CTI BIOPHARMA CORP
Form POS AM
January 31, 2018
As filed with the Securities and Exchange Commission on January 31, 2018

Registration No. 333-221382

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
Washington, D.C. 20549

Post-Effective Amendment No. 2
to
FORM S-3
REGISTRATION STATEMENT
UNDER
THE SECURITIES ACT OF 1933

CTI BIOPHARMA CORP.
(Exact name of registrant as specified in its charter)

Delaware	91-1533912
(State or other jurisdiction of incorporation or organization)	(I.R.S. Employer Identification No.)

3101 Western Avenue, Suite 800
Seattle, Washington 98121
(206) 282-7100
(Address, including zip code, and telephone number, including area code, of registrant's principal executive offices)

Adam Craig, M.D., Ph.D.
President and Chief Executive Officer
CTI BioPharma Corp.
3101 Western Avenue, Suite 800
Seattle, Washington 98121
(206) 282-7100
(Name, address, including zip code, and telephone number, including area code, of agent for service)

Copies to:

C. Brophy Christensen, Jr., Esq.
Eric C. Sibbitt, Esq.
O'Melveny & Myers LLP
Two Embarcadero Center, 28th Floor
San Francisco, California 94111-3823
(415) 984-8700

Approximate date of commencement of proposed sale to the public:
From time to time after the effective date of this registration statement.

If the only securities being registered on this form are being offered pursuant to dividend or interest reinvestment plans, please check the following box. ¨
If any of the securities being registered on this form are to be offered on a delayed or continuous basis pursuant to Rule 415 under the Securities Act of 1933, other than securities offered only in connection with dividend or interest reinvestment plans, check the following box. x
If this form is filed to register additional securities for an offering pursuant to Rule 462(b) under the Securities Act, please check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering. ¨
If this Form is a post-effective amendment filed pursuant to Rule 462(c) under the Securities Act, check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering. ¨
If this Form is a registration statement pursuant to General Instruction I.D. or a post-effective amendment thereto that shall become effective upon filing with the Commission pursuant to Rule 462(e) under the Securities Act, check the following box. ¨
If this Form is a post-effective amendment to a registration statement filed pursuant to General Instruction I.D. filed to register additional securities or additional classes of securities pursuant to Rule 413(b) under the Securities Act, check the following box. ¨
Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, or a smaller reporting company. See the definitions of “large accelerated filer,” “accelerated filer” and “smaller reporting company” in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer	o	Accelerated filer	x
Non-accelerated filer	o (Do not check if a smaller reporting company)	Smaller reporting company	o

CALCULATION OF REGISTRATION FEE

Title of each class of securities to be registered	Amount to be registered(1)	Proposed maximum offering price per unit(2)	Proposed maximum aggregate offering price(3)	Amount of registration fee(4)
Common Stock, par value $0.001 per share(5)				
Preferred Stock, par value $0.001 per share				
Debt Securities				
Warrants				
Rights				
Units				
Preferred Stock Purchase Rights(5)(6)				
Total			$200,000,000	$24,900.00

(1) This registration statement registers such indeterminate number of shares of common stock and preferred stock, such indeterminate principal amount of debt securities, such indeterminate number of warrants to purchase common stock, preferred stock and/or debt securities of one or more series, such indeterminate number of rights to purchase common stock, preferred stock and/or debt securities of one or more series, and such indeterminate number of units representing an interest in one or more shares of common stock or preferred stock, debt securities, warrants and/or rights in any combination as shall have an aggregate initial offering price not to

exceed $200,000,000. Any securities registered hereunder may be sold separately or as units with other securities registered hereunder.

(2) The proposed maximum initial offering price per unit will be determined by the registrant, from time to time, in connection with the issuance by the registrant of the securities registered hereunder. The securities registered also include such indeterminate amounts and numbers of shares of common stock and preferred stock and debt securities as may be issued upon conversion of, or exchange for, preferred stock or debt securities that provide for conversion or exchange, upon exercise of warrants or rights or pursuant to the antidilution provisions of such securities. In addition, pursuant to Rule 416 under the Securities Act, the shares being registered hereunder include such indeterminate number of shares of common stock and preferred stock as may be issuable with respect to the shares being registered hereunder as a result of stock splits, stock dividends or similar transactions.

(3) The proposed maximum aggregate offering price per class of security will be determined from time to time by the registrant in connection with the issuance by the registrant of the securities registered hereunder and is not specified as to each class of security pursuant to General Instruction II.D of Form S-3 under the Securities Act.

(4) Calculated in accordance with Rule 457(o) under the Securities Act. On November 21, 2014, the registrant filed a registration statement on Form S-3 (File No. 333-200452), registering the issuance of $200,000,000 of securities of the registrant (the “Prior Registration Statement”). Pursuant to Rule 457(p) under the Securities Act, the registration fee applicable to the securities registered hereby in the amount of $24,900.00 is offset by $3,985.66 in registration fees previously paid by the registrant with respect to $34,300,000.00 of the registrant’s securities that were registered but not issued pursuant to the Prior Registration Statement. Accordingly, a registration fee of $20,914.34 was previously paid. The Prior Registration Statement is hereby withdrawn and any offering of the unsold securities thereunder has been terminated.

(5) Each share of common stock includes one preferred stock purchase right.

(6) No separate consideration is payable for the preferred stock purchase rights. The registration fee for these securities is included in the fee for the common stock.

The registrant hereby amends this registration statement on such date or dates as may be necessary to delay its effective date until the registrant shall file a further amendment which specifically states that this registration

statement shall thereafter become effective in accordance with Section 8(a) of the Securities Act of 1933, or until the registration statement shall become effective on such date as the Securities and Exchange Commission, acting pursuant to said Section 8(a), may determine.

EXPLANATORY NOTE

On January 24, 2018, CTI BioPharma Corp. (“CTI Washington”) changed its state of incorporation from Washington to Delaware (the “Reincorporation”). The Reincorporation was effectuated by merging the Company with and into CTI Biopharma Corp., a wholly-owned Delaware subsidiary (“CTI Delaware”) with CTI Washington ceasing to exist and CTI Delaware being the surviving corporation. The Reincorporation was approved by CTI Washington’s stockholders at the Special Meeting of Stockholders on January 24, 2018 for which proxies were solicited pursuant to Section 14(a) of the Securities Exchange Act of 1934, as amended (the “Exchange Act”). Upon the effectiveness of the Reincorporation, among other matters, (1) the internal affairs of CTI Washington ceased to be governed by the Washington Business Corporation Act and became subject to the Delaware General Corporation Law (“DGCL”), (2) each outstanding share of common stock and preferred stock of CTI Washington was converted into one share of common stock and one share of preferred stock, respectively, of CTI Delaware, and (3) the articles of incorporation and the bylaws of CTI Washington that were in effect immediately prior to the Reincorporation were replaced by the certificate of incorporation and bylaws for CTI Delaware approved in connection with the Reincorporation. CTI Washington and CTI Delaware, as issuer and successive issuer, respectively, under Rule 12g-3 of the Exchange Act, are collectively referred to herein as the “Registrant”.

This Post-Effective Amendment is being filed pursuant to Rule 414 under the Securities Act of 1933, as amended (the “Securities Act”), and constitutes Post-Effective Amendment No. 2 to the Registration Statement on Form S-3 (File No. 333-221382), as originally filed on November 7, 2017 and as amended on November 21, 2017, December 5, 2017, and January 24, 2018 (the “Registration Statement”) solely to reflect the change in the Registrant’s state of incorporation as a result of the Reincorporation or as necessary to keep the Registration Statement from being misleading in any material respect. In accordance with paragraph (d) of Rule 414 of the Securities Act, except as modified by this Post-Effective Amendment, CTI BioPharma, Corp., as successor issuer to CTI Washington pursuant to Rule 12g-3 of the Exchange Act, hereby expressly adopts the Registration Statement as its registration statement for all purposes of the Securities Act and the Exchange Act.

The information in this prospectus is not complete and may be changed. We may not sell these securities pursuant to this prospectus until the registration statement filed with the Securities and Exchange Commission is effective. This prospectus is not an offer to sell these securities and we are not soliciting offers to buy these securities in any state where the offer or sale is not permitted.

SUBJECT TO COMPLETION, DATED JANUARY 31, 2018
PROSPECTUS

CTI BIOPHARMA CORP.
$200,000,000
Common Stock
Preferred Stock
Debt Securities
Warrants
Rights
Units

From time to time, we may offer and sell in one or more offerings:

- shares of our common stock, including the associated preferred stock purchase rights;
- shares of our preferred stock;
- debt securities;
- warrants to purchase common stock, preferred stock and/or debt securities;
- rights to purchase common stock, preferred stock and/or debt securities; and
- units consisting of two or more of these classes or series of securities.

We may sell any combination of these securities in one or more offerings, up to an aggregate offering price of $200,000,000, in amounts, at prices and on terms to be determined at the time of each offering thereof. Each time we offer securities using this prospectus, we will provide specific terms of the securities and the offering in one or more supplements to this prospectus. The prospectus supplements may also add to, update or change the information in this prospectus and will also describe the specific manner in which we will offer the securities. The securities may be offered and sold by us to or through one or more underwriters, broker-dealers or agents, or directly to purchasers on a continuous or delayed basis. See “Plan of Distribution.”

This prospectus may not be used by us to sell securities unless accompanied by a prospectus supplement. You should carefully read this prospectus and any accompanying prospectus supplement, including the information incorporated by reference, prior to investing in any of our securities.

On January 23, 2018, the last reported sale price of our common stock on The NASDAQ Capital Market was $3.23 per share. We do not expect our preferred stock, debt securities, warrants, rights or units to be listed on any securities exchange or over-the-counter market unless otherwise described in the applicable prospectus supplement.

Investing in our securities involves a high degree of risk. See the “Risk Factors” section on page 4 of this prospectus.

NEITHER THE SECURITIES AND EXCHANGE COMMISSION NOR ANY STATE SECURITIES COMMISSION HAS APPROVED OR DISAPPROVED OF THESE SECURITIES OR DETERMINED IF THIS PROSPECTUS IS TRUTHFUL OR COMPLETE. ANY REPRESENTATION TO THE CONTRARY IS A CRIMINAL OFFENSE.

The date of this prospectus is , 2018

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ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement that we filed with the Securities and Exchange Commission, or the SEC, utilizing a “shelf” registration process. Under the shelf registration process, we may, from time to time, sell common stock, preferred stock, debt securities, warrants, rights, units or any combination of these securities in one or more offerings, for a total maximum offering price not to exceed $200,000,000. This prospectus provides you with a general description of the securities we may offer. Each time we sell any securities under this prospectus, we will provide a prospectus supplement that will contain more specific information about the terms of that offering, including the specific amounts, prices and terms of the securities offered. Any prospectus supplement may include a discussion of risks or other special considerations applicable to us or the offered securities. Any prospectus supplement may also add to, update or change information contained in this prospectus. To the extent there is a conflict between the information contained in this prospectus, on the one hand, and the information contained in any prospectus supplement, on the other hand, you should rely on the information in the prospectus supplement.

You should read this prospectus, any prospectus supplement, any documents that we incorporate by reference in this prospectus and in any prospectus supplement, and the additional information described below under “Where You Can Find More Information” and “Incorporation of Certain Documents by Reference” before making an investment decision. You should rely only on the information contained or incorporated by reference in this prospectus, any prospectus supplement and any free writing prospectus. We have not authorized any other person to provide you with different information. If anyone provides you with different or inconsistent information, you should not rely on it. We take no responsibility for, and can provide no assurance as to the reliability of, any other information that others may give you. This prospectus is not an offer to sell these securities and it is not soliciting an offer to buy these securities in any jurisdiction where the offer or sale is not permitted.

You should not assume that the information in this prospectus, any prospectus supplement, any free writing prospectus or any documents we incorporate by reference herein or therein is accurate as of any date other than the date on the front of those documents. Our business, financial condition, results of operations and prospects may have changed since those dates.

Market data and industry statistics disclosed in this prospectus, any prospectus supplement, any free writing prospectus or any other document we incorporate by reference herein or therein are based on independent industry publications, reports by market research firms and other published independent sources. Some data and other information is also based on our good faith estimates, which are derived from our review of internal surveys and independent sources. Accordingly, investors should not place undue reliance on this information. By including such market data and information, we do not undertake a duty to update or provide that data in the future.

In this prospectus, the terms “CTI,” “Company,” “registrant,” “we,” “us,” “our” and similar terms refer to CTI BioPharma Corp Delaware corporation, and its subsidiaries, unless the context otherwise requires. “CTI” and “Pixuvri” are our proprietary marks. All other product names, trademarks and trade names referred to in this prospectus, as supplemented from time to time, are the property of their respective owners.

WHERE YOU CAN FIND MORE INFORMATION

We are subject to the information requirements of the Exchange Act. In accordance with the Exchange Act, we file reports, proxy statements and other information with the SEC. Such reports, proxy statements and other information filed by us are available to the public free of charge at www.sec.gov. Copies of certain information filed by us with the SEC are also available on our website at www.ctibiopharma.com. You may also read and copy any document we file with the SEC, including the registration statement on Form S-3 and the exhibits thereto, at the SEC's Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the Public Reference Room by calling the SEC at 1-800-SEC-0330.

This prospectus omits some information contained in the registration statement of which this prospectus forms a part in accordance with SEC rules and regulations. You should review the information and exhibits in the registration statement for further information about us and the securities we are offering. Statements in this prospectus concerning any document we filed as an exhibit to the registration statement or that we otherwise filed with the SEC are not intended to be comprehensive and are qualified by reference to these filings. You should review the complete document to evaluate these statements.

INCORPORATION OF CERTAIN DOCUMENTS BY REFERENCE

SEC rules allow us to "incorporate by reference" into this prospectus much of the information we file with the SEC, which means that we can disclose important information to you by referring you to those publicly available documents. The information that we incorporate by reference into this prospectus is considered to be part of this prospectus. This prospectus incorporates by reference the documents listed below and any future filings we make with the SEC under Sections 13(a), 13(c), 14 and 15(d) of the Exchange Act (in each case, other than those documents or the portions of those documents deemed to be furnished and not filed in accordance with SEC rules) until the offering of the securities under the registration statement of which this prospectus forms a part is terminated or completed:

- our Annual Report on Form 10-K for the fiscal year ended December 31, 2016, filed with the SEC on March 2, 2017;
- portions of the proxy statement for our 2017 annual meeting of shareholders, filed with the SEC on March 28, 2017, to the extent specifically incorporated by reference to our Annual Report on Form 10-K for the year ended December 31, 2016;
- our Quarterly Reports on Form 10-Q for the fiscal quarters ended March 31, 2017, June 30, 2017 and September 30, 2017, filed with the SEC on May 3, 2017, August 4, 2017 and November 7, 2017, respectively;
- our Current Reports on Form 8-K filed with the SEC on January 5, 2017, January 20, 2017, January 24, 2017, February 10, 2017, February 27, 2017 (Item 5.02 only), March 13, 2017 (Item 5.02 only), April 25, 2017 (Item 1.01 only), May 16, 2017 (Items 5.02 and 5.07 only) as amended by that Current Report on Form 8-K/A filed with the SEC on June 16, 2017, June 5, 2017 (Item 5.02 only), June 9, 2017, July 24, 2017 (Item 5.02 only), August 22, 2017 (Item 5.02 only), September 26, 2017, November 28, 2017, December 5, 2017, December 15, 2017, January 24, 2018, and January 25, 2018;
- the description of our capital stock contained in our Registration Statement on Form 10 filed with the SEC on June 27, 1996, as amended; and
- the description of our preferred stock purchase rights contained in our Registration Statement on Form 8-A filed with the SEC on September 6, 2012, as amended.

Because we are incorporating by reference future filings with the SEC, this prospectus is continually updated and later information filed with the SEC may update and supersede some of the information included or incorporated by reference in this prospectus. This means that you must look at all of the SEC filings that we incorporate by reference to determine if any of the statements in this prospectus or in any document previously incorporated by reference have been modified or superseded.

We will provide without charge to each person, including any beneficial owners, to whom this prospectus is delivered, upon his or her written or oral request, a copy of any or all documents referred to above which have been or may be incorporated by reference into this prospectus but not delivered with this prospectus, excluding exhibits to those documents unless they are specifically incorporated by reference into those documents. You may request a copy of these documents by writing or telephoning us at the following address:

CTI BioPharma Corp.
3101 Western Avenue, Suite 800
Seattle, Washington 98121
(206) 282-7100
Attention: Investor Relations

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SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus, any prospectus supplement and any documents we incorporate by reference herein or therein may contain “forward-looking statements” within the meaning of the U.S. federal securities laws. All statements other than statements of historical fact are forward-looking statements, including, without limitation:

- any statements regarding future operations, plans, expectations, intentions, regulatory filings or approvals;
- any statements regarding the performance, or likely performance, outcomes or economic benefit of any licensing collaboration or other arrangement;
- any projections of revenues, operating expenses or other financial terms, and any projections of cash resources;
- any statements of the plans and objectives of management for future operations or programs;
- any statements concerning proposed new products;
- any statements regarding the safety and efficacy or future availability of any of our compounds;
- any statements regarding our ability to interpret clinical trial data and results for PERSIST-2 despite not satisfying the pre-specified minimum evaluable patient goal or expectations with respect to the potential therapeutic utility of pacritinib and statements regarding our expectations with respect to the potential of pacritnib to achieve treatment goals;
- any statements on plans regarding proposed or potential clinical trials or new drug filing strategies, timelines or submissions, including expectations with respect to the timing and planned enrollment of PAC203;
- any significant disruptions in our information technology systems;
- any statements regarding compliance with the listing standards of The NASDAQ Stock Market;
- any statements regarding potential future partnerships, licensing arrangements, mergers, acquisitions or other transactions;
- any statements regarding future economic conditions or performance; and
- any statements of assumption underlying any of the foregoing.

In some cases, forward-looking statements can be identified by terms such as “anticipates,” “believes,” “continue,” “could,” “estimates,” “expects,” “intends,” “may,” “plans,” “potential,” “predicts,” “projects,” “should” or “will” or the negative thereof thereof and similar expressions. Such statements are based on management’s current expectations and are subject to risks and uncertainties which may cause actual results to differ materially from those set forth in the forward-looking statements. There can be no assurance that such expectations or any of the forward-looking statements will prove to be correct, and actual results could differ materially from those projected or assumed in the forward-looking statements. We urge you to carefully review the disclosures we make concerning risks and other factors that may affect our business and operating results, including those made in “Item 1A. Risk Factors” in our Annual Report on Form 10-K for the year ended December 31, 2016 and in “Part II—Item 1A. Risk Factors” in our Quarterly Reports on Form 10-Q for the quarters ended March 31, 2017, June 30, 2017 and September 30, 2017, as such risk factors may be updated in subsequent SEC filings, as well as our other reports filed with the SEC and in any prospectus supplement. We caution you not to place undue reliance on forward-looking statements, which speak only as of the date of this prospectus or any prospectus supplement. We do not intend, and we undertake no obligation, to update any forward-looking information to reflect events or circumstances after the date of this prospectus or any prospectus supplement or to reflect the occurrence of unanticipated events, unless required by law to do so.

INFORMATION ABOUT THE COMPANY

We are a biopharmaceutical company focused on the acquisition, development and commercialization of novel targeted therapies covering a spectrum of blood-related cancers that offer a unique benefit to patients and healthcare providers. Our goal is to build a profitable company by generating income from products we develop and commercialize, either alone or with partners. We are currently concentrating our efforts on treatments that target blood-related cancers where there is an unmet medical need. In particular, we are primarily focused on commercializing PIXUVRI® (pixantrone), or PIXUVRI, in the European Union, or the E.U., for multiply relapsed or refractory aggressive B-cell non-Hodgkin lymphoma, or NHL, and evaluating pacritinib for the treatment of adult patients with myelofibrosis.

We were incorporated in the State of Washington in 1991. On January 24, 2018, we changed our state of incorporation from Washington to Delaware pursuant to the Reincorporation. Our shares of common stock trade on The NASDAQ Capital Market under the symbol “CTIC.” Our principal executive offices are located at 3101 Western Avenue, Suite 800, Seattle, Washington 98121, and our phone number is (206) 282-7100. Our website is located at www.ctibiopharma.com; however, the information in, or that can be accessed through, our website is not part of this prospectus.

RISK FACTORS

You should carefully consider the risks under the heading “Risk Factors” beginning on page 24 of our Annual Report on Form 10-K for the fiscal year ended December 31, 2016, filed with the SEC on March 2, 2017, and our Quarterly Reports on Form 10-Q for the fiscal quarters ended March 31, 2017, June 30, 2017 and September 30, 2017, filed with the SEC on May 3, 2017, August 4, 2017 and November 6, 2017, respectively, which information is incorporated by reference in this prospectus, and the additional risks and other information in this prospectus, any prospectus supplement and the documents incorporated by reference herein and therein before deciding to invest in our securities. If any of the identified risks actually occur, they could materially adversely affect our business, financial condition, operating results or prospects and the trading price of our securities. Additional risks and uncertainties that we do not presently know or that we currently deem immaterial may also impair our business, financial condition, operating results and prospects and the trading price of our securities.

RATIO OF EARNINGS TO FIXED CHARGES AND OF EARNINGS TO COMBINED FIXED CHARGES AND PREFERRED STOCK DIVIDENDS

The following table sets forth our ratio of earnings to fixed charges and of earnings to combined fixed charges and preferred stock dividends for each of the periods indicated:

	Nine months ended September 30, 2017	Year ended December 31,			
		2016	2015	2014	2013	2012
Ratio of earnings to fixed charges[1]	—	—	—	—	—	—

(1) Earnings were not sufficient to cover fixed charges for each of the periods indicated. Earnings consist of income (loss) before provision for income taxes plus fixed charges less income (loss) attributable to noncontrolling interest. Fixed charges consist of interest charges, amortization of debt expense and discount related to indebtedness, and that portion of rental payments under operating leases we believe to be representative of interest. Earnings for the nine months ended September 30, 2017, and for the years ended December 31, 2016, 2015, 2014, 2013 and 2012, were insufficient to cover fixed charges by $30.8, $52.0, $122.6, $96.0, $49.6 and $115.3 (in millions), respectively. For this reason, no ratios are provided for these periods.

USE OF PROCEEDS

We will retain broad discretion over the use of the net proceeds to us from the sale of our securities under this prospectus. Unless we indicate otherwise in the applicable prospectus supplement, we anticipate that any net proceeds will be used for general corporate purposes or for strategic acquisitions from time to time. General corporate purposes may include:

- increasing our working capital;
- funding research and development (including clinical trials); or
- repaying debt.

We may temporarily invest funds that we do not immediately use in short- and medium-term marketable securities. When we offer particular securities pursuant to this prospectus, we will set forth in the prospectus supplement our intended use for the net proceeds received from the sale of such securities.

DIVIDEND POLICY

We have never declared or paid any cash dividends on our common stock and do not currently anticipate declaring or paying cash dividends on our common stock in the foreseeable future. We currently intend to retain all of our future earnings, if any, to finance operations. Any future determination relating to our dividend policy will be made at the discretion of our board of directors and will depend on a number of factors, including future earnings, capital requirements, financial conditions, future prospects, contractual restrictions and other factors that our board of directors may deem relevant.

GENERAL DESCRIPTION OF CAPITAL STOCK

The following summaries of common stock and preferred stock do not purport to be complete and are subject to, and qualified in their entirety by, the provisions of our certificate of incorporation, which we refer to as our certificate of incorporation, our amended and restated bylaws, which we refer to as our bylaws, and all applicable provisions of Delaware law. Our certificate of incorporation and bylaws are incorporated by reference as exhibits to the registration statement of which this prospectus is a part. The particular terms of any offering of our securities will be described in a prospectus supplement relating to such offering.

We are authorized to issue 81,500,000 shares of common stock, par value $0.001 per share, and 33,333 shares of preferred stock, par value $0.001 per share. As of January 24, 2018, there were 42,983,990 shares of common stock outstanding and 575 shares of preferred stock (convertible into approximately 383,345 shares of common stock) outstanding and warrants to purchase 124,309 shares of common stock outstanding. In addition, as of January 24, 2018, 7,026,632 shares of common stock were reserved for issuance under our equity compensation plans, 183,527 shares of common stock were reserved for issuance under our employee stock purchase plan, one share of common stock was reserved for issuance upon exercise of outstanding restricted share rights and 10,000 shares of Series ZZ Junior Participating Cumulative Preferred Stock were reserved for issuance pursuant to our shareholders' rights plan.

DESCRIPTION OF COMMON STOCK

General

Each holder of common stock is generally entitled to one vote for each share held on all matters to be voted upon by the shareholders and there are no cumulative voting rights. Subject to preferences that may be applicable to any outstanding preferred stock, holders of common stock are entitled to receive ratably the dividends, if any, that are declared from time to time by the board of directors out of funds legally available for that purpose. In the event of our liquidation, dissolution or winding up, the holders of common stock are entitled to share in our assets remaining after the payment of liabilities and the satisfaction of any liquidation preference granted to the holders of any outstanding shares of preferred stock. Holders of common stock have no preemptive or conversion rights or other subscription rights. There are no redemption or sinking fund provisions applicable to the common stock. All outstanding shares of common stock are fully paid and non-assessable. The rights, preferences and privileges of the holders of common stock are subject to, and may be adversely affected by, the rights of the holders of shares of any series of preferred stock that we may designate in the future.

Transfer Agent and Registrar

The transfer agent and registrar for our common stock is Computershare Trust Company, N.A.

Listing

Our shares of common stock trade on The NASDAQ Capital Market under the symbol “CTIC.”

Certain Anti-Takeover Matters

Delaware law contains certain provisions that may have the effect of delaying, deterring or preventing a change in control of the Company. Section 203 of the DGCL prohibits us, with certain exceptions, from engaging in certain business combinations with an “interested shareholder” (defined generally as a person who owns 15% or more of our voting stock or is an affiliate of the Company and the owner of 15% of our voting stock within a 3 year period) for a period of three years following date that such shareholder becomes an interested shareholder. The prohibited transactions include, among others, a merger or consolidation with, disposition of assets to, or issuance or redemption of stock to or from, the interested shareholder, or any other receipt by the interested shareholder of a disproportionate benefit as a shareholder. Exceptions to this statutory prohibition include approval of the business combination or transaction which resulted in the shareholder becoming an interested shareholder by the board of directors, ownership of at least 85% of the voting stock of the Company outstanding at the time of the transaction or approval of the business combination and approval by the board of directors and holders of not less than two-thirds of the outstanding shares entitled to vote on the business combination which is not owned by the interested shareholder on or subsequent to the date of the business combination. The Company’s certificate of incorporation does not exclude the Company from the restrictions imposed under Section 203 of the DGCL. These statutory provisions may have the effect of delaying, deterring or preventing a change in control of the Company.

Prior to our annual meeting of shareholders held on May 22, 2014, our board of directors was classified and divided into three classes, with one class being elected at each annual shareholder meeting for a three year term. However, beginning with our annual meeting of shareholders held on May 22, 2014, successors to the class of directors whose term expires in the year of the annual meeting shall be elected for a term expiring at the next annual meeting of shareholders, such that our board of directors was declassified following our annual meeting of shareholders held in calendar year 2016, from which point, directors are elected annually, for terms of one year and until their successors are elected and qualified. Our bylaws provide that, in any election of directors, those candidates receiving the largest number of votes cast by the shares entitled to vote in the election, up to the number of directors to be elected by such shares, will be elected to our board of directors. Our bylaws also provide that any vacancy in our board of directors may be filled only by the affirmative vote of a majority of directors then in office, though less than a quorum. Further, our bylaws require a shareholder to provide notice to us of such shareholder’s intention to nominate a person or persons for election as directors not later than 90 days prior to the first anniversary of the previous year’s annual meeting or, in the case of an election to be held at a special meeting of the shareholders for the election of directors, the close of business on the tenth day following the date on which notice of such meeting is first given to shareholders. A shareholder must also provide us with notice of such shareholder’s intent to make any proposal at an annual meeting of shareholders not later than 90 days prior to the first anniversary of the previous year’s annual

meeting of shareholders. These provisions may have the effect of deterring hostile takeovers or delaying a change in control of our management.

Under our rights plan with Computershare Trust Company, N.A., as rights agent, dated as of December 28, 2009 and amended on August 31, 2012, December 3, 2012, December 1, 2015 and September 22, 2017, preferred stock purchase rights are attached to, and trade with, all of the shares of common stock outstanding as of, and issued subsequent to, the record date (as defined in the rights plan). Each right, if and when it becomes exercisable, will entitle the holder to purchase a unit consisting of two ten-thousandths of a share of Series ZZ Junior Participating Cumulative Preferred Stock, no par value per share, at a cash exercise price of $16.00 per unit, subject to standard adjustment in the rights plan. The rights will separate from the common stock and become exercisable if a person or group acquires 20% or more of our common stock. Upon acquisition of 20% or more of our common stock, the board could decide that each right (except those held by a 20% shareholder, which become null and void) would become exercisable entitling the holder to receive upon exercise, in lieu of a number of units of preferred stock, that number of shares of our common stock having a market value of two times the exercise price of the right. In certain circumstances, including if there are insufficient shares of our common stock to permit the exercise in full of the rights, the holder may receive units of preferred stock, other securities, cash or property, or any combination of the foregoing.

In addition, if we are acquired in a merger or other business combination transaction, each holder of a right, except those rights held by a 20% shareholder which become null and void, would have the right to receive, upon exercise, common stock of the acquiring company having a market value equal to two times the exercise price of the right. Our board of directors may redeem the rights for $0.0002 per right or terminate the rights plan at any time prior to an acquisition by a person or group holding 20% or more of our common stock.

DESCRIPTION OF PREFERRED STOCK

General

The rights, preferences, privileges and restrictions of the preferred stock of each series will be fixed by the certificate of amendment to the certificate of incorporation relating to that series and will be described in the applicable prospectus supplement. Our board of directors has the discretion to fix the number of shares of any such series and the designation thereof, and to fix and amend the powers, preferences and rights, and the limitations or restrictions granted to or imposed upon any wholly unissued series of preferred stock, including the voting rights, dividend rights, conversion rights, rights and terms of redemption (including sinking fund provisions), redemption prices and liquidation preferences of any such series. It is not possible to state the actual effects of the issuance of any shares of preferred stock upon the rights of holders of the common stock until our board of directors determines the specific rights of the holders of such preferred stock. However, the effects could include, among other things:

- restricting dividends on the common stock;
- diluting the voting power of the common stock;
- impairing the liquidation rights of the common stock; or
- delaying or preventing a change in control of the Company without further action by the shareholders.

As stated above, the applicable prospectus supplement will specify the terms of the series of preferred stock being offered, including the following:

- the number of shares of preferred stock being offered;
- the designation of the series of preferred stock;
- the per share purchase price of the preferred stock;
- the dividend rate or method of determining the dividend rate, if any, including whether the dividend rate is fixed or variable;
- the date or dates on which dividends will accrue and the dividend payment dates;
- whether dividends will be cumulative or non-cumulative and, if cumulative, the dates from which dividends will accrue;
- the price and the terms and conditions for redemption, if any, including redemption at our option or at the option of the holders, the time period for redemption, and any accumulated dividends or premiums;
- the liquidation preference, if any, and any accumulated dividends upon the liquidation, dissolution or winding up of our affairs;
- any sinking fund or similar provision, and, if so, the terms and provisions relating to the purpose and operation of the fund;
- the terms and conditions, if any, for conversion or exchange of preferred stock for any other class or classes of our securities, including the price or the rate of conversion or exchange and the method, if any, of adjustment;

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- the voting rights of the preferred stock;
- any exchange on which the preferred stock will be listed
- the transfer agent for the preferred stock; and
- any or all other preferences and relative, participating, optional or other special rights, privileges or qualifications, limitations or restrictions.

Rank

Unless otherwise specified in the applicable prospectus supplement, the preferred stock will, with respect to distribution rights and rights upon liquidation, dissolution or winding up of the company, rank (i) senior to our common stock and to any series of preferred stock which specifically provides that it will rank junior to the preferred stock being offered, (ii) junior to any series of preferred stock which specifically provides that it will rank senior to the preferred stock being offered and (iii) on parity with any other series of preferred stock.

The issuance of preferred stock will affect, and may adversely affect, the rights of holders of common stock. It is not possible to state the actual effect of the issuance of any shares of preferred stock on the rights of holders of common stock until our board of directors determines the specific rights attached to that preferred stock. The effects of issuing preferred stock could include one or more of the following:

- restricting dividends on the common stock;
- diluting the voting power of the common stock;
- impairing the liquidation rights of the common stock; or
- delaying or preventing changes in control or management of our company.

Dividend Rights

Holders of preferred stock will have the dividend rights set forth in the applicable prospectus supplement. Dividends on any series of preferred stock, if cumulative, will be cumulative from and after the date set forth in the applicable prospectus supplement. Any restriction on the repurchase or redemption of shares of preferred stock while dividends on such shares are in arrears shall be set forth in the applicable prospectus supplement.

Certain Anti-Takeover Matters

Refer to “Description of Common Stock—Certain Anti-Takeover Matters” for a discussion of provisions under Delaware law, our certificate of incorporation, bylaws and rights plan that may have the effect of delaying, deferring or preventing a change in control.

DESCRIPTION OF DEBT SECURITIES

This summary, together with the additional information we include in any applicable prospectus supplements, summarizes the material terms and provisions of the debt securities that we may offer under this prospectus. While the terms we have summarized below will generally apply to any future debt securities we may offer under this prospectus, we will describe the particular terms of any debt securities that we may offer in more detail in the applicable prospectus supplement. The terms of any debt securities we offer under a prospectus supplement may differ from the terms we describe below.

The debt securities may be either secured or unsecured and will either be senior debt securities or subordinated debt securities. We will issue the senior notes under the senior indenture which we will enter into with one or more trustees. We will issue the subordinated notes under the subordinated indenture which we will enter into with one or more trustees. We have filed forms of these documents as exhibits to the registration statement of which this prospectus forms a part. We use the term “indentures” to refer to both the senior indenture and the subordinated indenture.

The indentures will be qualified under the Trust Indenture Act of 1939, as amended, or the Trust Indenture Act. We use the term “debenture trustee” to refer to either the senior trustee or the subordinated trustee, as applicable.

The following summaries of the material provisions of the senior notes, the subordinated notes and the indentures are subject to, and qualified in their entirety by reference to, all of the provisions of the indenture applicable to a particular series of debt securities. We urge you to read the applicable prospectus supplements related to the debt securities that we sell under this prospectus, as well as the complete indentures that contain the terms of the debt securities. Except as we may otherwise indicate, the terms of the senior indenture and the subordinated indenture are identical.

General

We will describe in the applicable prospectus supplement the terms relating to a series of debt securities, including, to the extent applicable:

- the title;
- the principal amount being offered and, if a series, the total amount authorized and the total amount outstanding;
- any limit on the amount that may be issued;
- whether or not we will issue the series of debt securities in global form and, if so, the terms and who the depositary will be;
- the maturity date;
- the principal amount due at maturity and whether the debt securities will be issued with any original issue discount;
- whether and under what circumstances, if any, we will pay additional amounts on any debt securities held by a person who is not a U.S. person for U.S. federal income tax purposes, and whether we can redeem the debt securities if we have to pay such additional amounts;
- the interest rate, which may be fixed or variable, or the method for determining the rate, the date interest will begin to accrue, the dates interest will be payable and the regular record dates for interest payment dates or the method for determining such dates;
- the rate or rates of amortization of the debt securities;

- whether or not the debt securities will be secured or unsecured, the terms of any secured debt and the properties secured by any such debt;
- whether or not the debt securities will be senior or subordinated, and the terms of the subordination of any series of subordinated debt;
- the place where payments will be payable;
- restrictions on transfer, sale or other assignment, if any;
- our right, if any, to defer payment of interest and the maximum length of any such deferral period;
- the date, if any, after which, the conditions upon which, and the price at which we may, at our option, redeem the series of debt securities pursuant to any optional or provisional redemption provisions, and any other applicable terms of those redemption provisions;
- provisions for a sinking fund, purchase or other analogous fund, if any;
- the date, if any, on which, and the price at which we are obligated, pursuant to any mandatory sinking fund or analogous fund provisions or otherwise, to retire, redeem, or at the holder's option to purchase, the series of debt securities;
- whether the indenture will restrict our ability and/or the ability of our subsidiaries to:

§ incur additional indebtedness;

§ issue additional securities;

§ create liens;

§ pay dividends and make distributions in respect of our capital stock and the capital stock of our subsidiaries;

§ redeem capital stock;

§ place restrictions on our subsidiaries' ability to pay dividends, make distributions or transfer assets;

§ make investments or other restricted payments;

§ sell or otherwise dispose of assets;

§ enter into sale-leaseback transactions;

§ engage in transactions with shareholders and affiliates;

§ issue or sell stock of our subsidiaries; or

§ effect a consolidation or merger;

- whether the indenture will require us to maintain any interest coverage or other financial reserve, fixed charge, cash flow-based, asset-based or other financial ratios;
- a discussion of any material or special U.S. federal income tax considerations applicable to the debt securities;
- information describing any book-entry features;
- the procedures for any auction and remarketing, if any;
- the denominations in which we will issue the series of debt securities, if other than denominations of $1,000 and any integral multiple thereof;
- if other than U.S. dollars, the currency in which the series of debt securities will be denominated; and
- any other specific terms, preferences, rights or limitations of, or restrictions on, the debt securities, including any events of default that are in addition to those described in this prospectus or any covenants provided with respect to the debt securities that are in addition to those described above, and any terms which may be required by us or advisable under applicable laws or regulations or advisable in connection with the marketing of the debt securities.

Conversion or Exchange Rights

We will set forth in the applicable prospectus supplements the terms on which a series of debt securities may be convertible into or exchangeable for common stock or other securities of ours or a third party, including the conversion or exchange rate, as applicable, or how it will be calculated, and the applicable conversion or exchange period. We will include provisions as to whether conversion or exchange is mandatory, at the option of the holder or at our option. We may include provisions pursuant to which the number of our securities or the securities of a third party that the holders of the series of debt securities receive upon conversion or exchange would, under the circumstances described in those provisions, be subject to adjustment, or pursuant to which those holders would, under those circumstances, receive other property upon conversion or exchange, for example in the event of our merger or consolidation with another entity.

Consolidation, Merger or Sale

The indentures in the form initially filed as exhibits to the registration statement of which this prospectus forms a part do not contain any covenant that restricts our ability to merge or consolidate, or sell, convey, transfer or otherwise dispose of all or substantially all of our assets. However, any successor of ours or acquirer of such assets must assume all of our obligations under the indentures and the debt securities.

If the debt securities are convertible into our other securities, the person with whom we consolidate or merge or to whom we sell all of our property must make provisions for the conversion of the debt securities into securities which the holders of the debt securities would have received if they had converted the debt securities before the consolidation, merger or sale.

Events of Default Under the Indentures

Unless otherwise specified in the applicable prospectus supplement, the following are events of default under the indentures with respect to any series of debt securities that we may issue:

- if we fail to pay interest when due and payable and our failure continues for 90 days and the time for payment has not been validly extended;

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- if we fail to pay the principal, or premium, if any, or to make payment required by any sinking fund or analogous fund when due and payable and the time for payment has not been validly extended;

- if we fail to observe or perform any other covenant contained in the debt securities or the indentures, other than a covenant specifically relating to another series of debt securities, and our failure continues for 90 days after we receive notice from the debenture trustee or holders of at least 25% in aggregate principal amount of the outstanding debt securities of the applicable series; and

- if specified events of bankruptcy, insolvency or reorganization occur.

If an event of default with respect to debt securities of any series occurs and is continuing, other than an event of default specified in the last bullet point above, the debenture trustee or the holders of at least 25% in aggregate principal amount of the outstanding debt securities of that series may, by notice to us in writing (and to the debenture trustee if notice is given by such holders), declare the unpaid principal, premium, if any, and accrued interest, if any, due and payable immediately. If an event of default specified in the last bullet point above occurs with respect to us, the principal amount of and accrued interest, if any, of each series of debt securities then outstanding shall be due and payable without any notice or other action on the part of the debenture trustee or any holder.

The holders of a majority in principal amount of the outstanding debt securities of an affected series may waive any default or event of default with respect to the series and its consequences, except defaults or events of default regarding payment of principal, premium, if any, or interest, unless we have cured the default or event of default in accordance with the indenture.

Subject to the terms of the indentures, if an event of default under an indenture shall occur and be continuing, the debenture trustee will be under no obligation to exercise any of its rights or powers under such indenture at the request or direction of any of the holders of the applicable series of debt securities, unless such holders have offered the debenture trustee reasonable indemnity. The holders of a majority in principal amount of the outstanding debt securities of any series will have the right to direct the time, method and place of conducting any proceeding for any remedy available to the debenture trustee, or exercising any trust or power conferred on the debenture trustee, with respect to the debt securities of that series, provided that:

- the direction so given by the holder is not in conflict with any law or the applicable indenture; and

- subject to its duties under the Trust Indenture Act, the debenture trustee need not take any action that might involve it in personal liability or might be unduly prejudicial to the holders not involved in the proceeding.

A holder of the debt securities of any series will only have the right to institute a proceeding under the indentures or to appoint a receiver or trustee, or to seek other remedies, if:

- the holder has given written notice to the debenture trustee of a continuing event of default with respect to that series;

- the holders of at least 25% in aggregate principal amount of the outstanding debt securities of that series have made written request, and such holders have offered reasonable indemnity to the debenture trustee, to institute the proceeding as trustee; and

- the debenture trustee does not institute the proceeding, and does not receive from the holders of a majority in aggregate principal amount of the outstanding debt securities of that series other conflicting directions, within 90 days after the notice, request and offer.

These limitations do not apply to a suit instituted by a holder of debt securities if we default in the payment of the principal, premium, if any, or interest on the debt securities.

We will be required to deliver to the debenture trustee, within 120 days after the end of each fiscal year during which any debt securities were outstanding, a certificate stating whether the signors know that any default or event of default occurred during such fiscal year, as well as certain other reports.

Modification of Indenture; Waiver

We and the debenture trustee may modify an indenture without the consent of any holders with respect to specific matters, including, without limitation:

- to fix any ambiguity, defect or inconsistency in the indenture or in the debt securities of any series;
- to comply with the provisions described above under “Consolidation, Merger or Sale”;
- to comply with any requirements of the SEC in connection with the qualification of any indenture under the Trust Indenture Act;
- to evidence and provide for the acceptance of appointment under the indenture by a successor trustee;
- to provide for uncertificated debt securities in addition to or in place of certificated securities and to make all appropriate changes for such purpose;
- to add to, delete from, or revise the conditions, limitations and restrictions on the authorized amount, terms or purposes of issuance, authentication and delivery of debt securities of any series;
- to provide for the issuance of and establish the form and terms and conditions of the debt securities of any series authorized pursuant to the indentures, to establish the form of any certifications required to be furnished pursuant to the indentures or any series or to add to the rights of the holders of any series of debt securities;
- to add to our covenants such new covenants, restrictions, conditions or provisions for the protection of the holders, to make the occurrence, or the occurrence and the continuance, of a default in any such additional covenants, restrictions, conditions or provisions an event of default, or to surrender any of our rights or powers under the indenture; or
- to change anything that does not adversely affect the rights of any holder of debt securities of any series in any material respect.

In addition, under the indentures, the rights of holders of debt securities of any series may be changed by us and the debenture trustee with the written consent of the holders of at least a majority in aggregate principal amount of the outstanding debt securities of each series that is affected. However, we and the debenture trustee may only make the following changes with the consent of each holder of any outstanding debt securities affected:

- extending the fixed maturity of the debt securities of any series;
- reducing the principal amount, reducing the rate of or extending the time of payment of interest or reducing any premium payable upon the redemption of any debt securities; or
- reducing the percentage of debt securities the holders of which are required to consent to any supplemental indenture.

Discharge

The indentures provide that we can elect to be discharged from our obligations with respect to one or more series of debt securities, except for certain obligations, including obligations to:

- register the transfer or exchange of debt securities of the series;
- replace mutilated, destroyed, lost or stolen debt securities of the series;
- maintain paying agencies;
- compensate and indemnify the debenture trustee; and
- appoint any successor trustee.

In order to exercise our rights to be discharged, we must deposit with the debenture trustee money or government obligations, or a combination of both, sufficient to pay all of the principal, premium, if any, and interest on the debt securities of the series on the dates payments are due.

Form, Exchange and Transfer

We will issue the debt securities of each series only in fully registered form without coupons and, unless we otherwise specify in the applicable prospectus supplement, in denominations of $1,000 and any integral multiple thereof. The indentures provide that we may issue debt securities of a series in temporary or permanent global form and as book-entry securities that will be deposited with, or on behalf of, The Depository Trust Company, New York, New York, known as DTC, or another depositary named by us and identified in a prospectus supplement with respect to that series.

At the option of the holder, subject to the terms of the indentures and the limitations applicable to global securities described in the applicable prospectus supplement, the holder of the debt securities of any series can exchange the debt securities for other debt securities of the same series, in any authorized denomination and of like tenor and aggregate principal amount.

Subject to the terms of the indentures and the limitations applicable to global securities set forth in the applicable prospectus supplements, holders of the debt securities may present the debt securities for exchange or for registration of transfer, duly endorsed or with the form of transfer endorsed thereon duly executed if so required by us or the security registrar, at the office of the security registrar or at the office of any transfer agent designated by us for this purpose. Unless otherwise provided in the debt securities that the holder presents for transfer or exchange, we will not impose a service charge for any registration of transfer or exchange, but we may require payment of any taxes or other governmental charges applicable to or associated with such registration of transfer or exchange.

We will name in the applicable prospectus supplements the security registrar, and any transfer agent in addition to the security registrar, that we initially designate for any debt securities. We may at any time designate additional transfer agents or rescind the designation of any transfer agent or approve a change in the office through which any transfer agent acts, except that we will be required to maintain a transfer agent in each place of payment for the debt securities of each series.

If we elect to redeem the debt securities of any series, we will not be required to:

- issue, register the transfer of, or exchange any debt securities of any series being redeemed in part during a period beginning at the opening of business 15 days before the day of mailing of a notice of redemption of any debt securities that may be selected for redemption and ending at the close of business on the day of the mailing; or
- register the transfer of or exchange any debt securities so selected for redemption, in whole or in part, except the unredeemed portion of any debt securities we are redeeming in part.

Information Concerning the Debenture Trustee

The debenture trustee, other than during the occurrence and continuance of an event of default under an indenture, undertakes to perform only those duties as are specifically set forth in the applicable indenture. Upon an event of default under an indenture, the debenture trustee must use the same degree of care as a prudent person would exercise or use in the conduct of his or her own affairs. Subject to this provision, the debenture trustee is under no obligation to exercise any of the powers given it by the indentures at the request of any holder of debt securities unless it is offered reasonable security and indemnity against the costs, expenses and liabilities that it might incur.

Payment and Paying Agents

Unless we otherwise indicate in the applicable prospectus supplement, we will make payment of the interest on any debt securities on any interest payment date to the person in whose name the debt securities, or one or more predecessor securities, are registered at the close of business on the regular record date for the interest.

We will pay principal of, and any premium and interest on, the debt securities of a particular series at the office of the paying agents designated by us, except that, unless we otherwise indicate in the applicable prospectus supplement, we may make certain payments by check which we will mail to the holder or by wire transfer to certain holders. Unless we otherwise indicate in a prospectus supplement, we will designate an office or agency of the debenture trustee in the city of New York as our sole paying agent for payments with respect to debt securities of each series. We will name in the applicable prospectus supplement any other paying agents that we initially designate for the debt securities of a particular series. We will maintain a paying agent in each place of payment for the debt securities of a particular series.

All money we pay to a paying agent or the debenture trustee for the payment of the principal of or any premium or interest on any debt securities which remains unclaimed at the end of two years after such principal, premium or interest has become due and payable will be repaid to us, and the holder of the debt security thereafter may look only to us for payment thereof.

No Protection in the Event of a Change in Control

Unless otherwise indicated in a prospectus supplement with respect to a particular series of debt securities, the debt securities will not contain any provisions that may afford holders of the debt securities protection in the event we have a change in control or in the event of a highly leveraged transaction, whether or not such transaction results in a change in control.

No Personal Liability of Directors, Officers, Employees and Shareholders

No incorporator, shareholder, employee, agent, officer, director or subsidiary of ours will have any liability for any obligations of ours, or because of the creation of any indebtedness under the debt securities, the indentures or supplemental indentures. The indentures provide that all such liability is expressly waived and released as a condition of, and as a consideration for, the execution of such indentures and the issuance of the debt securities.

Governing Law

The indentures and the debt securities will be governed by and construed in accordance with the laws of the state of New York, except to the extent that the Trust Indenture Act is applicable.

Subordination of Subordinated Debt Securities

The subordinated debt securities will be subordinate and junior in priority of payment to certain of our other indebtedness to the extent described in a prospectus supplement. The indentures in the form initially filed as exhibits to the registration statement of which this prospectus forms a part do not limit the amount of indebtedness which we may incur, including senior indebtedness or subordinated indebtedness, and do not limit us from issuing any other debt, including secured debt or unsecured debt. Additional or different subordination provisions may be described in a prospectus supplement relating to a particular series of debt securities.

DESCRIPTION OF WARRANTS

This summary, together with the additional information we include in any applicable prospectus supplements, summarizes the material terms and provisions of the warrants that we may offer under this prospectus, which consist of warrants to purchase our common stock, preferred stock and/or debt securities in one or more series. Warrants may be offered independently or together with our common stock, preferred stock, debt securities and/or rights offered by any prospectus supplement, and may be attached to or separate from those securities. While the terms we have summarized below will generally apply to any future warrants we may offer under this prospectus, we will describe the particular terms of any warrants that we may offer in more detail in the applicable prospectus supplement. The terms of any warrants we offer under a prospectus supplement may differ from the terms we describe below.

We will issue the warrants directly or under a warrant agreement which we will enter into with a warrant agent to be selected by us. Each series of warrants will be issued under a separate warrant agreement to be entered into between us and a bank or trust company, as warrant agent, all as set forth in the prospectus supplement relating to the particular issue of offered warrants. We use the term “warrant agreement” to refer to any of these warrant agreements. We use the term “warrant agent” to refer to the warrant agent under any of these warrant agreements. The warrant agent will act solely as an agent of ours in connection with the warrants and will not act as an agent for the holders or beneficial owners of the warrants.

The following summary of material provisions of the warrants and the warrant agreements are subject to, and qualified in their entirety by reference to, all of the provisions of the warrant agreement applicable to a particular series of warrants. We urge you to read the applicable prospectus supplements related to the warrants that we sell pursuant to this prospectus, as well as the complete warrant agreements that contain the terms of the warrants.

General

We will describe in the applicable prospectus supplements the terms relating to a series of warrants.

If warrants for the purchase of securities are offered, the prospectus supplement will describe the following terms, to the extent applicable:

- the number of shares of common stock or preferred stock purchasable upon the exercise of warrants to purchase such shares and the price at which such number of shares may be purchased upon such exercise (as well as provision for changes to or adjustments in such exercise price);
- the currencies in which the warrants are being offered;
- the designation, stated value and terms (including, without limitation, liquidation, dividend, conversion and voting rights) of the series of preferred stock purchasable upon exercise of warrants to purchase preferred stock;
- the principal amount of debt securities that may be purchased upon exercise of a debt warrant and the exercise price for the warrants, which may be payable in cash, securities or other property, together with the designation, denominations, currencies and other terms of the debt securities purchasable upon exercise of debt warrants;
- the date on and after which the holder of the warrants can transfer them separately from the related security;
- the principal amount of the series of debt securities that can be purchased if a holder exercises a warrant and the price at which and currencies in which such principal amount may be purchased upon exercise;
- the terms of any anti-dilution or other adjustment provisions;
- the terms of any mandatory or optional call or redemption of the warrants;

- the date on which the right to exercise the warrants begins and the date on which such right expires, and any expiration acceleration provisions;
- the number of warrants outstanding, if any;
- a discussion of any material U.S. federal income tax considerations applicable to the warrants;
- whether the warrants are issued pursuant to a warrant agreement with a warrant agent or issued directly by us;
- the number of warrants then-outstanding, if any; and
- any other specific terms, preferences, rights or limitations of, or restrictions on, the warrants.

A holder of warrant certificates may exchange them for new certificates of different denominations, present them for registration of transfer and exercise them at the corporate trust office of the warrant agent or any other office indicated in the applicable prospectus supplement. Until any warrants to purchase debt securities are exercised, the holder of the warrants will not have any of the rights of holders of the related security that can be purchased upon exercise, including any rights to:

- receive notice as shareholders with respect to any meeting of shareholders for the election of our directors or any other matter;
- exercise any rights as shareholders; or
- receive payments of principal, premium or interest on any underlying debt securities or to enforce covenants in the applicable indenture.

Exercise of Warrants

Warrants may be exercised at the applicable price at any time up to the close of business on the expiration date set forth in the applicable prospectus supplement or other offering material. After the close of business on the expiration date, unexercised warrants will become void.

Warrants may be exercised in the method(s) as set forth in the applicable prospectus supplement or other offering material. Upon receipt of payment and the warrant certificate properly completed and duly executed at the corporate trust office of the warrant agent or any other office indicated in the prospectus supplement or other offering material, we will forward, as soon as practicable, the securities purchasable upon such exercise.

Amendments and Supplements to the Warrant Agreements

We may amend or supplement a warrant agreement without the consent of the holders of the applicable warrants to cure ambiguities in the warrant agreement, to cure, correct or supplement a defective provision in the warrant agreement, or to provide for other matters under the warrant agreement that we and the warrant agent deem necessary or desirable, so long as, in each case, such amendments or supplements do not materially adversely affect the interests of the holders of the warrants.

Warrant Adjustments

Unless the applicable prospectus supplements state otherwise, the exercise price of, and the number of securities covered by, a common stock warrant or preferred stock warrant will be adjusted proportionately if we subdivide or combine our common stock or preferred stock, as applicable.

In addition, unless the prospectus supplements state otherwise, if we, without payment therefor:

- issue capital stock or other securities convertible into or exchangeable for common stock or preferred stock, or any rights to subscribe for, purchase or otherwise acquire any of the foregoing, as a dividend or distribution to holders of our common stock or preferred stock;
- pay any cash to holders of our common stock or preferred stock other than a cash dividend paid out of our current or retained earnings or other than in accordance with the terms of the preferred stock;
- issue any evidence of our indebtedness or rights to subscribe for or purchase our indebtedness to holders of our common stock or preferred stock; or
- issue common stock or preferred stock or additional stock or other securities or property to holders of our common stock or preferred stock by way of spinoff, split-up, reclassification, combination of shares or similar corporate rearrangement;

then the holders of common stock warrants and preferred stock warrants, as applicable, will be entitled to receive upon exercise of the warrants, in addition to the securities otherwise receivable upon exercise of the warrants and without paying any additional consideration, the amount of stock and other securities and property such holders would have been entitled to receive had they held the common stock or preferred stock, as applicable, issuable under the warrants on the dates on which holders of those securities received or became entitled to receive such additional stock and other securities and property.

Except as stated above, the exercise price and number of securities covered by a common stock warrant or preferred stock warrant, and the amounts of other securities or property to be received, if any, upon exercise of those warrants, will not be adjusted or provided for if we issue those securities or any securities convertible into or exchangeable for those securities, or securities carrying the right to purchase those securities or securities convertible into or exchangeable for those securities.

Holders of common stock warrants and preferred stock warrants may have additional rights under the following circumstances:

- certain reclassifications, capital reorganizations or changes of the common stock or preferred stock, as applicable;
- certain share exchanges, mergers, or similar transactions involving us and which result in changes of the common stock or preferred stock, as applicable; or
- certain sales or dispositions to another entity of all or substantially all of our property and assets.

If one of the above transactions occurs and holders of our common stock or preferred stock are entitled to receive stock, securities or other property with respect to or in exchange for their securities, the holders of the common stock warrants and preferred stock warrants then outstanding, as applicable, will be entitled to receive upon exercise of their warrants the kind and amount of shares of stock and other securities or property that they would have received upon the applicable transaction if they had exercised their warrants immediately before the transaction.

DESCRIPTION OF RIGHTS

This summary, together with the additional information we include in any applicable prospectus supplements, summarizes the material terms and provisions of the rights that we may offer under this prospectus, which consist of rights to purchase our common stock, preferred stock and/or debt securities in one or more series. Rights may be offered independently or together with our common stock, preferred stock, debt securities and/or warrants offered by any prospectus supplement, and may be attached to or separate from those securities. While the terms we have summarized below will generally apply to any future rights we may offer pursuant to this prospectus, we will describe the particular terms of any rights that we may offer in more detail in the applicable prospectus supplements. The terms of any rights we offer under a prospectus supplement may differ from the terms we describe below.

The applicable prospectus supplements relating to any rights that we offer will include specific terms of any offering of rights for which this prospectus is being delivered, including the following, to the extent applicable:

- the date for determining the persons entitled to participate in the rights distribution;
- the price, if any, per right;
- the exercise price payable for each share of common stock, share of preferred stock or debt security upon the exercise of the rights;
- the number of rights issued or to be issued to each holder;
- the number and terms of the shares of common stock, shares of preferred stock or debt securities that may be purchased per each right;
- the extent to which the rights are transferable;
- any other terms of the rights, including the terms, procedures and limitations relating to the exchange and exercise of the rights;
- the respective dates on which the holder’s ability to exercise the rights will commence and will expire;
- the number of rights outstanding, if any;
- a discussion of any material U.S. federal income tax considerations applicable to the rights;
- the extent to which the rights may include an over-subscription privilege with respect to unsubscribed securities or an over-allotment privilege to the extent the securities are fully subscribed; and
- if applicable, the material terms of any standby underwriting or purchase arrangement entered into by us in connection with the offering of such rights.

The description in the applicable prospectus supplements of any rights that we may offer will not necessarily be complete and will be qualified in its entirety by reference to the applicable rights agreement and/or rights certificate, which will be filed with the SEC in connection therewith. Therefore, you should carefully consider the actual provisions of the rights, the rights agreement and the applicable securities.

DESCRIPTION OF UNITS

This summary, together with the additional information we include in any applicable prospectus supplements, summarizes the material terms and provisions of the units that we may offer under this prospectus, which may consist of one or more shares of common stock, shares of preferred stock, debt securities, warrants, rights or any combination of such securities. While the terms we have summarized below will generally apply to any future units we may offer pursuant to this prospectus, we will describe the particular terms of any units that we may offer in more detail in the applicable prospectus supplements. The terms of any units we offer under a prospectus supplement may differ from the terms we describe below.

The applicable prospectus supplements relating to any units that we offer will include specific terms of any offering of units for which this prospectus is being delivered, including the following, to the extent applicable:

- the designation and terms of the units and of the securities comprising the units, including whether and under what circumstances those securities may be held or transferred separately;
- whether we will apply to have the units traded on a securities exchange or securities quotation system;
- a discussion of any material U.S. federal income tax considerations applicable to the units; and
- how, for U.S. federal income tax purposes, the purchase price paid for the units is to be allocated among the component securities.

The description in the applicable prospectus supplements of any units that we may offer will not necessarily be complete and will be qualified in its entirety by reference to the applicable unit agreement, which will be filed with the SEC in connection therewith. Therefore, you should carefully consider the actual provisions of the units, the units agreement and the applicable securities.

PLAN OF DISTRIBUTION

We may sell the securities offered pursuant to this prospectus and any accompanying prospectus supplements from time to time through underwritten public offerings, negotiated transactions, block trades or a combination of these methods or in one or more transactions:

- to or through one or more underwriters or dealers;
- to investors directly;
- through agents; or
- through any combination of these methods of sale.

Our securities may be offered and sold from time to time in one or more transactions at:

- a fixed price or prices, which may be changed;
- market prices prevailing at the time of sale;
- prices related to the prevailing market prices; or
- negotiated prices.

Any of the prices at which we sell securities may be at a discount to market prices. Broker-dealers may also receive from us, as applicable, or the purchasers of the securities compensation that is not expected to exceed that customary in the types of transactions involved.

Each prospectus supplement, to the extent applicable, will describe the number and terms of the securities to which such prospectus supplement relates, including:

- any over-allotment options under which underwriters, if any, may purchase additional securities;
- the name or names of any underwriters, dealers or agents with whom we have entered into an arrangement with respect to the sale of such securities;
- the public offering or purchase price of such securities;
- any underwriting discounts, commissions or agency fees or other items constituting underwriter or agent compensation;
- any discounts, commissions or concessions allowed or reallowed or paid to dealers;
- any securities exchanges or markets on which the securities may be listed;
- any delayed delivery arrangements; and
- estimated offering expenses and the net proceeds we will receive from such sale.

We may engage in at-the-market offerings into an existing trading market in accordance with Rule 415(a)(4) under the Securities Act or the Exchange Act. Any at-the-market offering will be through an underwriter or underwriters acting as principal or agent for us.

Underwritten Offerings

If underwriters are used in the sale of any securities, the securities will be acquired by the underwriters for their own account and may be resold from time to time in one or more transactions described above. The applicable prospectus supplement will name any underwriter involved in a sale of securities. Such securities may be either offered to the public through underwriting syndicates represented by managing underwriters, or directly by underwriters. Underwriters may sell the securities to or through dealers, and such dealers may receive compensation in the form of discounts. Generally, the underwriters' obligations to purchase the securities will be subject to conditions precedent and the underwriters will be obligated to purchase all of the securities if they purchase any of the securities. We may use underwriters with whom we have a material relationship. We will describe any such underwriters in the applicable prospectus supplement, naming the underwriter and the nature of any such relationship.

Direct Sales and Sales through Agents

We may sell securities directly to purchasers. Such purchasers may be institutional investors or others who may be deemed to be underwriters within the meaning of the Securities Act, with respect to any sale of those securities. We also may, from time to time, authorize dealers or agents to offer and sell these securities, upon such terms and conditions as may be set forth in the applicable prospectus supplement, if applicable. In order to comply with the securities laws of certain states, if applicable, the securities offered will be sold in such jurisdictions only through registered or licensed brokers or dealers. In addition, in certain states securities may not be sold unless they have been registered or qualified for sale in the applicable state or an exemption from the registration or qualification requirement is available and is complied with. This prospectus, one or more prospectus supplements, and the registration statement of which this prospectus forms a part may be used in conjunction with one or more other registration statements to the extent permitted by the Securities Act and the rules and regulations promulgated thereunder.

Rights Offerings

We also may sell directly to investors through subscription rights distributed to our shareholders on a pro rata basis. In connection with any distribution of subscription rights to shareholders, if all of the underlying securities are not subscribed for, we may sell the unsubscribed shares of our securities directly to third parties or may engage the services of one or more underwriters, dealers or agents, including standby underwriters, to sell the unsubscribed securities to third parties.

We may also sell securities in one or more of the following transactions:

- block transactions (which may involve crosses) in which a broker-dealer may sell all or a portion of the shares as agent but may position and resell all or a portion of the block as principal to facilitate the transaction;
- purchases by a broker-dealer as principal and resale by the broker-dealer for its own account;
- ordinary brokerage transactions and transactions in which a broker-dealer solicits purchasers;
- sales "at the market" to or through a market maker or into an existing trading market, on an exchange or otherwise, for securities; and
- sales in other ways not involving a market maker or established trading markets, including direct sales to purchasers.

We may also enter into derivative transactions with third parties, or sell securities not covered by this prospectus to third parties in privately negotiated transactions. In connection with those derivatives, the third parties may sell securities covered by this prospectus and the applicable prospectus supplement, including in short sale transactions. If so, the third party may use securities pledged by us or borrowed from us or others to settle those sales or to close out

any related open borrowings of

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stock, and may use securities received from us in settlement of those derivatives to close out any related open borrowings of stock. The third party in such sale transactions will be an underwriter and will be identified in the applicable prospectus supplement or in a post-effective amendment to the registration statement of which this prospectus forms a part.

Any dealers or agents that participate in the distribution of securities may be deemed to be underwriters under the Securities Act, and in such event, any discounts or commissions received by them and any profit realized by them on the resale of securities they realize may be deemed to be underwriting discounts and commissions under the Securities Act.

Indemnification

Underwriters, dealers and agents and remarketing firms may be entitled, under agreements entered into with us, to indemnification against and contribution toward certain civil liabilities, including liabilities under the Securities Act, or to contribute with respect to payments that the agents, dealers, underwriters or remarketing firms may be required to make.

Stabilization

In connection with any offering of the securities hereby, certain underwriters and selling group members and their respective affiliates may engage in transactions that stabilize, maintain or otherwise affect the market price of the applicable securities. These transactions may include stabilization transactions pursuant to which these persons may bid for or purchase securities for the purpose of stabilizing their market price.

The underwriters in an offering of securities may also create a “short position” for their account by selling more securities in connection with the offering than they are committed to purchase from us. In that case, the underwriters could cover all or a portion of the short position by either purchasing securities in the open market following completion of the offering of these securities or by exercising any over-allotment option granted to them by us. In addition, the managing underwriter may impose “penalty bids” under contractual arrangements with other underwriters, which means that it can reclaim from an underwriter (or any selling group member participating in the offering) for the account of the other underwriters, the selling concession for the securities that are distributed in the offering but subsequently purchased for the account of the underwriters in the open market. Any of the transactions described in this paragraph or comparable transactions that are described in any accompanying prospectus supplement may result in the maintenance of the price of the securities at a level above that which might otherwise prevail in the open market. None of the transactions described in this paragraph or in an accompanying prospectus supplement are required to be taken by an underwriter and, if they are undertaken, may be discontinued at any time.

Under applicable rules and regulations under the Exchange Act, under certain circumstances a person engaged in the distribution of the securities offered under this prospectus and the accompanying prospectus supplement may not simultaneously engage in market making activities with respect to our securities for a specified period prior to the commencement of such distribution.

Passive Market-Making on NASDAQ

Any underwriters who are qualified market makers on The NASDAQ Capital Market may engage in passive market making transactions in our common stock on The NASDAQ Capital Market in accordance with Rule 103 of Regulation M. Passive market makers must comply with applicable volume and price limitations and must be identified as passive market makers. In general, a passive market maker must display its bid at a price not in excess of the highest independent bid for such security; if all independent bids are lowered below the passive market making bid, however, the passive market making bid must then be lowered when certain purchase limits are exceeded.

Remarketing Arrangements

Offered securities may also be offered and sold in connection with a remarketing upon their purchase, in accordance with a redemption or repayment pursuant to their terms, or otherwise, by one or more remarketing firms, acting as principals for their own accounts or as agents for us. We will identify any remarketing firm and describe the terms of its agreements, if any, with us and its compensation in the applicable prospectus supplement.

Delayed Delivery Contracts

If indicated in the applicable prospectus supplement, we will authorize dealers acting as our agents to solicit offers by institutions to purchase securities covered by this prospectus from us at the public offering price set forth in the relevant prospectus supplement under delayed delivery contracts providing for payment and delivery on the date or dates stated in the relevant prospectus supplement. Each delayed delivery contract will be for an amount not less than, and the aggregate principal amount of securities sold pursuant to delayed delivery contracts shall be not less nor more than, the respective amounts stated in the applicable prospectus supplement. Institutions with whom delayed delivery contracts, when authorized, may be made include commercial and savings banks, insurance companies, pension funds, investment companies, educational and charitable institutions, and other institutions, but will in all cases be subject to our approval. Delayed delivery contracts will not be subject to any conditions except (i) the purchase by an institution of the securities covered by its delayed delivery contracts may not at the time of delivery be prohibited under the laws of any jurisdiction in the United States to which the institution is subject, and (ii) if the securities are being sold to underwriters, we will be required to have sold to such underwriters the total principal amount of the securities less the principal amount thereof covered by delayed delivery contracts. The underwriters and any other agents will not have any responsibility in respect of the validity or performance of delayed delivery contracts.

Electronic Auctions

We may also make sales through the Internet or through other electronic means. Since we may from time to time elect to offer securities directly to the public, with or without the involvement of agents, underwriters or dealers, utilizing the Internet or other forms of electronic bidding or ordering systems for the pricing and allocation of such securities, you will want to pay particular attention to the description of that system we will provide in the applicable prospectus supplement.

Such electronic system may allow bidders to directly participate, through electronic access to an auction site, by submitting conditional offers to buy that are subject to acceptance by us, and which may directly affect the price or other terms and conditions at which such securities are sold. These bidding or ordering systems may present to each bidder, on a so-called “real-time” basis, relevant information to assist in making a bid, such as the clearing spread at which the offering would be sold, based on the bids submitted, and whether a bidder’s individual bids would be accepted, prorated or rejected. For example, in the case of debt security, the clearing spread could be indicated as a number of “basis points” above an index treasury note. Of course, many pricing methods can and may also be used.

Upon completion of such an electronic auction process, securities will be allocated based on prices bid, terms of bid or other factors. The final offering price at which securities would be sold and the allocation of securities among bidders would be based in whole or in part on the results of the Internet or other electronic bidding process or auction

Other Relationships

Underwriters, dealers, agents and remarketing firms may engage in transactions with, or perform services for, us and our affiliates in the ordinary course of business for which they receive customary compensation. Unless we specify otherwise in the related prospectus supplement, each class or series of securities will be a new issue with no established trading market, other than shares of our common stock, which are listed on The NASDAQ Capital Market. It is possible that one or more underwriters may make a market in our securities, but will not be obligated to do so and may discontinue any market making at any time without notice. Therefore, no assurance can be given as to the liquidity of the trading market for our securities.

General Information

The specific terms of any lock-up provisions in respect of any given offering will be described in the applicable prospectus supplement.

In compliance with guidelines of the Financial Industry Regulatory Authority, Inc., or FINRA, the maximum consideration or discount to be received by any FINRA member or independent broker dealer presently will not exceed 8% of the aggregate amount of the securities offered pursuant to this prospectus and any applicable prospectus supplement.

LEGAL MATTERS

Certain legal matters in connection with the securities offered hereby will be passed upon for us by O'Melveny & Myers LLP, San Francisco, California.

EXPERTS

Marcum LLP, an independent registered public accounting firm, has audited our consolidated financial statements at December 31, 2016 and 2015 and for the years ended December 31, 2016, 2015 and 2014, included in our Annual Report on Form 10-K for the year ended December 31, 2016, and the effectiveness of our internal control over financial reporting as of December 31, 2016, in each case, as set forth in its report, which is incorporated by reference in this prospectus and elsewhere in the registration statement of which this prospectus forms a part. Such consolidated financial statements are incorporated herein by reference in reliance upon such report given on the authority of such firm as experts in accounting and auditing.

PART II
INFORMATION NOT REQUIRED IN PROSPECTUS

Item 14. Other Expenses of Issuance and Distribution
The following table sets forth an estimate of the fees and expenses payable by the registrant in connection with the offering described in this registration statement.

Securities and Exchange Commission registration fee	$24,900
NASDAQ Capital Market listing fee	*
Printing fees and expenses	*
Legal fees and expenses	*
Accounting fees and expenses	*
Trustee fees and expenses	*
Blue Sky fees and expenses	*
Transfer Agent fees	*
Miscellaneous expenses	*
Total	$*

* These fees and expenses depend on the securities offered and the number of issuances and, accordingly, cannot be estimated at this time.

Item 15. Indemnification of Directors and Officers
Section 145 of the DGCL, provides, generally, that a corporation shall have the power to indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action, suit or proceeding (except actions by or in the right of the corporation) by reason of the fact that such person is or was a director, officer, employee or agent of the corporation against all expenses, judgments, fines and amounts paid in settlement actually and reasonably incurred by such person in connection with such action, suit or proceeding if such person acted in good faith and in a manner such person reasonably believed to be in or not opposed to the best interests of the corporation and, with respect to any criminal action or proceeding, had no reasonable cause to believe his or her conduct was unlawful. A corporation may similarly indemnify such person for expenses actually and reasonably incurred by such person in connection with the defense or settlement of any action or suit by or in the right of the corporation, provided that such person acted in good faith and in a manner he or she reasonably believed to be in or not opposed to the best interests of the corporation, and, in the case of claims, issues and matters as to which such person shall have been adjudged liable to the corporation, provided that a court shall have determined, upon application, that, despite the adjudication of liability but in view of all of the circumstances of the case, such person is fairly and reasonably entitled to indemnity for such expenses which such court shall deem proper.
Section 102(b)(7) of the DGCL provides, generally, that our certificate of incorporation may contain a provision eliminating or limiting the personal liability of a director to the corporation or its shareholders for monetary damages for

breach of fiduciary duty as a director, provided that such provision may not eliminate or limit the liability of a director (i) for any breach of the director's duty of loyalty to the corporation or its shareholders, (ii) for acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of law, (iii) under Section 174 of the DGCL, or (iv) for any transaction from which the director derived an improper personal benefit. No such provision may eliminate or limit the liability of a director for any act or omission occurring prior to the date when such provision became effective.

Article IX of the registrant's certificate of incorporation contains provisions implementing, to the fullest extent permitted by Delaware law, such limitations on a director's liability to the registrant and its shareholders. Article IX also provides that no amendment or repeal of such Article shall adversely affect any right or protection of a director for or with respect to any acts or omissions of such director occurring prior to such amendment or repeal.

Article IX of the registrant's bylaws provide for, among other things, the indemnification by the registrant of its directors, officers, employees and agents and the advancement of expenses. The registrant has entered into an indemnification agreement with each of its executive officers and directors in which the registrant agrees to hold harmless and indemnify the officer or director to the fullest extent permitted by Delaware law. The form of such indemnification agreement is attached as Exhibit 10.1 to the registrant's Current Report on Form 8-K, filed on January 24, 2018.

The directors and officers of the registrant also may be indemnified against liability they may incur for serving in such capacity pursuant to a liability insurance policy we maintain for such purpose.

Item 16. Exhibits and Financial Statement Schedules

A list of exhibits filed herewith is contained in the exhibit index that immediately precedes such exhibits and is incorporated herein by reference.

Item 17. Undertakings

(a) The undersigned registrant hereby undertakes:

(1) To file, during any period in which offers or sales are being made, a post-effective amendment to this registration statement:

(i) To include any prospectus required by Section 10(a)(3) of the Securities Act;

(ii) To reflect in the prospectus any facts or events arising after the effective date of the registration statement (or the most recent post-effective amendment thereof) which, individually or in the aggregate, represent a fundamental change in the information set forth in the registration statement. Notwithstanding the foregoing, any increase or decrease in volume of securities offered (if the total dollar value of securities offered would not exceed that which was registered) and any deviation from the low or high end of the estimated maximum offering range may be reflected in the form of prospectus filed with the Commission pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than a 20% change in the maximum aggregate offering price set forth in the "Calculation of Registration Fee" table in the effective registration statement; and

(iii) To include any material information with respect to the plan of distribution not previously disclosed in the registration statement or any material change to such information in the registration statement;

provided, however, that paragraphs (a)(1)(i), (a)(1)(ii) and (a)(1)(iii) of this section do not apply if the information required to be included in a post-effective amendment by those paragraphs is contained in reports filed with or furnished to the Commission by the registrant pursuant to Section 13 or Section 15(d) of the Exchange Act that are incorporated by reference in the registration statement, or is contained in a form of prospectus filed pursuant to Rule 424(b) that is part of the registration statement.

(2) That, for the purpose of determining any liability under the Securities Act, each such post-effective amendment shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(3) To remove from registration by means of a post-effective amendment any of the securities being registered which remain unsold at the termination of the offering.

(4) That, for the purpose of determining liability under the Securities Act to any purchaser:
(i) Each prospectus filed by the registrant pursuant to Rule 424(b)(3) shall be deemed to be part of the registration statement as of the date the filed prospectus was deemed part of and included in the registration statement; and
(ii) Each prospectus required to be filed pursuant to Rule 424(b)(2), (b)(5), or (b)(7) as part of a registration statement in reliance on Rule 430B relating to an offering made pursuant to Rule 415(a)(1)(i), (vii), or (x) for the purpose of providing the information required by section 10(a) of the Securities Act shall be deemed to be part of and included in the registration statement as of the earlier of the date such form of prospectus is first used after effectiveness or the date of the first contract of sale of securities in the offering described in the prospectus. As provided in Rule 430B, for liability purposes of the issuer and any person that is at that date an underwriter, such date shall be deemed to be a new effective date of the registration statement relating to the securities in the registration statement to which that prospectus relates, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof. Provided, however, that no statement made in a registration statement or prospectus that is part of the registration statement or made in a document incorporated or deemed incorporated by reference into the registration statement or prospectus that is part of the registration statement will, as to a purchaser with a time of contract of sale prior to such effective date, supersede or modify any statement that was made in the registration statement or prospectus that was part of the registration statement or made in any such document immediately prior to such effective date.
(5) That, for the purpose of determining liability of the registrant under the Securities Act to any purchaser in the initial distribution of the securities: The undersigned registrant undertakes that in a primary offering of securities of the undersigned registrant pursuant to this registration statement, regardless of the underwriting method used to sell the securities to the purchaser, if the securities are offered or sold to such purchaser by means of any of the following communications, the undersigned registrant will be a seller to the purchaser and will be considered to offer or sell such securities to such purchaser:
(i) Any preliminary prospectus or prospectus of the undersigned registrant relating to the offering required to be filed pursuant to Rule 424;
(ii) Any free writing prospectus relating to the offering prepared by or on behalf of the undersigned registrant or used or referred to by the undersigned registrant;
(iii) The portion of any other free writing prospectus relating to the offering containing material information about the undersigned registrant or its securities provided by or on behalf of the undersigned registrant; and
(iv) Any other communication that is an offer in the offering made by the undersigned registrant to the purchaser.

(b) The undersigned registrant hereby undertakes that, for purposes of determining any liability under the Securities Act, each filing of the registrant's annual report pursuant to Section 13(a) or 15(d) of the Exchange Act (and, where applicable, each filing of an employee benefit plan's annual report pursuant to Section 15(d) of the Exchange Act that is incorporated by reference in the registration statement shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.
(c) The undersigned registrant hereby undertakes to supplement the prospectus, after the expiration of any subscription period, to set forth the results of such subscription offer, any transactions by the underwriters during such subscription period, the amount of unsubscribed securities to be purchased by the underwriters, and the terms of any subsequent reoffering thereof. If any public offering by the underwriters is to be made on terms differing from those set forth on the cover page of the applicable prospectus, a post-effective amendment will be filed to set forth the terms of such offering.
(d) Insofar as indemnification for liabilities arising under the Securities Act may be permitted to directors, officers and controlling persons of the registrant pursuant to the foregoing provisions, or otherwise, the registrant has been advised that in the opinion of the Securities and Exchange Commission such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the registrant of expenses incurred or paid by a director, officer or controlling person of the registrant in the successful defense of any action, suit or proceeding) is asserted by such

director, officer or controlling person in connection with the securities being registered, the registrant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

(e) The undersigned registrant hereby undertakes to file an application for the purpose of determining the eligibility of the trustee to act under subsection (a) of Section 310 of the Trust Indenture Act in accordance with the rules and regulations prescribed by the Commission under Section 305(b)(2) of the Act.

SIGNATURES

Pursuant to the requirements of the Securities Act, the registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-3 and has duly caused this Post-Effective Amendment No. 2 to Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Seattle, State of Washington, on this 31st day of January.

CTI BIOPHARMA CORP.

By: /s/ Adam Craig
Adam Craig, M.D., Ph.D.
President and Chief Executive Officer

Pursuant to the requirements of the Securities Act, this Post-Effective Amendment No. 2 to Registration Statement has been signed below by the following persons in the capacities and on the dates indicated.

Signature	Title	Date
/s/ Adam Craig Adam Craig, M.D., Ph.D.	President, Chief Executive Officer and Director (Principal Executive Officer)	January 31, 2018
/s/ David H. Kirske David H. Kirske	Principal Financial Officer and Principal Accounting Officer	January 31, 2018
* Laurent Fischer, M.D.	Director and Chairman of the Board	January 31, 2018
* Richard L. Love	Director	January 31, 2018
* Michael A. Metzger	Director	January 31, 2018
* Matthew D. Perry	Director	January 31, 2018
* David Parkinson, M.D.	Director	January 31, 2018
* Frederick W. Telling, Ph.D.	Director	January 31, 2018
*	Director	January 31,

2018

Reed V. Tuckson, M.D.

*By: /s/ Adam Craig
Adam Craig, M.D., Ph.D.
Attorney-in-Fact

/s/ David H. Kirske
David H. Kirske
Attorney-in-Fact

EXHIBIT INDEX

Exhibit Number	Description
1.1*	Underwriting Agreement.
4.1(1)	Registrant's Certificate of Incorporation.
4.2(2)	Registrant's Bylaws.
4.3(3)	Specimen Common Stock Certificate.
4.4(4)	Shareholder Rights Agreement, dated December 28, 2009, between the Registrant and Computershare Trust Company, N.A., as rights agent.
4.5(5)	First Amendment to Shareholder Rights Agreement, dated August 31, 2012, between the Registrant and Computershare Trust Company, N.A., as rights agent.
4.6(6)	Second Amendment to Shareholder Rights Agreement, dated December 6, 2012, between the Registrant and Computershare Trust Company, N.A., as rights agent.
4.7(7)	Third Amendment to Shareholder Rights Agreement, dated as of December 1, 2015, between the Registrant and Computershare Trust Company, N.A., as rights agent.
4.8(8)	Fourth Amendment to Shareholder Rights Agreement, dated as of September 22, 2017, between the Registrant and Computershare Trust Company, N.A., as rights agent.
4.9*	Form of Article of Amendment—Designation of Preferences, Rights and Limitations of Preferred Stock.
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4.10*	Form of Common Stock Warrant Agreement and Warrant Certificate.
4.11*	Form of Preferred Stock Warrant Agreement and Warrant Certificate.
4.12*	Form of Debt Securities Warrant Agreement and Warrant Certificate.
4.13(9)	Form of Senior Debt Indenture between the registrant and one or more trustees to be named.
4.14(10)	Form of Subordinated Debt Indenture between the registrant and one or more trustees to be named.
4.15*	Form of Senior Note.
4.16*	Form of Subordinated Note.
4.17*	Form of Rights Agreement and Rights Certificate.
4.18*	Form of Unit Agreement.
5.1	Opinion of O'Melveny & Myers LLP (previously filed).

12.1	Statement Re: Computation of Ratio of Earnings to Fixed Charges and Ratio of Earnings to Combined Fixed Charges and Preferred Stock Dividends (previously filed).
15.1	Letter regarding unaudited interim financial information from Marcum LLP, Independent Registered Public Accounting Firm (previously filed).
23.1	Consent of Marcum LLP, Independent Registered Public Accounting Firm (previously filed).
23.2	Consent of O'Melveny & Myers LLP (included in Exhibit 5.1).
24.1	Power of Attorney (included on signature page hereto).
25.1**	Form T-1 Statement of Eligibility of Trustee for Senior Indenture under the Trust Indenture Act of 1939, as amended.
25.2**	Form T-1 Statement of Eligibility of Trustee for Subordinated Indenture under the Trust Indenture Act of 1939, as amended.

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* To be filed by amendment to this registration statement or as an exhibit to a Current Report on Form 8-K and incorporated herein by reference, if applicable.

** To be filed separately under the electronic form type 305B2, if applicable.

(1) Incorporated by reference to Exhibit 3.1 to the Registrant's Current Report on Form 8-K, filed on January 24, 2018.

(2) Incorporated by reference to Exhibit 3.2 to the Registrant's Current Report on Form 8-K, filed on January 24, 2018.

(3) Incorporated by reference to Exhibit 4.3 to the Registrant's registration statement on Form S-3 (SEC Registration No. 333-200452), filed on November 21, 2014.

(4) Incorporated by reference to Exhibit 4.1 to the Registrant's Registration Statement on Form 8-A, filed on December 28, 2009.

(5) Incorporated by reference to Exhibit 4.1 to the Registrant's Current Report on Form 8-K, filed on September 4, 2012.

(6) Incorporated by reference to Exhibit 4.1 to the Registrant's Current Report on Form 8-K, filed on December 7, 2012.

(7) Incorporated by reference to Exhibit 4.1 to the Registrant's Current Report on Form 8-K, filed on December 1, 2015.

(8) Incorporated by reference to Exhibit 4.1 to the Registrant's Current Report on Form 8-K, filed on September 26, 2017.

(9) Incorporated by reference to Exhibit 4.11 to the Registrant's registration statement on Form S-3 (SEC Registration No. 333-200452), filed on November 21, 2014.

(10) Incorporated by reference to Exhibit 4.12 to the Registrant's registration statement on Form S-3 (SEC Registration No. 333-200452), filed on November 21, 2014.