specified. Such services include installation reviews and technical commissioning.

Performance obligations:

The Company's performance obligation as it relates to the delivery of goods is straightforward; the recognition of revenue is generally driven by shipment date and the terms of sale. As it relates to the Company's service obligations, the Company determined that installation reviews, shift development and technical commissioning are separate and distinct performance obligations.

Transaction price:

The Company considers the invoice price as the transaction price.

Allocation of transaction price:

The Company determined that the most relevant allocation method for its service obligations is to apply the expected cost plus appropriate margin. This is the Company's current practice of billing for repairs, overhaul, and other product service related time incurred by its technicians.

Recognize revenue:

Revenue is recognized upon transfer of control of the products to the customer. For installation review, shift development, and technical commissioning services, revenue is recognized upon completion of the service.

Disaggregated revenue:

The following table presents details deemed most relevant to the users of the financial statements for the quarter and two quarters ended December 28, 2018.

Net sales by product group for the quarter ended December 28, 2018 is summarized as follows:

	Manufacturing	Distribution	Elimination of Intercompany Sales	Total
Industrial	\$ 8,253	\$ 2,580	\$ (1,717)	\$ 9,116
Land-based transmissions	30,309	6,846	(7,377)	29,778
Marine and propulsion systems	32,412	16,307	(10,863)	37,856
Other	12	1,357	(12)	1,357
Total	<u>\$ 70,986</u>	<u>\$ 27,090</u>	<u>\$ (19,969)</u>	<u>\$ 78,107</u>

Net sales by product group for the two quarters ended December 28, 2018 is summarized as follows:

	Manufacturing	Distribution	Elimination of Intercompany Sales	Total
Industrial	\$ 14,734	\$ 3,977	\$ (2,549)	\$ 16,162
Land-based transmissions	59,742	12,456	(12,784)	59,414
Marine and propulsion systems	65,388	30,464	(21,721)	74,131
Other	35	3,113	(59)	3,089
Total	<u>\$ 139,899</u>	<u>\$ 50,010</u>	<u>\$ (37,113)</u>	<u>\$ 152,796</u>

Contract assets/liabilities:

There are no significant balances of contract assets or liabilities as of December 28, 2018.

D. Inventories

The major classes of inventories were as follows:

	December 28, 2018	June 30, 2018
Inventories:		
Finished parts	\$ 56,796	\$ 49,332
Work in process	26,723	13,183
Raw materials	46,715	21,486
	<u>\$ 130,234</u>	<u>\$ 84,001</u>

E. Warranty

The Company engages in extensive product quality programs and processes, including actively monitoring and evaluating the quality of its suppliers. However, its warranty obligation is affected by product failure rates, the number of units affected by the failure and the expense involved in satisfactorily addressing the situation. The warranty reserve is established based on our best estimate of the amounts necessary to settle future and existing claims on products sold as of the balance sheet date. When evaluating the adequacy of the reserve for warranty costs, management takes into consideration the term of the warranty coverage, historical claim rates and costs of repair, knowledge of the type and volume of new products and economic trends. While we believe the warranty reserve is adequate and that the judgment applied is appropriate, such amounts estimated to be due and payable in the future could differ materially from what actually transpires. The following is a listing of the activity in the warranty reserve for the quarter and two quarters ended December 28, 2018 and December 29, 2017:

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Reserve balance, beginning of period	\$ 4,667	\$ 2,326	\$ 4,407	\$ 2,062
Current period expense and adjustments	128	723	857	1,381
Payments or credits to customers	(926)	(589)	(1,946)	(1,022)
Acquisition	-	-	557	-
Translation	(26)	7	(32)	46
Reserve balance, end of period	<u>\$ 3,843</u>	<u>\$ 2,467</u>	<u>\$ 3,843</u>	<u>\$ 2,467</u>

The current portion of the warranty accrual (\$3,309 and \$2,032 as of December 28, 2018 and December 29, 2017, respectively) is reflected in accrued liabilities, while the long-term portion (\$534 and \$435 as of December 28, 2018 and December 29, 2017, respectively) is included in other long-term liabilities on the consolidated balance sheets.

F. Contingencies

The Company is involved in litigation of which the ultimate outcome and liability to the Company, if any, is not presently determinable. Management believes that final disposition of such litigation will not have a material impact on the Company's results of operations, financial position or cash flows.

G. Business Segments

The Company and its subsidiaries are engaged in the manufacture and sale of marine and heavy-duty off-highway power transmission equipment. Principal products include marine transmissions, azimuth drives, surface drives, propellers and boat management systems, as well as power-shift transmissions, hydraulic torque converters, power take-offs, industrial clutches and controls systems. The Company sells to both domestic and foreign customers in a variety of market areas, principally pleasure craft, commercial and military marine markets, as well as in the energy and natural resources, government and industrial markets.

The Company has two reportable segments: manufacturing and distribution. Its segment structure reflects the way management makes operating decisions and manages the growth and profitability of the business. It also corresponds with management's approach of allocating resources and assessing the performance of its segments. The accounting practices of the segments are the same as those described in the summary of significant accounting policies. Transfers among segments are at established inter-company selling prices. Management evaluates the performance of its segments based on net income.

Information about the Company's segments is summarized as follows:

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Net sales				
Manufacturing segment sales	\$ 70,986	\$ 48,580	\$ 139,899	\$ 88,453
Distribution segment sales	27,090	21,336	50,010	38,998
Inter/Intra segment elimination – manufacturing	(14,931)	(9,489)	(29,681)	(19,821)
Inter/Intra segment elimination – distribution	(5,038)	(3,881)	(7,432)	(6,019)
	<u>\$ 78,107</u>	<u>\$ 56,546</u>	<u>\$ 152,796</u>	<u>\$ 101,611</u>
Net income (loss) attributable to Twin Disc				
Manufacturing segment net income	\$ 7,924	\$ 123	\$ 15,159	\$ 5,190
Distribution segment net income	569	387	1,434	1,056
Corporate and eliminations	(4,420)	(4,623)	(9,658)	(6,968)
	<u>\$ 4,073</u>	<u>\$ (4,113)</u>	<u>\$ 6,935</u>	<u>\$ (722)</u>
Assets				
	December 28, 2018		June 30, 2018	
Manufacturing segment assets	\$ 380,928		\$ 266,417	
Distribution segment assets	59,382		52,230	
Corporate assets and elimination of intercompany assets	(89,480)		(77,407)	
	<u>\$ 350,830</u>		<u>\$ 241,240</u>	

H. Stock-Based Compensation

Performance Stock Awards (“PSA”)

During the first half of fiscal 2019 and 2018, the Company granted a target number of 42.3 and 54.9 PSAs, respectively, to various employees of the Company, including executive officers. The fiscal 2019 PSAs will vest if the Company achieves performance-based target objectives relating to average return on invested capital, average annual sales and average annual Earnings Per Share (“EPS”) (as defined in the PSA Grant Agreement), in the cumulative three fiscal year period ending June 30, 2021. These PSAs are subject to adjustment if the Company's return on invested capital, net sales, and EPS for the period falls below or exceeds the specified target objective, and the maximum number of performance shares that can be awarded if the target objective is exceeded is 63.4. Based upon favorable actual results to date, the Company is currently accruing compensation expense for these PSAs.

The fiscal 2018 PSAs will vest if the Company achieves performance-based target objectives relating to average return on invested capital, average annual sales and average annual EPS (as defined in the PSA Grant Agreement), in the cumulative three fiscal year period ending June 30, 2020. These PSAs are subject to adjustment if the Company's return on invested capital, net sales, and EPS for the period falls below or exceeds the specified target objective, and the maximum number of performance shares that can be awarded if the target objective is exceeded is 69.2. Based upon favorable actual results to date, the Company is currently accruing compensation expense for these PSAs.

There were 188.0 and 224.9 unvested PSAs outstanding at December 28, 2018 and December 29, 2017, respectively. The fair value of the PSAs (on the date of grant) is expensed over the performance period for the shares that are expected to ultimately vest. Compensation expense of \$242 and \$121 was recognized for the quarters ended December 28, 2018 and December 29, 2017, respectively, related to PSAs. Compensation expense of \$788 and \$136 was recognized for the two quarters ended December 28, 2018 and December 29, 2017, respectively, related to PSAs. The weighted average grant date fair value of the unvested awards at December 28, 2018 was \$15.02. At December 28, 2018, the Company had \$1,522 of unrecognized compensation expense related to the unvested shares that would vest if the specified target objective was achieved for the fiscal 2019, 2018 and 2017 awards. The total fair value of PSAs vested as of December 28, 2018 and December 29, 2017 was \$0.

Restricted Stock Awards (“RS”)

The Company has unvested RS awards outstanding that will vest if certain service conditions are fulfilled. The fair value of the RS grants is recorded as compensation expense over the vesting period, which is generally 1 to 3 years. During the first half of fiscal 2019 and 2018, the Company granted 35.6 and 85.3 service based restricted shares, respectively, to employees and non-employee directors. There were 185.3 and 272.4 unvested shares outstanding at December 28, 2018 and December 29, 2017, respectively. A total of 2.8 shares of restricted stock were forfeited during the two quarters ended December 28, 2018. There were no shares of restricted stock forfeited during the two quarters ended December 29, 2017. Compensation expense of \$266 and \$464 was recognized for the quarters ended December 28, 2018 and December 29, 2017, respectively. Compensation expense of \$516 and \$927 was recognized for the two quarters ended December 28, 2018 and December 29, 2017, respectively. The total fair value of restricted stock grants vested as of December 28, 2018 and December 29, 2017 was \$2,102 and \$1,758, respectively. As of December 28, 2018, the Company had \$1,217 of unrecognized compensation expense related to restricted stock which will be recognized over the next three years.

Restricted Stock Unit Awards (“RSU”)

Under the 2018 Long Term Incentive Plan, the Company has been authorized to issue RSUs. The RSUs entitle the employee to shares of common stock of the Company if the employee remains employed by the Company through a specified date, generally three years from the date of grant. During the first half of fiscal 2019, the Company granted 38.0 RSUs to various employees of the Company, including executive officers. The fair value of the RSUs (on the date of grant) is recorded as compensation expense over the vesting period. There were 38.0 unvested RSUs outstanding at December 28, 2018. Compensation expense of \$82 was recognized for the quarter ended December 28, 2018. Compensation expense of \$136 was recognized for the two quarters ended December 28, 2018. The weighted average grant date fair value of the unvested awards at December 28, 2018 was \$25.77. As of December 28, 2018, the Company had \$842 of unrecognized compensation expense related to restricted stock which will be recognized over the next three years.

I. Pension and Other Postretirement Benefit Plans

The Company has non-contributory, qualified defined benefit plans covering substantially all domestic employees hired prior to October 1, 2003 and certain foreign employees. Additionally, the Company provides health care and life insurance benefits for certain domestic retirees. The components of the net periodic benefit cost for the defined benefit pension plans and the other postretirement benefit plan are as follows:

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Pension Benefits:				
Service cost	\$ 251	\$ 241	\$ 497	\$ 503
Interest cost	1,083	1,062	2,175	2,136
Expected return on plan assets	(1,333)	(1,516)	(2,664)	(3,041)
Amortization of transition obligation	9	9	17	18
Amortization of prior service cost	1	1	2	2
Amortization of actuarial net loss	678	759	1,355	1,518
Net periodic benefit cost	<u>\$ 689</u>	<u>\$ 556</u>	<u>\$ 1,382</u>	<u>\$ 1,136</u>
Postretirement Benefits:				
Service cost	\$ 5	\$ 5	\$ 9	\$ 10
Interest cost	76	77	152	169
Amortization of actuarial net loss	(69)	(59)	(137)	(56)
Net periodic benefit cost	<u>\$ 12</u>	<u>\$ 23</u>	<u>\$ 24</u>	<u>\$ 123</u>

The Company expects to contribute approximately \$2,382 to its pension plans in fiscal 2019. As of December 28, 2018, the amount of \$1,429 in contributions has been made.

The Company has reclassified \$478 (net of \$146 in taxes) of benefit plan adjustments from accumulated other comprehensive loss during the quarter ended December 28, 2018, and \$1,734 (net of \$674 in taxes) during the quarter ended December 29, 2017. The Company has reclassified \$949 (net of \$292 in taxes) of benefit plan adjustments from accumulated other comprehensive loss during the two quarters ended December 28, 2018, and \$2,208 (net of \$952 in taxes) during the two quarters ended December 29, 2017. These reclassifications are included in the computation of net periodic benefit cost.

J. Income Taxes

On December 22, 2017, the Tax Cuts and Jobs Act (the “Tax Act”) was signed into law in the United States. The Tax Act, among other provisions, introduced changes in the U.S corporate tax rate, business related exclusions, deductions, and credits, and has tax consequences for companies that operate internationally. Most of the changes introduced in the Tax Act were effective beginning on January 1, 2018; however, as the Company has a fiscal year end of June 30, the effective dates for the Company are various and different.

For the two quarters ended December 28, 2018 and December 29, 2017, the Company's effective income tax rate was 25.1% and 204.0% respectively. In the prior year, increased and sustained profitability in a foreign jurisdiction resulted in the release of a \$3,803 valuation allowance, which decreased the effective tax rate by 611.5%. In the prior year, the impact of the Tax Act was reflected resulting in an increase to tax expense of \$4,526, which increased the effective tax rate by 727.9%. Foreign tax reform also reflected in the prior year increased tax expense and by \$431 and resulted in an increase in the effective tax rate of 69.3%.

Within the calculation of the Company's annual effective tax rate, the Company has used assumptions and estimates that may change as a result of future guidance, interpretation, and rule-making from the Internal Revenue Service, the SEC, and the FASB and/or various other taxing jurisdictions. Further, the Company anticipates that the state jurisdictions will continue to determine and announce their conformity to the Tax Act, which could have an impact on the annual effective tax rate.

The permanent reduction to the U.S. federal corporate income tax rate from 35% to 21% was effective January 1, 2018. The effective tax rate in the current quarter of fiscal 2019 reflects the reduction in the statutory federal income tax rate to 21%.

The deemed repatriation transition tax is a tax on previously untaxed accumulated and current earnings and profits of certain foreign subsidiaries. To determine the amount of the transition tax, the Company calculated the amount of post-1986 earnings and profits for all foreign subsidiaries as well as the amount of non-U.S. income taxes paid on such earnings. The Company calculated the amount of the transition tax and determined it to be zero based on overall net historical negative earnings and profits.

As no new material information nor material interpretational changes have developed, the Company's previous calculation reflected in fiscal 2018 has not changed. With the enactment of the transition tax, any future dividends repatriated would benefit from the 100% Dividends Received Deduction. The company reaffirms its position that the earnings of certain foreign subsidiaries remain permanently reinvested. An analysis was also completed to verify the future utilization of tax attributes and it was determined that full utilization would be realized and no valuation allowance was required. The Company has completed a provisional analysis of the global intangible low taxed income ("GILTI") provisions and anticipates no impact to the financial statements due to the offset of the inclusion with the associated foreign tax credits. A provisional foreign-derived intangible income ("FDII") calculation was completed and the benefit has been reflected in the quarterly provision. The Company has provisionally elected to treat GILTI as a period expense; however, the Company has not made a final accounting policy decision with respect to this item. A provisional analysis of the new base erosion anti-abuse tax ("BEAT") rules has been completed and the Company does not meet the minimum thresholds at this time and is therefore not subject to this tax. These estimates may be impacted by actual future data, additional guidance or other unforeseen circumstances.

Under ASC Topic 740, Income Taxes, a company is generally required to recognize the effect of changes in tax laws in its financial statements in the period in which the legislation is enacted. U.S. income tax laws are deemed to be effective on the date the president signs tax legislation. The president signed the Tax Act on December 22, 2017. As such, the Company is required to recognize the related impacts to the financial statements in the quarter ended December 29, 2017. In acknowledgment of the substantial changes incorporated in the Tax Act, in conjunction with the timing of the enactment being just weeks before the majority of the provisions became effective, the SEC staff issued Staff Accounting Bulletin ("SAB") 118 to provide certain guidance in determining the accounting for income tax effects of the legislation in the accounting period of enactment as well as provide a measurement period (similar to that used when accounting for business combinations) within which to finalize and reflect such final effects associated with the Tax Act. Further, SAB 118 summarizes a three-step approach to be applied each reporting period within the overall measurement period: (1) amounts should be reflected in the period including the date of enactment for those items which are deemed to be complete (i.e. all information is available and appropriately analyzed to determine the applicable financial statement impact), (2) to the extent the effects of certain changes due to the Tax Act for which the accounting is not deemed complete but for which a reasonable estimate can be determined, such provisional amount(s) should be reflected in the period so determined and adjusted in subsequent periods as such effects are finalized and (3) to the extent a reasonable estimate cannot be determined for a specific effect of the tax law change associated with the Tax Act, no provisional amount should be recorded but rather, continue to apply ASC 740 based upon the tax law in effect prior to the enactment of the Tax Act. Such measurement period is deemed to end when all necessary information has been obtained, prepared and analyzed such that a final accounting determination can be concluded, but in no event should the period extend beyond one year. If a company does not have the necessary information available, prepared or analyzed for certain income tax effects of the Tax Act, SAB 118 allows a company to report provisional numbers and adjust those amounts during the measurement period not to extend beyond one year. For the two quarters ended December 28, 2018, the Company has recorded all known and estimable impacts of the Tax Act that are effective for fiscal year 2019. Future adjustments to the provisional numbers will be recorded as discrete adjustments to income tax expense in the period in which those adjustments become estimable and/or are finalized.

The Company maintains valuation allowances when it is more likely than not that all or a portion of a deferred tax asset will not be realized. Changes in valuation allowances from period to period are included in the tax provision in the period of change. In determining whether a valuation allowance is required, the Company takes into account such factors as prior earnings history, expected future earnings, carry-back and carry-forward periods, and tax strategies that could potentially enhance the likelihood of realization of a deferred tax asset. In addition, all other available positive and negative evidence is taken into consideration, including all new impacts of tax reform. The company has evaluated the realizability of the net deferred tax assets related to its operations and based on this evaluation management has concluded that no valuation allowances are required.

Accounting policies for interim reporting require the Company to adjust its effective tax rate each quarter to be consistent with the estimated annual effective tax rate. Under this effective tax rate methodology, the Company applies an estimated annual income tax rate to its year-to-date ordinary earnings to derive its income tax provision each quarter.

The Company has approximately \$1,092 of unrecognized tax benefits, including related interest and penalties, as of December 28, 2018, which, if recognized, would favorably impact the effective tax rate. There was no significant change in the total unrecognized tax benefits due to the settlement of audits, the expiration of statutes of limitations or for other items during the two quarters ended December 28, 2018. It appears possible that the amount of unrecognized tax benefits could change in the next twelve months due to on-going audit activity.

Annually, the Company files income tax returns in various taxing jurisdictions inside and outside the United States. In general, the tax years that remain subject to examination are 2011 through 2018 for the major operations in Italy, Canada, Belgium, and Japan. The tax years open to examination in the U.S. are for years subsequent to fiscal 2015. The state of Wisconsin income tax audit remains ongoing for the fiscal years 2010 through 2013. It is reasonably possible that other audit cycles will be completed during fiscal 2019.

K. Goodwill and Other Intangibles

Goodwill represents the excess of the consideration transferred net of the acquisition-date fair values of the identifiable assets acquired and the liabilities assumed.

The Company reviews goodwill for impairment on a reporting unit basis annually as of the end of the fiscal year, and whenever events or circumstances (“triggering events”) indicate that the carrying value of goodwill may not be recoverable. The Company monitors for interim triggering events on an ongoing basis. Such triggering events include unfavorable operating results and macroeconomic trends.

The fair value of reporting units is primarily driven by projected growth rates and operating results under the income approach using a discounted cash flow model, which applies an appropriate market-participant discount rate, and consideration of other market approach data from guideline public companies. If declining actual operating results or future operating results become indicative that the fair value of the Company’s reporting units has declined below their carrying values, an interim goodwill impairment test may need to be performed and may result in a non-cash goodwill impairment charge.

On July 2, 2018, as discussed in Note B, the Company acquired goodwill in the estimated amount of \$25,679 and intangible assets in the estimated amount of \$22,000 as part of the acquisition of Veth Propulsion Holding BV. These estimates are preliminary and are pending completion of several elements, including the final determination of the purchase price adjustment, finalization of an independent valuation of fair value of the assets acquired and liabilities assumed and final review by the Company’s management. The final determination of the purchase price, fair values and resulting goodwill may differ significantly from what is currently reflected.

As of December 28, 2018, changes in the carrying amount of goodwill is summarized as follows:

	Net Book Value Rollforward			By Reporting Unit	
	Gross Carrying Amount	Accumulated Amortization / Impairment	Net Book Value	European Industrial	European Propulsion
Balance at June 30, 2018	\$ 16,514	\$ (13,822)	\$ 2,692	\$ 2,692	\$ -
Acquisition	25,679	-	25,679	-	25,679
Translation adjustment	(542)	-	(542)	(75)	(467)
Balance at December 28, 2018	\$ 41,651	\$ (13,822)	\$ 27,829	\$ 2,617	\$ 25,212

For the quarter ended December 28, 2018, the Company performed a review of potential triggering events, and concluded there were no triggering events that indicated that the fair value of its European Industrial reporting unit had not more likely than not declined to below its carrying value at December 28, 2018. The Company will perform its annual impairment test for this reporting unit as of June 30, 2019.

As of December 28, 2018, the following acquired intangible assets have definite useful lives and are subject to amortization:

	Net Book Value Rollforward			Net Book Value By Asset Type			
	Gross Carrying Amount	Accumulated Amortization / Impairment	Net Book Value	Trade Name	Customer Relationships	Technology Know-how	Other
Balance at June 30, 2018	\$ 13,485	\$ (11,781)	\$ 1,704	\$ 1,288	\$ -	\$ -	\$ 416
Acquisition	22,000	-	22,000	1,700	12,300	8,000	-
Other additions	138	-	138	-	-	-	138
Amortization	-	(1,249)	(1,249)	(127)	(506)	(564)	(52)
Translation adjustment	(431)	-	(431)	(66)	(221)	(143)	(1)
Balance at December 28, 2018	\$ 35,192	\$ (13,030)	\$ 22,162	\$ 2,795	\$ 11,573	\$ 7,293	\$ 501

Other intangibles consist of certain amortizable acquisition costs, proprietary technology, computer software, licensing agreements and certain customer relationships.

The weighted average remaining useful life of the intangible assets included in the table above is approximately 10 years.

Intangible amortization expense was \$583 and \$45 for the quarters ended December 28, 2018, and December 29, 2017, respectively. Intangible amortization expense was \$1,249 and \$89 for the two quarters ended December 28, 2018, and December 29, 2017, respectively. Estimated intangible amortization expense for the remainder of fiscal 2019 and each of the next five fiscal years is as follows:

Fiscal Year	
2019	\$ 1,267
2020	2,534
2021	2,488
2022	2,446
2023	2,439
2024	2,409

The gross carrying amount of the Company's intangible assets that have indefinite lives and are not subject to amortization as of December 28, 2018 and June 30, 2018 was \$200 and \$202, respectively. These assets are comprised of acquired trade names.

L. Long-term Debt

On June 29, 2018, the Company entered into a new credit agreement (the "Credit Agreement") with BMO Harris Bank N.A. ("BMO") that provided for the assignment and assumption of the previously existing loans between the Company and Bank of Montreal (the "2016 Credit Agreement") and subsequent amendments into a term loan (the "Term Loan") and revolving credit loans (each a "Revolving Loan" and, collectively, the "Revolving Loans," and, together with the Term Loan, the "Loans"). Pursuant to the Credit Agreement, BMO agreed to make the Term Loan to the Company in a principal amount not to exceed \$35,000 and the Company may, from time to time prior to the maturity date, enter into Revolving Loans in amounts not to exceed, in the aggregate, \$50,000 (the "Revolving Credit Commitment"). The Credit Agreement also allows the Company to obtain Letters of Credit from BMO, which if drawn upon by the beneficiary thereof and paid by BMO, would become Revolving Loans.

Borrowings under the Credit Agreement are secured by substantially all of the Company's personal property, including accounts receivable, inventory, machinery and equipment, and intellectual property, and the personal property of Mill-Log Equipment Co., Inc. ("Mill-Log"), a wholly-owned domestic subsidiary of the Company. The Company has also pledged 100% of its equity interests in certain domestic subsidiaries and 65% of its equity interests in certain foreign subsidiaries. To effect these security interests, the Company and Mill-Log entered into various amendments and assignment agreements that consent to the assignment to BMO of certain agreements previously entered into between the Company and Mill-Log with Bank of Montreal in connection with the 2016 Credit Agreement. The Company also entered into a Collateral Assignment of Rights under Purchase Agreement for its acquisition of Veth Propulsion described in Note B.

On July 2, 2018, in connection with the acquisition of Veth Propulsion, as described in Note B, the Company drew a total of \$60,729 of additional borrowings on the new credit facility, consisting of a \$35,000 Term Loan payable and revolver borrowings of \$25,729.

On September 25, 2018, the Company used the proceeds of a stock offering (see Note M) of \$32,310 to partially pay down the Term Loan and Revolving Loans.

Long-term debt at December 28, 2018 and June 30, 2018 consisted of the following:

	December 28, 2018	June 30, 2018
Revolving loans	\$ 35,815	\$ 4,787
Term loan (due January 2020)	10,837	-
Other	34	37
Total long-term debt	<u>\$ 46,686</u>	<u>\$ 4,824</u>

During the two quarters ended December 28, 2018, the average interest rates paid on loans were as follows: 5.20% on the Term Loan, 2.25% on the euro revolver, and 4.45% on the USD revolver.

As of December 28, 2018, the Company's borrowing capacity under the terms of the Credit Agreement was \$50,000, and the Company had approximately \$14,185 of available borrowings. In addition to the Credit Agreement, the Company has established unsecured lines of credit that are used from time to time to secure certain performance obligations by the Company.

The Company's borrowings described above approximates fair value at December 28, 2018 and June 30, 2018. If measured at fair value in the financial statements, long-term debt (including the current portion) would be classified as Level 2 in the fair value hierarchy.

M. Shareholders' Equity

The Company completed the sale of 1,533.3 shares of its common stock through a registered offering which closed on September 25, 2018, at a price to the public of \$22.50 per share. The net proceeds received by the Company and after underwriting expenses of \$2,070 and offering expenses of \$220, were \$32,210 and were recorded as paid-in capital as of December 28, 2018. The proceeds were used to partially pay down the Term Loan and Revolving Loans (see Note L).

The Company, from time to time, makes open market purchases of its common stock under authorizations given to it by the Board of Directors, of which 315.0 shares as of December 28, 2018 remain authorized for purchase. The Company did not make any open market purchases of its shares during the quarters ended December 28, 2018 and December 29, 2017.

The following is a reconciliation of the Company's equity balances for the first two fiscal quarters of 2019 and 2018:

	Twin Disc, Inc. Shareholders' Equity					
	Common Stock	Retained Earnings	Accumulated Other Comprehensive Income (Loss)	Treasury Stock	Non-Controlling Interest	Total Equity
Balance, June 30, 2018	\$ 11,570	\$ 178,896	\$ (23,792)	\$ (23,677)	\$ 619	\$ 143,616
Net income		2,862			41	2,903
Translation adjustments			(536)		(25)	(561)
Benefit plan adjustments, net of tax			471			471
Release stranded tax effects		6,903	(6,903)			-
Cash dividends					(115)	(115)
Compensation expense	850					850
Common stock issued, net	32,210					32,210
Shares acquired, net	(586)			(328)		(914)
Balance, September 28, 2018	44,044	188,661	(30,760)	(24,005)	520	178,460
Net income		4,073			6	4,079
Translation adjustments			(1,773)		(13)	(1,786)
Benefit plan adjustments, net of tax			478			478
Cash dividends						-
Compensation expense	590					590
Shares (acquired) issued, net	(497)			520		23
Balance, December 28, 2018	\$ 44,137	\$ 192,734	\$ (32,055)	\$ (23,485)	\$ 513	\$ 181,844

	Twin Disc, Inc. Shareholders' Equity					
	Common Stock	Retained Earnings	Accumulated Other Comprehensive Income (Loss)	Treasury Stock	Non-Controlling Interest	Total Equity
Balance, June 30, 2017	\$ 10,429	\$ 169,368	\$ (32,671)	\$ (24,205)	\$ 646	\$ 123,567
Net income		3,391			13	3,404
Translation adjustments			2,547		(6)	2,541
Benefit plan adjustments, net of tax			474			474
Cash dividends					(172)	(172)
Compensation expense	479					479
Shares (acquired) issued, net	(1,030)			817		(213)
Balance, September 29, 2017	9,878	172,759	(29,650)	(23,388)	481	130,080
Net (loss) income		(4,113)			63	(4,050)
Translation adjustments			489		(1)	488
Benefit plan adjustments, net of tax			1,734			1,734
Cash dividends						-
Compensation expense	584					584
Shares (acquired) issued, net	(376)			189		(187)
Balance, December 29, 2017	\$ 10,086	\$ 168,646	\$ (27,427)	\$ (23,199)	\$ 543	\$ 128,649

Reconciliations for the changes in accumulated other comprehensive income (loss), net of tax, by component for the quarters ended September 28, and December 28, 2018, and September 29, and December 29, 2017 are as follows:

	Translation Adjustment	Benefit Plan Adjustment
Balance at June 30, 2018	\$ 7,085	\$ (30,877)
Translation adjustment during the quarter	(536)	-
Release stranded tax effects	-	(6,903)
Amounts reclassified from accumulated other comprehensive income	-	471
Net current period other comprehensive loss	(536)	(6,432)
Balance at September 28, 2018	6,549	(37,309)
Translation adjustment during the quarter	(1,773)	-
Amounts reclassified from accumulated other comprehensive income	-	478
Net current period other comprehensive (loss) income	(1,773)	478
Balance at December 28, 2018	\$ 4,776	\$ (36,831)

	Translation Adjustment	Benefit Plan Adjustment
Balance at June 30, 2017	\$ 6,130	\$ (38,801)
Translation adjustment during the quarter	2,547	-
Amounts reclassified from accumulated other comprehensive income	-	474
Net current period other comprehensive income	2,547	474
Balance at September 29, 2017	8,677	(38,327)
Translation adjustment during the quarter	489	-
Other comprehensive income before reclassifications	-	1,695
Amounts reclassified from accumulated other comprehensive income	-	39
Net current period other comprehensive income	489	1,734
Balance at December 29, 2017	\$ 9,166	\$ (36,593)

Reconciliation for the changes in benefit plan adjustments, net of tax for the quarter and two quarters ended December 28, 2018 are as follows:

	Amount Reclassified Quarter Ended December 28, 2018	Amount Reclassified Two Quarters Ended December 28, 2018
Changes in benefit plan items		
Actuarial losses	\$ 614 (a)	\$ 1,222 (a)
Transition asset and prior service benefit	10 (a)	19 (a)
Total amortization	624	1,241
Income taxes	146	292
Total reclassification net of tax	\$ 478	\$ 949

Reconciliation for the changes in benefit plan adjustments, net of tax for the quarter and two quarters ended December 29, 2017 is as follows:

	Amount Reclassified Quarter Ended December 29, 2017	Amount Reclassified Two Quarters Ended December 29, 2017
Changes in benefit plan items		
Actuarial losses	\$ 703 (a)	\$ 1,445 (a)
Transition asset and prior service benefit	10 (a)	20 (a)
Total amortization	713	1,465
Other benefit plan adjustments	(1,695)	(1,695)
Income taxes	674	952
Total reclassification net of tax	\$ 1,734	\$ 2,208

- (a) These accumulated other comprehensive income components are included in the computation of net periodic pension cost (see Note I "Pension and Other Postretirement Benefit Plans" for further details).

N. Restructuring of Operations

The Company has implemented various restructuring programs in response to unfavorable macroeconomic trends in certain of the Company's markets since the fourth quarter of fiscal 2015. These programs primarily involved the reduction of workforce in several of the Company's manufacturing locations, under a combination of voluntary and involuntary programs.

During the current year, the Company implemented continued actions to reduce personnel costs in its Belgian operations and reorganize for productivity in its European operations. These actions resulted in restructuring charges of \$434 and \$607 in the quarter and two quarters ended December 28, 2018, respectively. For the quarter and two quarters ended December 29, 2017, restructuring charges of \$831 and \$2,049, respectively, pertained to similar actions to reduce personnel costs in the Company's Belgian operations, as well as costs associated with the India manufacturing operations exit.

Restructuring activities since June 2015 have resulted in the elimination of 175 full-time employees in the manufacturing segment. Accumulated costs to date under these programs within the manufacturing segment through December 28, 2018 were \$9,880.

The following is a rollforward of restructuring activity:

Accrued restructuring liability, June 30, 2018	\$	90
Additions during the year		607
Payments and adjustments during the year		(697)
Accrued restructuring liability, December 28, 2018	\$	<u>-</u>

O. Earnings Per Share

The Company calculates basic earnings per share based upon the weighted average number of common shares outstanding during the period, while the calculation of diluted earnings per share includes the dilutive effect of potential common shares outstanding during the period. The calculation of diluted earnings per share excludes all potential common shares if their inclusion would have an anti-dilutive effect. Certain restricted stock award recipients have a non-forfeitable right to receive dividends declared by the Company, and are therefore included in computing earnings per share pursuant to the two-class method.

The components of basic and diluted earnings per share were as follows:

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Basic:				
Net income (loss)	\$ 4,079	\$ (4,050)	\$ 6,982	\$ (646)
Less: Net earnings attributable to noncontrolling interest	(6)	(63)	(47)	(76)
Less: Undistributed earnings attributable to unvested shares	(53)	-	(105)	-
Net income (loss) available to Twin Disc shareholders	<u>4,020</u>	<u>(4,113)</u>	<u>6,830</u>	<u>(722)</u>
Weighted average shares outstanding - basic	<u>12,909</u>	<u>11,297</u>	<u>12,233</u>	<u>11,278</u>
Basic Income (Loss) Per Share:				
Net income (loss) per share - basic	<u>\$ 0.31</u>	<u>\$ (0.36)</u>	<u>\$ 0.56</u>	<u>\$ (0.06)</u>
Diluted:				
Net income (loss)	\$ 4,079	\$ (4,050)	\$ 6,982	\$ (646)
Less: Net earnings attributable to noncontrolling interest	(6)	(63)	(47)	(76)
Less: Undistributed earnings attributable to unvested shares	(53)	-	(105)	-
Net income (loss) available to Twin Disc shareholders	<u>4,020</u>	<u>(4,113)</u>	<u>6,830</u>	<u>(722)</u>
Weighted average shares outstanding - basic	12,909	11,297	12,233	11,278
Effect of dilutive stock awards	88	-	71	-
Weighted average shares outstanding - diluted	<u>12,997</u>	<u>11,297</u>	<u>12,304</u>	<u>11,278</u>
Diluted Income (Loss) Per Share:				
Net income (loss) per share - diluted	<u>\$ 0.31</u>	<u>\$ (0.36)</u>	<u>\$ 0.56</u>	<u>\$ (0.06)</u>

The following potential common shares were excluded from diluted EPS for the quarter and two quarters ended December 28, 2018 because they were anti-dilutive: 134.4 related to the Company's unvested PSAs, 185.3 related to the Company's unvested RS awards, 33.6 and 16.6, respectively, related to the Company's unvested RSUs, and 3.4 related to outstanding stock options.

The following potential common shares were excluded from diluted EPS for the quarter and two quarters ended December 29, 2017 as the Company reported a net loss: 224.9 related to the Company's unvested PSAs, 272.4 related to the Company's unvested RS awards, and 9.6 related to outstanding stock options.

P. Lease Liabilities

The Company leases certain office and warehouse space, as well as production and office equipment.

The components of lease expense were as follows:

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Finance lease cost:				
Amortization of right-of-use assets	\$ 1	\$ 1	\$ 1	\$ 1
Operating lease cost	850	665	1,730	1,298
Short-term lease cost	12	18	22	51
Variable lease cost	(3)	-	5	2
Total lease cost	860	684	1,758	1,352
Less: Sublease income	(1)	(98)	(17)	(151)
Net lease cost	<u>\$ 859</u>	<u>\$ 586</u>	<u>\$ 1,741</u>	<u>\$ 1,201</u>

Other information related to leases was as follows:

	For the Quarter Ended		For the Two Quarters Ended	
	December 28, 2018	December 29, 2017	December 28, 2018	December 29, 2017
Cash paid for amounts included in the measurement of lease liabilities:				
Operating cash flows from operating leases	\$ 850	\$ 571	\$ 1,725	\$ 1,151
Operating cash flows from finance leases	1	1	2	2
Right-of-use-assets obtained in exchange for lease obligations:				
Operating leases	125	1,390	12,252	1,669
Weighted average remaining lease term (years):				
Operating leases			11.2	6.3
Finance lease			3.5	4.5
Weighted average discount rate:				
Operating leases			7.7%	6.7%
Finance leases			4.0%	4.0%

Approximate future minimum rental commitments under non-cancellable lease as of December 28, 2018 were as follows:

	Operating Leases	Finance Leases
2019	\$ 1,717	\$ 1
2020	3,168	3
2021	2,517	3
2022	2,007	3
2023	1,845	-
Thereafter	13,007	-
Total future lease payments	24,261	10
Less: Amount representing interest	(7,794)	(1)
Present value of future payments	<u>\$ 16,467</u>	<u>\$ 9</u>

The Company had \$16,465 and \$6,527 of operating lease right-of-use assets recorded in property, plant and equipment, net as of December 28, 2018 and June 30, 2018, respectively. The Company had \$16,467 and \$6,527 of operating lease liabilities recorded in lease obligations as of December 28, 2018 and June 30, 2018, respectively.

Item 2. Management Discussion and Analysis

In the financial review that follows, we discuss our results of operations, financial condition and certain other information. This discussion should be read in conjunction with our consolidated financial statements as of December 28, 2018, and related notes, as reported in Item 1 of this Quarterly Report.

Some of the statements in this Quarterly Report on Form 10-Q are “forward-looking statements” as defined in the Private Securities Litigation Reform Act of 1995. Forward-looking statements include the Company’s description of plans and objectives for future operations and assumptions behind those plans. The words “anticipates,” “believes,” “intends,” “estimates,” and “expects,” or similar anticipatory expressions, usually identify forward-looking statements. In addition, goals established by Twin Disc, Incorporated should not be viewed as guarantees or promises of future performance. There can be no assurance the Company will be successful in achieving its goals.

In addition to the assumptions and information referred to specifically in the forward-looking statements, other factors, including but not limited to those factors discussed under Item 1A, Risk Factors, of the Company’s Annual Report filed on Form 10-K for June 30, 2018, as supplemented by the Company’s September 21, 2018 final prospectus supplement, could cause actual results to be materially different from what is expressed or implied in any forward-looking statement.

Recent Events

Acquisition of Veth Propulsion Holding BV

On July 2, 2018, the Company completed the acquisition of 100% of the outstanding common stock of Veth Propulsion Holding BV and its wholly owned subsidiaries (“Veth Propulsion”). Veth Propulsion is a global manufacturer of highly-engineered primary and auxiliary propulsions and propulsion machinery for maritime vessels, including rudder propellers, bow thrusters, generator sets and engine service and repair supplier, based in the Netherlands. These products are complementary to and expand the Company’s current product offerings in the marine and propulsion markets. Under the terms of the stock purchase agreement, the Company paid an aggregate \$60.7 million in cash at closing, which included a base payment plus adjustments for net cash and working capital. This amount is subject to a final determination of working capital adjustments and an earn-out. The maximum earn-out is approximately \$4 million. The earn-out will be paid if the earnings before interest, tax, depreciation and amortization of Veth Propulsion’s fiscal 2018 as defined in the Purchase Agreement (“EBITDA”) exceeds the agreed upon threshold amount. The earn-out is payable in the form of Company stock or cash, and will be determined in April 2019.

The Company financed the payment of the cash consideration through borrowings under a new credit agreement entered into on June 29, 2018 with BMO Harris Bank N.A. This transaction is more fully discussed in Note L in the unaudited condensed consolidated notes to the financial statements and the Financial Condition, Liquidity and Capital Resources section of this discussion.

The unaudited condensed consolidated financial statements and information included in this Quarterly Report on Form 10-Q (“Form 10-Q”) includes the financial results of Veth Propulsion for the period beginning July 2, 2018 through December 28, 2018. The financial results included in this Form 10-Q related to the acquisition method of accounting for the Veth Propulsion acquisition are subject to change as the acquisition method accounting is not yet finalized and dependent upon the final settlement of the purchase price adjustment and finalization of management’s review of certain independent valuations and studies that are still in process. See Note B, “Acquisition of Veth Propulsion Holding BV” for further information about the acquisition and related transactions and the acquisition accounting.

Results of Operations

(In thousands)

	Quarter Ended				Two Quarters Ended			
	December 28, 2018	% of Net Sales	December 29, 2017	% of Net Sales	December 28, 2018	%	December 29, 2017	%
Net sales	\$ 78,107		\$ 56,546		\$ 152,796		\$ 101,611	
Cost of goods sold	52,019		38,323		102,723		69,396	
Gross profit	26,088	33.4%	18,223	32.2%	50,073	32.8%	32,215	31.7%
Marketing, engineering and administrative expenses	18,909	24.2%	15,070	26.7%	37,894	24.8%	28,464	28.0%
Restructuring of operations	434	0.6%	831	1.5%	607	0.4%	2,049	2.0%
Income from operations	<u>\$ 6,745</u>	8.6%	<u>\$ 2,322</u>	4.1%	<u>\$ 11,572</u>	7.6%	<u>\$ 1,702</u>	1.7%

Comparison of the Second Quarter of FY 2019 with the Second Quarter of FY 2018

Net sales for the second quarter increased 38.1%, or \$21.6 million, to \$78.1 million from \$56.5 million in the same period a year ago. The Veth Propulsion acquisition, which closed on July 2, 2018, was the primary contributor to this increase, representing \$14.1 million of this increase. In addition, the Company continues to benefit from improved demand in North America for the Company's oil and gas related products. Global demand for industrial products showed strong growth, increasing 18.0% over the prior year second quarter, as global markets improve and new product introductions begin to gain traction. The Company continues to see strengthening demand in the global commercial marine market, with sales of marine and propulsion products increasing 1.0% over the prior fiscal year second quarter, excluding the impact of the Veth Propulsion acquisition. The European region saw the greatest sales increase, growing by \$9.9 million to 25.9% of total sales compared to 18.3% of total sales in the second quarter of fiscal 2018. This increase is largely attributable to the Veth Propulsion acquisition. Asia Pacific saw growth of \$5.0 million to 15.5% of total sales compared to 12.7% in the prior year, as growth in commercial marine and energy accelerated in the quarter. The North American region also saw growth (\$2.9 million), but the percentage of sales declined to 51.4% in the quarter due to the improvements in the other regions. Currency translation had an unfavorable impact on fiscal 2019 sales compared to the prior year totaling \$0.9 million primarily due to the weakening of the Euro and Australian dollar against the U.S. dollar.

Sales at our manufacturing segment increased 46.1%, or \$22.4 million, versus the same period last year. This increase includes the incremental sales related to the Veth Propulsion acquisition, which totaled \$14.1 million in the quarter. The U.S. manufacturing operation experienced a 26.7%, or \$9.2 million, increase in sales versus the second fiscal quarter of 2018. The primary driver for this increase was improving demand for the Company's oil and gas related products, with increased demand for marine and industrial products also contributing. The Company's Belgian operation saw a marginal increase over the prior year (2.1% or \$0.1 million), largely due to improving North American demand for its marine transmissions. The Company's Italian manufacturing operations, due to some weakness in the European industrial markets, experienced an 11.1% (\$0.6 million) decrease compared to the second quarter of fiscal 2018. The Company's Swiss manufacturing operation, which supplies customized propellers for the global mega yacht and patrol boat markets, experienced a decrease in volume (18.6% or \$0.3 million), primarily due to timing of projects for the global pleasure craft and patrol boat markets.

Our distribution segment experienced a 27.0%, or \$5.8 million, increase in sales compared to the second quarter of fiscal 2018. The Company's Asian distribution operations in Singapore, China and Japan saw a combined 37.4% increase in sales compared to the prior fiscal year's second quarter. This increase reflects improved commercial marine, oil and gas, and patrol craft activity in the region. The Company's distribution operation in the northwest of the United States and southwest of Canada experienced a decrease in sales of 20.2% (\$1.3 million), following a strong second quarter of fiscal 2018 benefiting from renewed oil and gas demand. The Company's distribution operation in Australia, which provides boat accessories, propulsion and marine transmission systems for the pleasure craft market, saw an increase in sales (\$0.6 million or 18.9%) primarily due to a favorable trend in the Australian pleasure craft market.

Gross profit as a percentage of sales increased 120 basis points to 33.4% of sales, compared to 32.2% of sales for the same period last year. This improvement in gross profit was the result of favorable movements due to a positive volume impact (\$4.0 million) and the addition of Veth Propulsion (\$3.7 million), along with a favorable mix impact (\$0.5 million). The current year gross profit percent was negatively impacted by the amortization of a purchase accounting item related to inventory (\$1.0 million), which had an unfavorable impact on the gross profit percent of 129 basis points in the second quarter of fiscal 2019.

For the fiscal 2019 second quarter, marketing, engineering and administrative (ME&A) expenses, as a percentage of sales, were 24.2%, compared to 26.7% for the fiscal 2018 second quarter. ME&A expenses increased \$3.8 million versus the same period last fiscal year. The addition of Veth Propulsion comprises \$3.0 million of this increase, which includes \$0.5 million of purchase accounting related intangible amortization. The remaining increase in ME&A expenses for the quarter is primarily the result of increased professional fees related to a variety of strategic actions (acquisition, debt financing, equity offering, tax planning projects and recruiting fees), along with increased costs for additional salaried heads to drive growth. These increases were partially offset by a reduction in the global bonus expense in the quarter.

The Company incurred \$0.4 million in restructuring charges during the second quarter of fiscal 2019, primarily associated with ongoing cost reduction actions at its European operations. The Company continues to focus on actively managing its cost structure and reducing fixed costs in light of the ongoing market challenges.

Interest expense increased to \$0.4 million in the second quarter of fiscal 2019, compared to just \$0.1 million for the second quarter of the prior fiscal year. This increase reflects the additional debt associated with the acquisition of Veth Propulsion on July 2, 2018.

The favorable movement in other expense (income) compared to the prior year is primarily due to the impact of currency movements related to the euro.

The fiscal 2019 second quarter tax rate of 26.2% reflects the impact of the U.S. Tax Cuts and Jobs Act (the "Tax Act") signed in December 2017. The fiscal 2018 second quarter tax expense reflects the impact of the implementation of the Tax Act, which resulted in a non-cash tax expense of \$4.6 million due to a remeasurement of deferred tax assets and liabilities due to the revised rate structure. Similarly, a rate change in Belgium resulted in a \$0.4 million non-cash tax expense due to the remeasurement of deferred tax assets and liabilities.

Comparison of the First Two Quarters of Fiscal 2019 with the First Two Quarters of Fiscal 2018

Net sales for the first two quarters increased 50.4%, or \$51.2 million, to \$152.8 million from \$101.6 million in the same period a year ago. The acquisition of Veth Propulsion accounts for \$27.4 million, or roughly 54%, of this increase. The remaining increase is primarily the result of strong demand in North America and Asia for the Company's oil and gas related transmission products. The increased demand reflects strength in both forward market and after market activity, and represents a broadening customer base compared to the early stages of market recovery seen in fiscal 2017. Global demand for industrial products also improved significantly (9.3% through the first half), primarily in the second quarter, with contributions from the North American oil and gas market, an improved global economy and new product introductions. Demand for the Company's marine and propulsion systems also saw strong growth compared to the prior year. The sales increases noted were seen across the Company's key geographic regions. Sales to the European region grew by \$18.8 million to 24.6% of total sales (compared to 18.5% in the prior year first half), largely on the impact of the Veth Propulsion acquisition. The growth in energy, industrial and marine demand drove a \$16.0 million increase in North American sales, which represented 52.2% of total sales for the first half of fiscal 2019. Asia Pacific also benefited from improving energy and commercial marine demand, reporting growth of \$10.2 million to represent 16.7% of consolidated sales. Currency translation had an unfavorable impact on fiscal 2019 first half sales compared to the prior year totaling \$1.4 million primarily due to the strengthening of the euro and the Australian and Canadian dollar against the U.S. dollar.

Sales at our manufacturing segment increased 58.2%, or \$51.4 million, versus the same period last year. This increase includes the incremental volume as a result of the Veth Propulsion acquisition (\$27.4 million). In the first half of fiscal 2019, our U.S. manufacturing operation, the largest operation of the Company, experienced a 36.1%, or \$22.4 million, increase in sales versus the first fiscal half of 2018. The primary driver for this increase was continuing strength in demand for the Company's oil and gas related products, along with solid growth in demand for marine and industrial products. The Company's Belgian operation also saw a significant increase over the prior year first half (14.2% or \$1.8 million), largely due to improving North American demand for its marine transmissions. The Company's Italian manufacturing operations, which continued to be hampered by the softness in the European mega yacht and industrial markets, saw a marginal decline compared to the prior year first half with a 3.4% (\$0.3 million) decrease compared to fiscal 2018. The Company's Swiss manufacturing operation, which supplies customized propellers for the global mega yacht and patrol boat markets, experienced a 2.5% improvement (\$0.1 million), primarily due to the timing of projects for the global pleasure craft and patrol boat markets.

Our distribution segment experienced a 28.3%, or \$11.0 million, increase in sales compared to the first half of fiscal 2018. The Company's Asian distribution operations in Singapore, China and Japan saw a combined 43.5% increase in sales compared to the prior fiscal year's first half. This increase reflects improving oil and gas, commercial marine and patrol craft activity in the region. The Company's distribution operation in the northwest United States and southwest Canada experienced a decrease in sales of 10.3% (\$1.1 million). This decrease follows a very strong recovery in oil and gas volume in the first half of fiscal 2018. The Company's distribution operation in Australia, which provides boat accessories, propulsion and marine transmission systems for the pleasure craft market, saw a solid increase in sales (11.4%) primarily due to a favorable trend in the Australian pleasure craft market.

Gross profit as a percentage of sales increased 110 basis points to 32.8% of sales, compared to 31.7% of sales for the same period last year. This improvement is due to a positive volume impact (\$12.1 million) associated with the strong revenue growth through the first half of fiscal 2019, the addition of Veth Propulsion (\$5.3 million) and a favorable mix impact (\$1.2 million).

For the fiscal 2019 first two quarters, marketing, engineering and administrative (ME&A) expenses, as a percentage of sales, were 24.8%, compared to 28.0% for the fiscal 2018 first two quarters. ME&A expenses increased \$9.4 million versus the same period last fiscal year. The increase in ME&A expenses for the period is primarily the result of the addition of Veth Propulsion (\$5.9 million), along with increases related professional fees (\$1.1 million), stock based compensation (\$0.7 million), increased marketing activities (\$0.8 million) and increased salary and travel expense to support growth (\$0.4 million).

The Company incurred \$0.6 million in restructuring charges during the first half of fiscal 2019, primarily associated with cost reduction actions at its European operations. The Company continues to focus on actively managing its cost structure and reducing fixed costs in light of the recent market challenges.

Interest expense increased to \$1.1 million in the first half of fiscal 2019, compared to just \$0.1 million for the comparable period in fiscal 2018. This increase reflects the additional debt associated with the acquisition of Veth Propulsion on July 2, 2018.

The unfavorable movement in other expense (income) compared to the prior year is primarily due to the impact of currency movements related to the euro.

The fiscal 2019 first half effective tax rate was 25.1%, compared to the fiscal 2018 first half rate of 204.0%. The fiscal 2018 rate was impacted by two significant discrete adjustments. During the first quarter of fiscal 2018, the Company recorded a tax benefit of \$3.8 million related to the reversal of a valuation allowance in a certain foreign jurisdiction that had been subject to a full valuation allowance. Improvement in operating results, along with a business reorganization which provided favorable tax planning opportunities, allowed for the reversal of this valuation allowance. During the second quarter of fiscal 2018, in compliance with the new Tax Act, the Company recorded a non-cash tax expense of \$4.6 million, primarily due to a remeasurement of deferred tax assets and liabilities. In addition, a rate change in Belgium resulted in a \$0.4 million non-cash tax expense due to remeasurement of deferred tax assets and liabilities. The mix of earnings by jurisdiction, smaller discrete adjustments and continued operational improvement explain the remaining movement in the Company's effective tax rate.

Financial Condition, Liquidity and Capital Resources

Comparison between December 28, 2018 and June 30, 2018

As of December 28, 2018, the Company had net working capital of \$134.9 million, which represents an increase of \$38.0 million, or 39.2%, from the net working capital of \$96.9 million as of June 30, 2018. Included in this increase is the addition of Veth Propulsion, which comprises \$17.1 million of the overall increase.

Cash increased \$3.4 million to \$18.5 million as of December 28, 2018, versus \$15.2 million as of June 30, 2018. The Veth Propulsion acquisition contributed \$3.3 million of this increase. The majority of the cash as of December 28, 2018 is at the Company's overseas operations in Europe (\$8.5 million including Veth Propulsion) and Asia-Pacific (\$9.5 million).

Trade receivables of \$47.9 million were up \$2.5 million, or approximately 5.4%, when compared to last fiscal year-end. The Veth Propulsion acquisition contributed \$7.2 million to the overall trade receivable balance as of December 28, 2018. The impact of foreign currency translation was to decrease accounts receivable by \$0.4 million versus June 30, 2018. The net remaining increase is driven by volume and the timing of sales within the quarter. As a percent of sales, trade receivables finished at 61.3% in the second quarter of fiscal 2019 compared to 51.7% for the comparable period in fiscal 2018 and 61.6% for the fourth quarter of fiscal 2018.

Inventories increased by \$46.2 million, or 55.0%, versus June 30, 2018 to \$130.2 million. The Veth Propulsion acquisition contributed \$23.9 million to this increase. The impact of foreign currency translation was to decrease inventories by \$1.0 million versus June 30, 2018. The remaining increase was seen primarily at the Company's North American operation, driven by production requirements related primarily to the demand for the Company's products serving the North American oil and gas market. On a consolidated basis, as of December 28, 2018, the Company's backlog of orders to be shipped over the next six months approximates \$137.8 million, compared to \$115.0 million at June 30, 2018 and \$85.1 million at December 29, 2017. The increase versus the end of the prior fiscal year is being experienced at the Company's domestic manufacturing location, along with the addition of Veth Propulsion backlog (\$22.5 million). As a percentage of six-month backlog, inventory has increased from 73% at June 30, 2018 to 95% at December 28, 2018.

Net property, plant and equipment (PP&E) increased \$14.8 million versus June 30, 2018. The primary reason for the increase is the acquisition of Veth Propulsion, which contributed \$9.9 million to the increase from fiscal year end. The remaining increase includes the addition of \$6.5 million in capital expenditures, primarily at the Company's U.S. and Belgian-based manufacturing operations, which was partially offset by depreciation of \$3.3 million. The net remaining increase is due to foreign currency translation effects. In total, the Company expects to invest between \$14 and \$16 million in capital assets in fiscal 2019. These anticipated expenditures reflect the Company's plans to continue investing in modern equipment and facilities, its global sourcing program and new products. The Company continues to review its capital plans based on overall market conditions and availability of capital, and may make changes to its capital plans accordingly. The Company's capital program is focused on modernizing key core manufacturing, assembly and testing processes and improving efficiencies at its facilities around the world.

Accounts payable as of December 28, 2018 of \$35.1 million was up \$5.8 million, or 19.6%, from June 30, 2018. The impact of foreign currency translation was to decrease accounts payable by \$0.3 million versus June 30, 2018. The remaining increase is primarily related to the addition of Veth Propulsion (\$1.1 million), along with the impact of a significant increase in inventory.

Total borrowings and long-term debt as of December 28, 2018 increased by \$41.9 million to \$46.7 million versus \$4.8 million at June 30, 2018. The primary reason for the increase is the acquisition of Veth Propulsion, which was funded with \$60.7 million of debt at closing on July 2, 2018. This was offset by \$32.2 million of proceeds from an equity offering completed in the first quarter. During the first half, the Company incurred negative free cash flow (defined as operating cash flow less acquisitions of fixed assets) of (\$10.5) million and ended the quarter with total debt, net of cash, of \$28.1 million, compared to (\$10.3) million at June 30, 2018, for a net change of \$38.5 million.

Total equity increased \$38.2 million, or 26.6%, to \$181.8 million as of December 28, 2018. Common stock increased by \$32.6 million, primarily due to the equity offering completed during the first quarter. Net earnings during the first half increased equity by \$6.9 million. Net unfavorable foreign currency translation of \$2.3 million was reported, while treasury stock decreased by \$0.2 million. The net remaining increase in equity of \$1.1 million primarily represents the amortization of net actuarial loss and prior service cost on the Company's defined benefit pension plans.

On April 22, 2016, the Company entered into a revolving Credit Agreement (the "2016 Credit Agreement") with Bank of Montreal ("BOM"). This agreement permitted the Company to enter into loans up to \$40 million. This maximum could have been increased under the 2016 Credit Agreement by an additional \$10 million so long as there existed no default and certain other conditions specified in the 2016 Credit Agreement were satisfied.

In general, each revolving loan under the 2016 Credit Agreement were charged interest at a Eurodollar Rate, as defined. In addition to monthly interest payments, the Company was responsible for paying a quarterly unused fee equal to 0.15% of the average daily unused portion of the revolving credit commitment. The Company could prepay loans subject to certain limitations. Borrowings under the 2016 Credit Agreement were secured by substantially all of the Company's personal property, including accounts receivable, inventory, certain machinery and equipment, and intellectual property, and the personal property of Mill-Log Equipment Co., Inc ("Mill-Log"). The Company also pledged 100% of its equity interests in certain domestic subsidiaries and 65% of its equity interests in certain foreign subsidiaries. The Company entered into a security agreement, IP security agreement and pledge agreement with BOM, and Mill-Log entered into a guaranty agreement, guarantor security agreement and pledge agreement with BOM, which collectively granted BOM a security interest in these assets and holdings as administrative agent for itself and other lenders that may enter into the 2016 Credit Agreement. The Company also entered into a negative pledge agreement with BOM, pursuant to which it had agreed not to sell, lease or otherwise encumber real estate that it owned except as permitted by the 2016 Credit Agreement and the negative pledge agreement. Within thirty days upon the occurrence of an event of default (as defined) that was not cured within the prescribed cure period, or if availability under the 2016 Credit Agreement was less than the greater of 15% of the aggregate revolving credit commitments and \$6.0 million, the Company and Mill-Log were to execute and deliver mortgages to BOM on all real estate owned by them at such time to further secure borrowings under the 2016 Credit Agreement.

On June 29, 2018, the Company entered into a credit agreement (the "Credit Agreement") with BMO Harris Bank N.A. ("BMO") that provides for the assignment and assumption of the existing loans between the Company and BOM, and subsequent amendments into a term loan (the "Term Loan") and revolving credit loans (each a "Revolving Loan" and, collectively, the "Revolving Loans," and, together with the Term Loan, the "Loans"). Pursuant to the Credit Agreement, BMO agreed to make the Term Loan to the Company in a principal amount not to exceed \$35 million, and the Company may, from time to time prior to the maturity date, enter into Revolving Loans in amounts not to exceed, in the aggregate \$50 million (the "Revolving Credit Commitment").

The Credit Agreement provides that the Company may elect that the Term Loan and each Revolving Loan to be either “LIBOR Loans” or “Eurodollar Loans”, as defined, and bear interest at the applicable rate per the Credit Agreement. This rate as of December 28, 2018 was 4.60%. In addition to the monthly interest payments and any mandatory principal payments required by the Credit Agreement (if applicable), the Company will be responsible for paying a quarterly Revolving Credit Commitment Fee and quarterly Letter of Credit Fees. The Company may prepay the Loans (or any one of the Loans), subject to certain limitations. Borrowings under the Credit Agreement are secured by substantially all of the Company’s personal property, including accounts receivable, inventory, machinery and equipment, and intellectual property, and the personal property of Mill-Log, a wholly-owned domestic subsidiary of the Company. The Company has also pledged 100% of its equity interests in certain domestic subsidiaries and 65% of its equity interests in certain foreign subsidiaries. To effect these security interests, the Company and Mill-Log entered into various amendment and assignment agreements that consent to the assignment of certain agreements previously entered into between the Company and Mill-Log with Bank of Montreal in connection with the 2016 Credit Agreement. Specifically, the Company amended and assigned to BMO a Security Agreement, IP Security Agreement, and Pledge Agreement, and Mill-Log amended and assigned to BMO a Guaranty Agreement and Guarantor Security Agreement. The Company also amended and assigned to BMO a Negative Pledge Agreement that it has previously entered into with Bank of Montreal, pursuant to which it agreed not to sell, lease or otherwise encumber real estate that it owns except as permitted by the Credit Agreement and the Negative Pledge Agreement. Upon the occurrence of an Event of Default, BMO may take the following actions upon written notice to the Company: (1) terminate its remaining obligations under the Credit Agreement; (2) declare all amounts outstanding under the Credit Agreement to be immediately due and payable; and (3) demand the Company to immediately Cash Collateralize L/C Obligations in an amount equal to 105% of the aggregate L/C Obligations or a greater amount if BMO determines a greater amount is necessary. If such Event of Default is due to the Company’s bankruptcy, BMO may take the three actions listed above without notice to the Company.

The Company’s balance sheet remains healthy, there are no material off-balance-sheet arrangements, and it continues to have sufficient liquidity for near-term needs. The Company had approximately \$14.2 million of available borrowings under the Credit Agreement as of December 28, 2018. The Company expects to continue to generate enough cash from operations, as well as its credit facilities, to meet its operating and investing needs. As of December 28, 2018, the Company also had cash of \$18.5 million, primarily at its overseas operations. These funds, with some restrictions and tax implications, are available for repatriation as deemed necessary by the Company. In fiscal 2019, the Company expects to contribute \$2.4 million to its defined benefit pension plans, the minimum contribution required.

Net working capital increased \$38.0 million, or 39.2%, during the first half of fiscal 2019, and the current ratio increased slightly to 2.7 at December 28, 2018 from 2.6 for June 30, 2018. The increase in net working capital was primarily driven by the acquisition of Veth Propulsion and a demand driving increase to inventory, partially offset by an increase in trade payables and a reduction to the bonus accrual following the payment of the fiscal 2018 global bonus during the first quarter of fiscal 2019.

The Company expects capital expenditures to be approximately \$14 million - \$16 million in fiscal 2019. These anticipated expenditures reflect the Company’s plans to invest in modern equipment and facilities, its global sourcing program and new products.

Management believes that available cash, the BMO credit facility, and potential access to debt markets will be adequate to fund the Company’s capital requirements for the foreseeable future.

As of December 28, 2018, the Company has obligations under non-cancelable operating lease contracts and loan agreements for certain future payments.

The Company has approximately \$1.1 million of unrecognized tax benefits, including related interest and penalties, as of December 28, 2018, which, if recognized, would favorably impact the effective tax rate. See Note J of the Condensed Consolidated Financial Statements for disclosures surrounding uncertain income tax positions.

The Company maintains defined benefit pension plans for some of its operations in the United States and Europe. The Company has established the Benefits Committee (a non-Board management committee) to oversee the operations and administration of the defined benefit plans. The Company estimates that fiscal 2019 contributions to all defined benefit plans will total \$2.4 million. As of December 28, 2018, \$1.4 million in contributions have been made.

New Accounting Releases

See Note A, Basis of Presentation, to the condensed consolidated financial statements for a discussion of recently issued accounting standards.

Critical Accounting Policies

The preparation of this Quarterly Report requires management's judgment to make estimates and assumptions that affect the reported amounts of assets and liabilities, disclosure of contingent assets and liabilities at the dates of the financial statements, and the reported amounts of revenues and expenses during the reporting period. There can be no assurance that actual results will not differ from those estimates.

The Company's critical accounting policies are described in Item 7 of the Company's Annual Report filed on Form 10-K for June 30, 2018. There have been no significant changes to those accounting policies subsequent to June 30, 2018.

Item 3. Quantitative and Qualitative Disclosure About Market Risk

The Company is exposed to market risks from changes in interest rates, commodities and foreign exchange. To reduce such risks, the Company selectively uses financial instruments and other pro-active management techniques. All hedging transactions are authorized and executed pursuant to clearly defined policies and procedures, which prohibit the use of financial instruments for trading or speculative purposes.

Interest rate risk - The Company's earnings exposure related to adverse movements of interest rates is primarily derived from outstanding floating rate debt instruments that are indexed to a Eurodollar Rate. In accordance with the Credit Agreement expiring June 30, 2023, the Company has the option of borrowing at a LIBOR Rate plus an additional "Add-On" based on total funded debt to EBITDA, which was at 2.25% as of December 28, 2018. Due to the relative stability of interest rates, the Company did not utilize any financial instruments at December 28, 2018 to manage interest rate risk exposure. A 10 percent increase or decrease in the applicable interest rate would result in a change in annual pretax interest expense of approximately \$124,000.

Commodity price risk - The Company is exposed to fluctuation in market prices for such commodities as steel and aluminum. The Company does not utilize commodity price hedges to manage commodity price risk exposure.

Currency risk - The Company has exposure to foreign currency exchange fluctuations. Approximately 33% of the Company's revenues in the quarter ended December 28, 2018 were denominated in currencies other than the U.S. dollar. Of that total, approximately 74% was denominated in euros with the balance composed of Japanese yen, the Swiss franc, Indian rupee and the Australian and Singapore dollars. The Company does not hedge the translation exposure represented by the net assets of its foreign subsidiaries. Foreign currency translation adjustments are recorded as a component of shareholders' equity. Forward foreign exchange contracts are occasionally used to hedge the currency fluctuations on significant transactions denominated in foreign currencies.

Derivative financial instruments - The Company has written policies and procedures that place all financial instruments under the direction of the Company's corporate treasury group and restrict derivative transactions to those intended for hedging purposes. The use of financial instruments for trading or speculative purposes is prohibited. The Company occasionally uses financial instruments to manage the market risk from changes in foreign exchange rates.

The Company primarily enters into forward exchange contracts to reduce the earnings and cash flow impact of non-functional currency denominated receivables and payables. These contracts are highly effective in hedging the cash flows attributable to changes in currency exchange rates. Gains and losses resulting from these contracts offset the foreign exchange gains or losses on the underlying assets and liabilities being hedged. The maturities of the forward exchange contracts generally coincide with the settlement dates of the related transactions. Gains and losses on these contracts are recorded in Other expense, net in the Condensed Consolidated Statement of Operations as the changes in the fair value of the contracts are recognized and generally offset the gains and losses on the hedged items in the same period. The primary currency to which the Company was exposed in fiscal 2019 and 2018 was the euro. The Company had no outstanding forward exchange contracts at December 28, 2018 and June 30, 2018.

Item 4. Controls and Procedures

(a) Evaluation of Disclosure Controls and Procedures

The Company's management, with the participation of the Company's Chief Executive Officer and Chief Financial Officer, have evaluated the effectiveness of the Company's disclosure controls and procedures (as such term is defined in Rules 13a-15(e) and 15d-15(e) under the Securities Exchange Act of 1934, as amended ("the Exchange Act")) as of the end of the period covered by this report. Based on such evaluation, the Company's Chief Executive Officer and Chief Financial Officer have concluded that, as of the end of such period, the Company's disclosure controls and procedures are effective in recording, processing, summarizing, and reporting, on a timely basis, information required to be disclosed by the Company in the reports that it files or submits under the Exchange Act, and that such information is accumulated and communicated to the Chief Executive Officer and Chief Financial Officer, as appropriate, to allow timely discussions regarding required disclosure.

(b) Changes in Internal Control Over Financial Reporting

Management of the Company is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Exchange Act Rule 13a-15(f) and 15d-15(f). During the most recent fiscal quarter, no changes were made which have materially affected, or which are reasonably likely to materially affect, our internal control over financial reporting.

On July 2, 2018, the Company completed the acquisition of 100% of the outstanding common stock of Veth Propulsion Holding BV. As part of its ongoing integration activities, the Company is continuing to incorporate its controls and procedures into this recently acquired business.

Part II. OTHER INFORMATION

Item 1. Legal Proceedings

The Company is a defendant in several product liability or related claims which are considered either adequately covered by appropriate liability insurance or involving amounts not deemed material to the business or financial condition of the Company.

Item 1A. Risk Factors

There have been no material changes to the risk factors previously disclosed in response to Item 1A to Part I of our 2018 Annual Report on Form 10-K, as supplemented by its September 21, 2018 final prospectus supplement.

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

(a) Unregistered Sales of Equity Securities

There were no securities of the Company sold by the Company during the quarter ended December 28, 2018, which were not registered under the Securities Act of 1933, in reliance upon an exemption from registration provided by Section 4 (2) of the Act.

(b) Use of Proceeds

On August 31, 2018, the Company filed a Registration Statement on Form S-3 (File No. 333-227130) (the "Registration Statement"), in which it registered \$100,000,000 of common stock, preferred stock, and warrants using the "shelf" registration process. The Registration Statement was declared effective by the SEC on September 14, 2018. On September 17, 2018, the Company announced a proposed follow-on public offering of \$30,000,000 of shares of its common stock, plus an option for the underwriters to purchase up to an additional \$4,500,000 of shares of its common stock. On September 25, 2018, the Company completed the sale of 1,533,334 shares of its common stock pursuant to the Registration Statement at a price to the public of \$22.50 per share, for an aggregate offering amount of \$34,500,000. The registered offering was completed pursuant to an underwriting agreement with Robert W. Baird & Co. Incorporated ("Baird"), and Baird and Oppenheimer & Co., Inc. served as underwriters for the offering. The shares sold included the exercise in full by the underwriters of their option to purchase 200,000 additional shares of common stock.

The net proceeds received by the Company, after underwriting expenses of \$2,070,000 and offering expenses of \$220,000, were \$32,210,000. The proceeds were used to partially pay down a \$35,000,000 term loan (the "Term Loan") and outstanding revolving loans (the "Revolving Loans") under a June 29, 2018 credit agreement between the Company and BMO Harris Bank, N.A. Specifically, on September 25, 2018, \$24,151,000 of the proceeds were applied to the Term Loan and \$8,279,000 of the proceeds were applied to the Revolving Loans. The prospectus for the registered offering indicated that the Company intended to use approximately two-thirds of the proceeds to partially repay the Term Loan and approximately one-third of the proceeds to partially repay the Revolving Loans.

No offering expenses or proceeds were paid directly or indirectly to any of the Company's directors or officers (or their associates) or persons owning ten percent or more of any class of the Company's equity securities or to any other affiliates.

(c) Issuer Purchases of Equity Securities

Issuer Purchases of Equity Securities

Period	(a) Total Number of Shares Purchased	(b) Average Price Paid per Share	(c) Total Number of Shares Purchased as Part of Publicly Announced Plans or Programs	(d) Maximum Number of Shares that May Yet Be Purchased Under the Plans or Programs
September 29 – October 26, 2018	0	NA	0	315,000
October 27 – November 30, 2018	0	NA	0	315,000

December 1 – 28, 2018	0	NA	0	315,000
Total	0	NA	0	315,000

Under authorizations granted by the Board of Directors on February 1, 2008 and July 27, 2012, the Company was authorized to purchase 500,000 shares of its common stock. This authorization has no expiration, and as of December 28, 2018, 315,000 may yet be purchased under these authorizations. The Company did not purchase any shares of its common stock during the quarter ended December 28, 2018.

Item 3. Defaults Upon Senior Securities

None.

Item 5. Other Information

None.

Item 6. Exhibits

31a [Certification of Chief Executive Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.](#)

31b [Certification of Chief Financial Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.](#)

32a [Certification of Chief Executive Officer pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.](#)

32b [Certification of Chief Financial Officer pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.](#)

101.INS XBRL Instance Document

101.SCH XBRL Schema

101.CAL XBRL Calculation Linkbase

101.DEF XBRL Definition Linkbase

101.LAB XBRL Label Linkbase

101.PRE XBRL Presentation Linkbase

SIGNATURE

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.

TWIN DISC, INCORPORATED
(Registrant)

Date: February 5, 2019

/s/ DEBBIE A. LANGE
Debbie A. Lange
Corporate Controller
Chief Accounting Officer

Exhibit 31a
CERTIFICATION

I, John H. Batten, certify that:

1. I have reviewed this quarterly report on Form 10-Q of Twin Disc, Incorporated;
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 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 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.

Date: February 5, 2019

/s/ JOHN H. BATTEN

John H. Batten

President, Chief Executive Officer

Exhibit 31b
CERTIFICATIONS

I, Jeffrey S. Knutson, certify that:

1. I have reviewed this quarterly report on Form 10-Q of Twin Disc, Incorporated;
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 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 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.

Date: February 5, 2019

/s/ JEFFREY S. KNUTSON

Jeffrey S. Knutson

Vice President – Finance, Chief Financial Officer, Treasurer and Secretary

**CERTIFICATION PURSUANT TO
18 U.S.C. SECTION 1350,
AS ADOPTED PURSUANT TO
SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002**

In connection with the Quarterly Report of Twin Disc, Incorporated (the "Company") on Form 10-Q for the fiscal quarter ending December 28, 2018, as filed with the Securities and Exchange Commission as of the date hereof (the "Report"), I, John H. Batten, President, Chief Executive Officer of the Company, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that, to the best of my knowledge:

- (1) The Report fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended, and
- (2) The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Date: February 5, 2019

/s/ JOHN H. BATTEN
John H. Batten
President, Chief Executive Officer

**CERTIFICATION PURSUANT TO
18 U.S.C. SECTION 1350,
AS ADOPTED PURSUANT TO
SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002**

In connection with the Quarterly Report of Twin Disc, Incorporated (the "Company") on Form 10-Q for the fiscal quarter ending December 28, 2018, as filed with the Securities and Exchange Commission as of the date hereof (the "Report"), I, Jeffrey S. Knutson, Vice President – Finance, Chief Financial Officer, Treasurer and Secretary of the Company, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that, to the best of my knowledge:

- (1) The Report fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended, and
- (2) The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Date: February 5, 2019

/s/ JEFFREY S. KNUTSON

Jeffrey S. Knutson

Vice President – Finance, Chief Financial Officer, Treasurer and Secretary