

UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, DC 20549

FORM 8-K

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

Date of report (Date of earliest event reported): July 31, 2015

**Bacterin International Holdings, Inc.**

(Exact Name of Registrant as Specified in Its Charter)

Delaware

(State or Other Jurisdiction of Incorporation)

001-34951

(Commission File Number)

20-5313323

(IRS Employer Identification No.)

600 Cruiser Lane  
Belgrade, Montana

(Address of Principal Executive Offices)

59714

(Zip Code)

(406) 388-0480

(Registrant's Telephone Number, Including Area Code)

(Former Name or Former Address, if Changed Since Last Report)

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions (see General Instruction A.2. below):

- Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
- Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
- Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
- Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

**ITEM 1.01 Entry into a Material Definitive Agreement.**

As described in Item 2.01 below, Bacterin International Holdings, Inc. (“Bacterin”, the “Company” or the “Purchaser”) recently announced the closing of its purchase of all of the outstanding capital stock of X-spine Systems, Inc. (“X-spine”), with X-spine becoming a wholly owned subsidiary of Bacterin.

In connection with that transaction, Bacterin is filing the Distribution Agreement, dated January 23, 2014, between X-spine and Zimmer Spine, Inc. (“Zimmer”), as amended to date. Under the Distribution Agreement, X-spine granted Zimmer a co-exclusive right to distribute certain X-spine products worldwide. X-spine is entitled to receive a royalty on net sales of products. X-spine also obtained a non-exclusive, perpetual, worldwide license under certain Zimmer patents to distribute certain of X-spine’s products. In consideration for the rights granted to X-spine under the agreement, X-spine will be required to pay a royalty on net sales of certain products.

Absent earlier termination, the distribution agreement with Zimmer will expire ten years from the date of the Agreement, subject to automatic two-year extensions unless either party notifies the other party in writing that it desires not to renew the agreement. The agreement may be terminated by either party upon the occurrence of a material breach, a force majeure event, or a bankruptcy event. Zimmer may terminate the agreement if X-spine is subject to a change in control event involving a Zimmer competitor or if X-spine breaches a specific regulatory warranty.

The foregoing description of the Distribution Agreement does not purport to be complete and is qualified in its entirety by reference to the full text of the Distribution Agreement which is filed as Exhibit 10.1 and is incorporated herein by reference.

**ITEM 2.01 Completion of Acquisition or Disposition of Assets.**

On July 31, 2015, Bacterin completed its previously announced purchase of all of the outstanding capital stock of X-spine from David L. Kirschman, M.D., the Kenneth J. Hemmelgarn, Jr. Revocable Living Trust Dated February 9, 1998, as amended, the Brian J. Hemmelgarn Revocable Living Trust Dated February 9, 1998, as amended, the Kenneth J. Hemmelgarn, Jr. Second Trust Dated March 18, 2010 and the Brian J. Hemmelgarn Second Trust Dated March 18, 2010 (collectively the “Sellers”) for approximately \$60 million in cash, repayment of approximately \$13 million of X-spine debt and approximately 4.24 million shares of Bacterin common stock. Other than the acquisition consideration, the appointment of X-spine’s President, David L. Kirschman to Bacterin’s Board of Directors and the appointment of David L. Kirschman as Executive Vice President and Chief Scientific Officer of Bacterin, there was no material relationship between Bacterin and X-spine prior to the acquisition. Bacterin financed the acquisition of X-spine with approximately \$65 million in convertible notes and an increase in the amount of Bacterin’s credit facility with affiliates of OrbiMed Advisors LLC. A copy of the Stock Purchase Agreement by and among Bacterin, X-spine and the Sellers (the “Stock Purchase Agreement”) was previously filed as Exhibit 10.1 to our Current Report on Form 8-K dated July 28, 2015 and is incorporated herein by reference.

**ITEM 2.03 Creation of Direct Financial Obligation or an Obligation Under an Off-Balance Sheet Arrangement of a Registrant.***Convertible Notes Indenture*

Concurrent with the acquisition of X-spine, the Company completed its offering of \$65.0 million aggregate principal amount of its 6.00% convertible senior unsecured notes due 2021 (the “Notes”) in a private offering to qualified institutional buyers, as defined in Rule 144A under the Securities Act of 1933, as amended (the “Securities Act”). Certain private investment funds for which OrbiMed Advisors LLC, one of the Company’s existing stockholders, serves as the investment manager, purchased \$52.0 million of the aggregate principal amount of the Notes directly from the Company in the offering. The Company has granted the investment bank acting as initial purchaser in the offering a 30-day option to purchase up to an additional \$9.75 million aggregate principal amount of Notes from the Company.

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The Notes were issued pursuant to an Indenture (the “Indenture”) dated as of July 31, 2015 between Bacterin International Holdings, Inc. and Wilmington Trust, National Association, a national banking association, as Trustee, establishing the terms and providing for the issuance of the Notes.

The Notes bear interest at a rate equal to 6.00% per year. Following the first interest payment date, which will be on April 15, 2016, interest on the Notes will be payable semiannually in arrears on January 15 and July 15 of each year. Interest will accrue on the Notes from the last date to which interest has been paid or duly provided for or, if no interest has been paid or duly provided for, from July 31, 2015. Unless earlier converted or repurchased, the Notes will mature on July 15, 2021.

At any time prior to the close of business on the second business day immediately preceding the maturity date, holders may convert their Notes into shares of Bacterin common stock (together with cash in lieu of fractional shares) at an initial conversion rate of 257.5163 shares per \$1,000 principal amount of Notes (which represents an initial conversion price of approximately \$3.88 per share). However, a Note will not be convertible to the extent that such convertibility or conversion would result in the holder of that Note or any of its affiliates being deemed to beneficially own in excess of 9.99% of the then-outstanding shares of Bacterin common stock. The conversion rate will be subject to adjustment as described in the Indenture. In addition, Bacterin will, in certain circumstances, increase the conversion rate for holders who convert their Notes in connection with a “make-whole fundamental change” (as defined in the Indenture).

No sinking fund is provided for the Notes. Bacterin may not redeem the Notes at its option prior to their maturity.

If a “fundamental change” (as defined in the Indenture) occurs, holders will have the right, at their option, to require us to repurchase their Notes at a cash price equal to 100% of the principal amount of the Notes to be repurchased, plus accrued and unpaid interest to, but excluding, the fundamental change repurchase date, subject to the right of holders of Notes on a record date to receive accrued and unpaid interest.

The Notes are Bacterin’s senior, unsecured obligations, rank equal in right of payment with its existing and future unsecured indebtedness that is not junior to the Notes, are senior in right of payment to any of its existing and future indebtedness that is expressly subordinated to the Notes, and are effectively subordinated to its existing and future secured indebtedness to the extent of the value of the collateral securing such indebtedness. The Notes will be structurally subordinated to all existing and future indebtedness and other liabilities, including trade payables, and (to the extent Bacterin is not a holder thereof) preferred equity, if any, of its subsidiaries.

The foregoing description of the Indenture does not purport to be complete and is qualified in its entirety by reference to the full text of the Indenture, a copy of which is filed herewith as Exhibit 10.2 and is incorporated herein by reference.

#### *Registration Rights Agreement*

Bacterin has entered into a registration rights agreement (the “Registration Rights Agreement”) with the initial purchaser and the OrbiMed purchasers. Pursuant to the Registration Rights Agreement, Bacterin has agreed, for the benefit of the holders of the Notes and the shares of common stock issuable on conversion of the Notes, that it will, at its cost:

- file with the Securities and Exchange Commission a shelf registration statement (which, initially, will be on Form S-1 and, as soon as Bacterin is eligible, will be on Form S-3) covering the resale, from time to time, of the Notes and the shares of Bacterin common stock issuable upon conversion of the Notes;
  - use its best efforts to cause the registration statement to become effective under the Securities Act no later than the 180th day after the original issuance date of the Notes; and
  - use its best efforts to keep the shelf registration statement effective under the Securities Act until the earlier of (1) the 60th trading day immediately following the maturity date (subject to extension for any suspension of the effectiveness of the shelf registration statement during the 60 trading days immediately following the maturity date) and (2) the date on which no Notes or shares of Bacterin common stock issued upon conversion of the Notes are outstanding and constitute “restricted securities” (as defined in Rule 144 under the Securities Act).
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The foregoing description of the Registration Rights Agreement does not purport to be complete and is qualified in its entirety by reference to the full text of the Registration Rights Agreement, a copy of which is filed herewith as Exhibit 10.3 and is incorporated herein by reference.

#### *Amended and Restated Credit Agreement*

On July 31, 2015, Bacterin's wholly owned subsidiary, Bacterin International, Inc. (the "Borrower") closed the additional financing described in the Amended and Restated Credit Agreement by and among the Borrower, the Lenders party thereto and ROS Acquisition Offshore LP as Administrative Agent (the "New Facility"). Pursuant to the New Facility, Bacterin refinanced approximately \$24 million in existing term loans and borrowed an additional \$18 million. The maturity date of the New Facility will be July 31, 2020 (the "Maturity Date"). Interest under the New Facility will be bifurcated into a "cash pay" portion and a "payment-in-kind" portion. Until June 30, 2018 (the "First Period"), interest on loans outstanding under the New Facility will accrue at a rate equal to the sum of (a) 9% per annum, which portion of interest will be payable in cash, plus (b) additional interest ("PIK Interest") in an amount equal to (i) the sum of 14% per annum, plus the higher of (x) LIBOR and (y) 1% per annum, minus (ii) 9% per annum, which portion of interest will be payable "in kind." During the portion of the First Period before December 31, 2015 (the "Optional PIK Period"), we may elect at our option to have all or any portion of interest on loans outstanding under the New Facility to accrue during the Optional PIK Period at a rate equal to the sum of 14% per annum, plus the higher of (x) LIBOR and (y) 1% per annum, which portion of interest will be payable "in kind." On or after June 30, 2018 until the New Facility is repaid in full (the "Second Period"), interest on loans outstanding under the New Facility will accrue at a rate equal to the sum of (a) 12% per annum, which portion of interest will be payable in cash, plus (b) PIK Interest in an amount equal to the difference of (i) the sum of 14% per annum, plus the higher of (x) LIBOR and (y) 1% per annum, minus (ii) 12% per annum, which portion of interest will be payable "in kind." In both the First Period and the Second Period, the portion of accrued interest constituting PIK Interest will not be payable in cash but will instead be added to the principal amount outstanding under the New Facility. However, at the Borrower's option, it may choose to make any "payment-in-kind" interest payment in cash. Until the third anniversary of the closing date of the New Facility, the Borrower will not be allowed to voluntarily prepay the New Facility. Whenever loans outstanding under the New Facility are prepaid or paid, whether voluntarily, involuntarily or on the Maturity Date, a fee of 7.5% on the amount paid will be due and payable. The New Facility contains financial and other covenant requirements, including, but not limited to, financial covenants that require the Company to maintain revenue and liquidity at levels set forth in the New Facility and ensure that the Company's senior consolidated leverage ratio does not exceed levels set forth in the New Facility. The New Facility also restricts the Company from making any payment or distribution with respect to, or purchasing, redeeming, defeasing, retiring or acquiring, the Notes other than payments of scheduled interest on the Notes, issuance of shares of our common stock upon conversion of the Notes, and payment of cash in lieu of fractional shares. The loans under the New Facility are guaranteed by Bacterin and its current and future subsidiaries and are secured by substantially all of the current and future assets of Bacterin and its subsidiaries. The additional amount borrowed under the New Facility will be used to pay a portion of the X-spine acquisition, with the balance being available for general corporate purposes. The foregoing description of the New Facility does not purport to be complete and is qualified in its entirety by reference to the full text of the New Facility, a copy of which is filed as Exhibit 10.2 to Bacterin's Current Report on Form 8-K dated July 28, 2015 and is incorporated herein by reference.

#### **ITEM 3.02 Unregistered Sales of Equity Securities.**

On July 31, 2015, we issued 4,242,655 shares of restricted common stock to the Sellers as partial payment for the acquisition of X-spine pursuant to Section 4(a)(2) of the Securities Act. The shares will be held in escrow pursuant to the terms of the Stock Purchase Agreement.

On July 31, 2015, we issued \$65.0 million aggregate principal amount of 6.00% convertible senior unsecured notes due 2021 (the "Notes") in a private offering to qualified institutional buyers, as defined in Rule 144A under the Securities Act through Leerink Partners as the initial purchaser. Certain private investment funds for which OrbiMed Advisors LLC, one of the Company's existing stockholders, serves as the investment manager, purchased \$52.0 million of the aggregate principal amount of the Notes directly from the Company pursuant to Section 4(a)(2) of the Securities Act. The Notes were issued pursuant to an Indenture dated as of July 31, 2015 between Bacterin and Wilmington Trust, National Association, a national banking association, as Trustee, establishing the terms and providing for the issuance of the Notes. The Notes bear interest at a rate equal to 6.00% per year. Following the first interest payment date, which will be on April 15, 2016, interest on the Notes will be payable semiannually in arrears on January 15 and July 15 of each year. Interest will accrue on the Notes from the last date to which interest has been paid or duly provided for or, if no interest has been paid or duly provided for, from July 31, 2015. Unless earlier converted or repurchased, the Notes will mature on July 15, 2021. At any time prior to the close of business on the second business day immediately preceding the maturity date, holders may convert their Notes into shares of Bacterin common stock (together with cash in lieu of fractional shares) at an initial conversion rate of 257.5163 shares per \$1,000 principal amount of Notes (which represents an initial conversion price of approximately \$3.88 per share). However, a Note will not be convertible to the extent that such convertibility or conversion would result in the holder of that Note or any of its affiliates being deemed to beneficially own in excess of 9.99% of the then-outstanding shares of Bacterin common stock. The conversion rate will be subject to adjustment as described in the Indenture. In addition, Bacterin will, in certain circumstances, increase the conversion rate for holders who convert their Notes in connection with a "make-whole fundamental change" (as defined in the Indenture). No sinking fund is provided for the Notes. Bacterin may not redeem the Notes at its option prior to their maturity. If a "fundamental change" (as defined in the Indenture) occurs, holders will have the right, at their option, to require us to repurchase their Notes at a cash price equal to 100% of the principal amount of the Notes to be repurchased, plus accrued and unpaid interest to, but excluding, the fundamental change repurchase date, subject to the right of holders of Notes on a record date to receive accrued and unpaid interest.

#### **ITEM 5.02 Departure of Directors or Certain Officers; Election of Directors; Appointment of Certain Officers; Compensatory Arrangements of Certain Officers.**

Dr. David Kirschman, age 44, has joined the management team of Bacterin to serve as Executive Vice President and Chief Scientific Officer. Dr. Kirschman was also appointed to the Bacterin Board of Directors and will also continue to serve as President of X-spine Systems, which is now a Bacterin subsidiary. Dr. Kirschman is an inventor and entrepreneur with a background in the medical device industry. He completed training in neurosurgery with a specialization in instrumented spinal surgery. Dr. Kirschman has issued and pending patents for a wide range of spinal devices and has been the President of X-spine since 2003. Dr. Kirschman also serves on the Board of Directors of Aerobiotix, Inc. He received his BS in Biological Science cum laude from Colorado State University and M.D. from the University of Colorado School of Medicine.

Gregory Juda has stepped down as Chief Scientific Officer of Bacterin International Holdings, Inc., but will continue to serve as Chief Scientific Officer of Bacterin International, Inc., Bacterin's subsidiary.

In connection with Dr. Kirschman's employment, Bacterin has entered into an employment agreement with him. Dr. Kirschman's employment agreement provides for a base salary of \$500,000 with a 50% bonus target. Subject to the approval of the Compensation Committee of Bacterin's Board of Directors, Dr. Kirschman will also receive a restricted stock grant of 40,000 shares of Bacterin's common stock, vesting over four (4) years. Dr. Kirschman's employment agreement contains customary restrictive covenants and provides for twelve (12) months severance in connection with a change of control and six (6) months severance if Dr. Kirschman is terminated without cause or if he resigns for good reason. Dr. Kirschman's employment agreement is filed as Exhibit 10.4 to this report and is incorporated herein by reference.

Other than the X-spine acquisition consideration described in the Stock Purchase Agreement, and amounts to be paid pursuant to Dr. Kirschman's employment agreement, there are no related party transactions between Bacterin and Dr. Kirschman and there are no family relationships between Dr. Kirschman and any Bacterin director or executive officer.

#### **ITEM 5.03 Amendments to Articles of Incorporation or Bylaws; Change in Fiscal Year**

On July 31, 2015, Bacterin amended its Certificate of Incorporation to change its name to Xtant Medical Holdings, Inc. A copy of the Certificate of Amendment is attached hereto as Exhibit 3.1.

#### **ITEM 9.01 Financial Statements and Exhibits**

##### **(d) Exhibits.**

- 3.1 Certificate of Amendment to the Certificate of Incorporation of Bacterin International Holdings, Inc.
  - 10.1 Distribution Agreement, dated January 23, 2014, between X-spine Systems, Inc. and Zimmer Spine, Inc., as amended to date.
  - 10.2 Indenture dated as of July 31, 2015, between Bacterin International Holdings, Inc. and Wilmington Trust, National Association, a national banking association, as Trustee.
  - 10.3 Registration Rights Agreement dated as of July 31, 2015, among Bacterin International Holdings, Inc., Leerink Partners LLC, OrbiMed Royalty Opportunities II, LP and ROS Acquisition Offshore LP.
  - 10.4 Employment Agreement between X-spine Systems, Inc. and/or the successor thereof, and David Kirschman, dated July 31, 2015.
  - 99.1 Press Release of the Company dated July 31, 2015 announcing the completion of its acquisition of X-spine Systems, Inc.
  - 99.2 Press Release of the Company dated July 31, 2015 announcing the completion of its offering of \$65.0 million of its 6.00% Convertible Senior Notes due 2021.
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**SIGNATURE**

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

Dated: August 3, 2015

**BACTERIN INTERNATIONAL HOLDINGS, INC.**

By: /s/ Daniel Goldberger

Name: Daniel Goldberger

Title: Chief Executive Officer

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# Delaware

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*The First State*

I, JEFFREY W. BULLOCK, SECRETARY OF STATE OF THE STATE OF DELAWARE, DO HEREBY CERTIFY THE ATTACHED IS A TRUE AND CORRECT COPY OF THE CERTIFICATE OF AMENDMENT OF "BACTERIN INTERNATIONAL HOLDINGS, INC.", CHANGING ITS NAME FROM "BACTERIN INTERNATIONAL HOLDINGS, INC." TO "XTANT MEDICAL HOLDINGS, INC.", FILED IN THIS OFFICE ON THE THIRTY-FIRST DAY OF JULY, A.D. 2015, AT 5:02 O'CLOCK P.M.

A FILED COPY OF THIS CERTIFICATE HAS BEEN FORWARDED TO THE NEW CASTLE COUNTY RECORDER OF DEEDS.

4202199 8100

151121204

You may verify this certificate online  
at [corp.delaware.gov/authver.shtml](http://corp.delaware.gov/authver.shtml)



  
Jeffrey W. Bullock, Secretary of State  
AUTHENTICATION: 2608431

DATE: 07-31-15

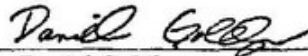
**CERTIFICATE OF AMENDMENT  
TO THE  
CERTIFICATE OF INCORPORATION  
OF  
BACTERIN INTERNATIONAL HOLDINGS, INC.**

The undersigned, Daniel Goldberger, does hereby certify as follows:

1. He is the Chief Executive Officer of Bacterin International Holdings, Inc., a Delaware corporation (the "Corporation"), and duly authorized by the written consent of the Board of Directors of the Corporation to execute this instrument.
2. This Certificate of Amendment to the Certificate of Incorporation was duly approved by the Corporation's Board of Directors, in accordance with the applicable provisions of Sections 141 and 242 of the General Corporation Law of the State of Delaware.
3. Article FIRST of the Certificate of the Incorporation is hereby amended to read in its entirety as follows:

"The name of this Corporation is Xtant Medical Holdings, Inc."

IN WITNESS WHEREOF, the undersigned has executed this Certificate of Amendment to the Certificate of Incorporation as of the 27<sup>th</sup> of July, 2015.



Name: Daniel Goldberger

Title: Chief Executive Officer



**DISTRIBUTION AGREEMENT**

This Distribution Agreement (this “**Agreement**”) is made and entered into as of January 23, 2014 (the “**Effective Date**”), by and between Zimmer Spine, Inc., a Delaware corporation (“**Zimmer**”), and X-spine Systems, Inc., an Ohio corporation (“**X-spine**”).

**Recitals**

- A. X-spine designs, develops, manufactures and markets spine surgery implants and instruments, including the Products (as defined below).
- B. Zimmer designs, develops, manufactures and markets implants, instruments, devices and related products for use in orthopedic surgery, including spinal applications.
- C. X-spine desires to appoint Zimmer as an exclusive worldwide distributor of the Products (as defined below) for all uses and applications in the Field (as defined below), and Zimmer desires to accept such appointment, all in accordance with the terms and conditions of this Agreement.

**Agreement**

In consideration of the mutual covenants contained in this Agreement, Zimmer and X-spine agree as follows:

**ARTICLE I  
DEFINITIONS AND RULES OF CONSTRUCTION****1.1 Definitions.**

- (a) **Terms Defined in this Article.** For purposes of this Agreement, the following terms shall have the following meanings:

“**Affiliate**” means, with respect to an entity, a Person that directly, or indirectly through one or more intermediaries, controls, is controlled by, or is under common control with, the entity. For this purpose, “control” of an entity means the possession, direct or indirect, of the power to direct or cause the direction of the management or policies of the entity, whether through the ownership of voting securities, by contract or otherwise.

“**Applicable Laws**” means all applicable common law, statutes, ordinances, rules, regulations or orders of any Governmental Authority, including the federal Anti-Kickback Statute (42 U.S.C. § 1302a-7b) (the “**Anti-Kickback Statute**”), the Physician Self-Referral Law (42 U.S.C. § 1395nn), the Foreign Corrupt Practices Act (15 U.S.C. § 78dd-1) (the “**FCPA**”), and all laws, ordinances, rules and regulations promulgated by the Department of Health and Human Services Office of Inspector General, the Centers for Medicare and Medicaid Services, and the FDA, or their counterparts in foreign jurisdictions, and any other Regulatory Laws.

“**Average Gross Margin**” means, with respect to any Product for the applicable Pricing Measurement Period, (i) the aggregate gross profit for such Product during such period, divided by (ii) the aggregate gross sales of such Product during such period, in each case as determined in accordance with United States generally accepted accounting principles.

“**Axle Products**” means all of the Products described in Exhibit A as part of the Axle product family.

“**Business Day**” means any day other than a Saturday, a Sunday or a day on which banks in New York are authorized or obligated by Applicable Law to remain closed.

“**Change of Control**” means, with respect to X-spine, a transaction or series of related transactions as a result of which a Person or group of Persons acting in concert directly or indirectly acquires (i) control of X-spine or (ii) ownership of all or substantially all of X-spine’s assets related to the Products. The transaction(s) may be in any form or combination of forms, including an issuance or transfer of voting securities, a grant of one or more proxies, a merger (whether or not X-spine survives), a consolidation, a share exchange, a reorganization, or an asset sale. For this purpose, “control” of X-spine means the possession, direct or indirect, of the power to direct or cause the direction of the management or policies of the entity, whether through the ownership of voting securities, by contract or otherwise.

“**Copyrights**” means all copyrights and copyrightable works, and all applications, registrations and renewals in connection therewith.

“**Distribution Term**” means the period from the Effective Date until the earlier to occur of the following: (i) the IP License Effective Date or (ii) the expiration or termination of this Agreement pursuant to Article XI.

“**FDA**” means the United States Food and Drug Administration.

“**Field**” means any and all spine applications.

“**Field Action**” means any recall, correction or removal action by Zimmer or X- spine with respect to any Products due to safety, efficacy, quality or regulatory compliance concerns, including actions to recover title to or possession of, or to halt distribution of, Products that previously have been shipped to customers.

“**Final Regulatory Clearance Date**” means, with respect to any Product, the date on which Zimmer (or its designee) has received Regulatory Clearance for such Product in all jurisdictions for which Regulatory Clearances were in effect for such Product as of the IP License Effective Date.

“**Governmental Authority**” means the governmental authority in any country in which the Products are manufactured, sterilized, marketed, sold, tested, investigated or otherwise regulated, and all states or other political subdivisions thereof and supranational bodies applicable thereto, and all agencies, commissions, officials, courts or other instrumentalities of the foregoing.

**“Improvement”** means, with respect to any Product, any improvement, modification, addition, new feature or refinement to such Product (and for the purposes of this definition, including any substantially similar product) created or developed by or on behalf of X-spine.

**“Industrial Designs”** means all features of shape, configuration, pattern, ornament and the like that are or can be registered as designs or industrial designs under Applicable Laws and all applications, registrations and renewals in connection therewith.

**“Insolvency Event”** means that a Party (i) has commenced a voluntary proceeding under any insolvency law, (ii) had an involuntary proceeding commenced against it under any insolvency law which has continued undismissed or unstayed for sixty (60) consecutive days, (iii) had a receiver, trustee or similar official appointed for it or for any substantial part of its property which appointment has not been stayed or revoked within sixty (60) days of such appointment, (iv) made an assignment for the benefit of creditors or (v) had an order for relief entered with respect to it by a court of competent jurisdiction under any insolvency law which has not been stayed within sixty (60) days of entry. For purposes hereof, the term “insolvency law” means any applicable bankruptcy, insolvency or other similar law now or hereafter in effect.

**“Intellectual Property”** means all registered and unregistered Patents, Copyrights, Industrial Designs, Proprietary Information and Trademarks, including all modifications, enhancements and Improvements thereto and all Intellectual Property Rights therein.

**“Intellectual Property Rights”** means all forms of legal rights and protections that may pertain to or be obtained for any type of Intellectual Property under the laws of any Governmental Authority of any country or jurisdiction.

**“Irix-A Products”** means all of the Products described in Exhibit A as part of the Irix-A product family.

**“License Trigger Event”** means the occurrence of any of the following: (i) X-spine is the subject of a Change of Control by a Zimmer Competitor or (ii) the expiration or termination of this Agreement.

**“Marketing Partners”** means distributors, sales entities, sales representatives, sales agents, and sales and distribution partners authorized by Zimmer or X-spine, as applicable, to promote, market, sell and distribute the Products.

“**Net Sales**” means the cumulative gross invoice price at which the Products are sold to end users during any measurement period by or for Zimmer or any of its Affiliates or sublicensees, less (i) commissions allowed to distributors or direct sales force expense associated with the sale of the Products, (ii) warehouse expenses directly related to inventoried Products, (iii) royalties paid to Third Parties for the manufacture, sale or use of the Products, (iv) discounts allowed for sale of the Products, (v) refunds, replacements, rebates, or credits allowed to purchasers for return of the Products or as reimbursement for damaged Products, (vi) freight, postage, insurance and other shipping charges, and (vii) sales, use and excise taxes, customs, duties and any other governmental charges imposed on the production, approval, importation, use or sale of the Products.

“**Party**” means Zimmer or X-spine, as the context requires.

“**Patent No. 8,439,953**” means United States patent number 8,439,953, including (i) all reissues, substitutions, confirmations, registrations, validations, re-examinations, additions, continuations, continued prosecution applications, continuations-in-part, and divisions to, of or for it, and (ii) supplementary protection certificates and other governmental actions that extend exclusive rights to an invention or technology beyond the original patent expiration date.

“**Patents**” means (i) all United States or foreign patents, United States and foreign patent applications and PCT applications, (including provisional applications and applications for a certificate of invention); (ii) all reissues, substitutions, confirmations, registrations, validations, re-examinations, additions, continuations, continued prosecution applications, continuations-in-part, and divisions of, to or for any patent or patent application; and (iii) all term extensions, supplementary protection certificates and other governmental actions that extend exclusive rights to an invention or technology beyond the original patent expiration date.

“**Person**” means any individual, group or entity, including Governmental Authorities.

“**Pricing Approval**” means, with respect to any country or jurisdiction in which Governmental Authorities determine the pricing at which products will be reimbursed, the approval, agreement, determination or decision by the applicable authorities establishing that pricing.

“**Pricing Measurement Period**” means, for each full calendar year during the Distribution Term, the period from January 1 through August 30.

“**Product Complaint**” means any expression by a Third Party of dissatisfaction relating to the identity, durability, reliability, safety, efficacy or performance of any Product, including actual or suspected product tampering, contamination, mislabeling or misformulation.

“**Products**” means X-spine’s products set forth in Exhibit A, including all Improvements thereto.

“**Proprietary Information**” means a Party’s trade secrets, know-how, business plans, manufacturing processes, clinical strategies, product specifications, scientific data, market analyses, formulae, designs, training manuals and other non-public information (whether business, financial, commercial, scientific, clinical, regulatory or otherwise).

“**Regulatory Authority**” means, with respect to any country or jurisdiction, any Governmental Authority involved in granting Regulatory Clearance or Pricing Approval or in administering Regulatory Laws in that country or jurisdiction.

“**Regulatory Clearance**” means, with respect to any country or jurisdiction, all acts of the applicable Regulatory Authority that are necessary under applicable Regulatory Laws for the manufacture, marketing, distribution and sale of the Product in that country or jurisdiction, and satisfaction of all applicable regulatory and notification requirements and, to the extent applicable, the grant of Pricing Approval.

“**Regulatory Laws**” means all Applicable Laws governing (i) the import, export, testing, sterilization, investigation, manufacture, marketing or sale of the Product; (ii) establishing recordkeeping or reporting obligations; (iii) Field Actions; or (iv) similar regulatory matters.

“**Restricted Customers**” means, collectively, the X-spine Restricted Customers and the Zimmer Restricted Customers, such customers to be defined at the individual health care professional level, rather than at the hospital or other institutional customer level.

“**Specifications**” means, with respect to each Product, (i) X-spine’s design and functionality specifications relating to the Product, (ii) any design and functionality specifications provided by X-spine in its sales literature or other product documentation with respect to the Product and (iii) any specifications for manufacturing, testing, sterilization, storing, packaging, shipping or labeling the Product set forth in any approved application for Regulatory Clearance and any supplements and amendments thereto.

“**Term**” means the period from the Effective Date through the expiration or termination of this Agreement pursuant to Article XI.

“**Territory**” means the entire world.

“**Third Party**” means any Person other than the Parties and their Affiliates.

“**Trademarks**” means all trademarks, service marks, trade dress, logos and trade names, together with all translations, adaptations, derivations and combinations thereof (including all goodwill associated therewith), and all applications, registrations and renewals in connection therewith.

“**Transition Period**” for any Product means the period from the IP License Effective Date until the later to occur of (i) the Final Regulatory Clearance Date, or (ii) the date on which X-spine has fulfilled and delivered on all Firm Orders for such Product that were submitted by Zimmer prior to the Final Regulatory Clearance Date.

“**United States**” or “**U.S.**” means the United States of America, including its territories, commonwealths and possessions.

“**X-spine IP**” means all Intellectual Property that is subject as of the Effective Date, or becomes subject during the Term, to X-spine’s ownership or control and that is necessary or useful for the manufacture, testing, use, promotion, marketing, sale or distribution (including import/export) of the Products. For purposes of this Agreement, X-spine shall be considered to control Intellectual Property or an Intellectual Property Right if X-spine or any of its Affiliates has a license, sublicense or other right to it, including any rights to future licenses, sublicenses or other rights, and also has the right to assign, license, sublicense or otherwise grant rights under it to Zimmer.

“**X-spine Restricted Customers**” means the United States-based customers of X-spine set forth on Exhibit B, such customers to be defined at the individual health care professional level, rather than at the hospital or other institutional customer level, as updated from time to time pursuant to this Agreement.

“**Zimmer Competitors**” means the Third Parties set forth in Exhibit C, their Affiliates and Marketing Partners.

“**Zimmer Restricted Customers**” means the United States-based customers of Zimmer set forth on Exhibit D, such customers to be defined at the individual health care professional level, rather than at the hospital or other institutional customer level, as updated from time to time pursuant to this Agreement.

**(b) Terms Defined Elsewhere.** Capitalized terms not defined in Section 1.1(a) shall have the meanings specified elsewhere in the text of this Agreement. Those terms include the following:

| <b>Term</b>                     | <b>Section</b>         |
|---------------------------------|------------------------|
| Agreement                       | Introductory Paragraph |
| Claim                           | 8.1(c)                 |
| Clinical Data                   | 2.4                    |
| Code of Conduct                 | 6.1(c)                 |
| Confidential Information        | 7.1(a)                 |
| Covered Transaction             | 13.1                   |
| Debarred Entity                 | 6.10(a)                |
| Debarred Individual             | 6.10(a)                |
| Distribute                      | 2.1                    |
| Effective Date                  | Introductory Paragraph |
| Election                        | 13.2                   |
| Excess Products                 | 3.5(d)                 |
| Excused Material Shipping Delay | 3.5(c)                 |
| Firm Orders                     | 3.2                    |
| Forecast                        | 3.1                    |
| Impeding Event                  | 3.8(c)                 |
| Indemnifiable Loss              | 10.1(a)                |
| Initial Term                    | 11.1                   |
| IP License                      | 12.1                   |
| IP License Effective Date       | 12.3                   |
| ISO                             | 5.2                    |
| Material Shipping Delays        | 3.5(c)                 |
| Minimum Thresholds              | 3.8                    |
| Negotiation Period              | 13.2                   |
| Option to License               | 12.1                   |
| Product Liability Claim         | 10.1(a)                |
| Renewal Term                    | 11.1                   |
| Review Period                   | 13.2                   |
| Shortfall Products              | 3.5(d)                 |
| Third-Party Offer               | 13.1                   |
| Transaction Notice              | 13.1                   |
| Transfer Price                  | 4.1                    |
| X-spine                         | Introductory Paragraph |
| X-spine Parties                 | 6.10(a)                |
| Zimmer                          | Introductory Paragraph |
| Zimmer Indemnified Parties      | 10.1(a)                |

**1.2 Rules of Construction.**

(a) When a reference is made in this Agreement to a Recital, an Article, a Section or an Exhibit, such reference is to a Recital, Article or Section of, or an Exhibit to, this Agreement, unless otherwise indicated.

(b) Whenever the words “include,” “includes” or “including” are used in this Agreement, they shall be understood to be followed by the words “without limitation.”

(c) Pronouns, including “he,” “she” and “it,” when used in reference to any Person, shall be deemed applicable to entities or individuals, male or female, as appropriate in any given case.

(d) Article, Section and other headings contained in this Agreement are for reference purposes only and are not intended to describe, interpret, define or limit the scope, extent or intent of any provision of this Agreement.

(e) Standard variations on defined terms (such as the plural form of a term defined in the singular form and the past tense of a term defined in the present tense) shall be deemed to have meanings that correlate to the meanings of the defined terms.

**ARTICLE II  
DISTRIBUTION**

**2.1 Distribution Rights.** X-spine hereby grants to Zimmer, and Zimmer hereby accepts, the co-exclusive right to promote, market, sell and distribute (“**Distribute**”) the Products throughout the Territory during the Distribution Term and any applicable Transition Period for all uses and applications in the Field; provided, however, that Zimmer shall not Distribute or permit Distribution of the Products, directly or indirectly, to any X-Spine Restricted Customer. Notwithstanding the foregoing, X-spine shall retain the right to Distribute the Products; provided, however, that X-spine shall not Distribute or permit Distribution of the Products, directly or indirectly, to any Zimmer Restricted Customer or with any Zimmer Competitor.

## 2.2 Restricted Customers.

(a) Each Party agrees and acknowledges that Exhibit B and Exhibit D set forth the respective X-Spine Restricted Customers and Zimmer Restricted Customers, as of the Effective Date.

(b) Beginning on December 31, 2014, each Party shall update and deliver its respective list of Restricted Customers within thirty (30) days of June 30<sup>th</sup> and December 31<sup>st</sup> of each year after the Effective Date as follows:

(i) During 2014 and 2015, each Party shall remove from its list of Restricted Customers any customer who has not purchased, acquired, ordered or utilized in surgery at least (A) fifty thousand dollars (\$50,000) of products (including the Products and any other products sold by such Party) or (B) twenty-five thousand dollars (\$25,000) of Products from such Party or its Marketing Partners during the twelve (12) month period immediately preceding the applicable June 30<sup>th</sup> or December 31<sup>st</sup> date.

(ii) During 2016 and for the remainder of the Distribution Term (and any applicable Transition Period), each Party shall remove from its list of Restricted Customers any customer who has not purchased, acquired, ordered or utilized in surgery at least twenty-five thousand dollars (\$25,000) of Products from such Party or its Marketing Partners during the twelve (12) month period immediately preceding the applicable June 30<sup>th</sup> or December 31<sup>st</sup> date.

(iii) Subject to clause (iv) below, a Party may add to its list of Restricted Customers any customer who has purchased, acquired, ordered or utilized in surgery at least twenty-five thousand dollars (\$25,000) of Products from such Party or its Marketing Partners during the twelve (12) month period immediately preceding the applicable June 30<sup>th</sup> or December 31<sup>st</sup> date. In the event that both Parties add the same customer to their respective lists of Restricted Customers, the Parties agree to take commercially reasonable efforts to equitably resolve the status of such customer.

(iv) Neither Party may add a customer to its list of Restricted Customers if such customer is already included (and maintained according to this Section 2.2(b)) on the Restricted Customer list of the other Party.

All dollar amounts referred to in this Section 2.2(b) are to be defined by end user pricing.

(c) X-spine represents and warrants that none of the customers listed in Exhibit B are currently purchasing, acquiring or ordering products from Zimmer Marketing Partners.

(d) Only customers located in the United States are eligible to be considered Restricted Customers.



(e) The Parties acknowledge the confidential nature of each list of Restricted Customers and agree that such lists shall be subject to the confidentiality provisions set forth in Article VII. In addition, each Party shall comply with the following provisions:

(i) The Zimmer Restricted Customer list shall not be furnished or disclosed to any Person without prior written consent from Zimmer, with the exception of the following recipients: David Kirschman (President and CEO), Mike Schmitz (Chief Financial Officer) and Daniel Abromowitz (Sales and Marketing Director), or any equivalent successors.

(ii) The X-spine Restricted Customer list shall not be furnished or disclosed to any Person without prior written consent from X-spine, with the exception of the following recipients: Steve Healy (President), Chris Ryan (Vice President of Sales), Jamey Rottman (Vice President of Marketing) and Jonathan Toronto (Division General Counsel), or any equivalent successors.

(iii) The Restricted Customer lists shall be stored and maintained by the Parties and all recipients in a manner so as to fully protect its strictly confidential nature.

(iv) Any recipient of the Restricted Customers list (or any portion thereof) shall be informed by X-spine or Zimmer, as applicable, of the confidential nature of such information and shall be directed to treat the information strictly confidentially.

**2.3 Marketing and Sales Support.** Except as otherwise expressly provided herein, Zimmer shall have sole control and authority over its marketing and sales activities relating to the Products, including design and production of marketing materials. X-spine shall use commercially reasonable efforts to support Zimmer's marketing and sale of the Products, including providing Zimmer with reasonable quantities of its existing marketing and promotional materials for distribution to Zimmer's customers and cooperating with Zimmer in making reasonable modifications to existing marketing and promotional materials as may be requested by Zimmer. Any marketing materials designed or produced by Zimmer (including any modifications requested by Zimmer under the previous sentence) are subject to approval from X- spine, which shall not be unreasonably withheld, conditioned or delayed. If X-spine does not respond to such a modification request within five (5) Business Days, such request shall be deemed approved.

**2.4 Clinical Data.** Zimmer shall have reasonable access to all clinical data supporting the commercialization and use of the Products created by or in coordination with X- spine, whether collected prior to or after the Effective Date ("**Clinical Data**"). Zimmer will have continuing rights to access and use Clinical Data in the event it exercises either its Option to License under Article XII or its Right of First Refusal under Article XIII.

**2.5 Marketing Partners.**

(a) Each Party shall have the right to appoint Marketing Partners to participate in the Distribution of the Products in accordance with Sections 2.1, except as follows:

(i) X-spine shall not appoint any Zimmer Competitors as a Marketing Partner for the Products.

(ii) Neither Party shall distribute or permit Distribution of the Products, directly or indirectly, to or through any Marketing Partner of the other Party; provided, however, to the extent any Marketing Partner of X-Spine is as of the Effective Date also engaged by Zimmer to sell Zimmer products other than the Products, Zimmer shall have exclusive rights to market the Products through that Marketing Partner.

(iii) Notwithstanding the foregoing, X-spine acknowledges that Matt McCoy, Mark Howat and Steve Schrader and their respective organizations may execute sales representative agreements (or other distribution agreements) with Zimmer and upon such execution, each shall be considered a Zimmer Marketing Partner.

(b) Each Party shall ensure compliance by its Marketing Partners with the terms of this Agreement.

**2.6 Training Support.** Zimmer shall be responsible for training health care provider customers, Zimmer's Marketing Partners and Zimmer employees. X-spine shall support Zimmer's training efforts by participating in twelve (12) training sessions at no cost to Zimmer. Zimmer shall reimburse X-spine's reasonable, documented, out of pocket travel and meeting expenses, not to exceed ten thousand dollars (\$10,000) per training session. Such training and support is not intended to include services of licensed physicians. If additional training sessions are requested by Zimmer, the Parties will negotiate the terms, including costs, of such sessions.

### ARTICLE III PURCHASING

**3.1 Forecasts.** On a monthly basis Zimmer shall provide to X-spine a rolling twelve (12) month forecast of the anticipated quantities of the Products that Zimmer expects to order (each, a "**Forecast**"). Each Forecast shall be non-binding and for planning purposes only.

**3.2 Firm Orders.** Zimmer will place firm orders for the Products ("**Firm Orders**") in Zimmer's standard form, as modified from time to time. Each Firm Order will state the quantity and type of Product purchased, delivery date(s) and applicable Transfer Price (as defined below). Firm Orders may be submitted via e-mail. Each Firm Order made in accordance with this Agreement shall be accepted by X-spine. If any term in any Firm Order or confirmation conflicts with any term in this Agreement, the conflicting term in this Agreement shall govern and control.

**3.3 Initial Inventory Purchase.** Within thirty (30) days of such time that X-spine completes and Zimmer gives final approval in writing for all engineering specifications and, as applicable, branding and/or private labeling activities to be performed under Section 5.7, Zimmer shall place a binding Firm Order to purchase the following type and number of Products in configurations substantially similar to those set forth in Exhibit A:

- Axle Kit Assembly X060-0000: 25 kits
- X063-1000FIXCET II Kit Assembly and/or X076-1000 Zygapix Kit Assembly: 10 kits
- X070-0000 Silex Kit Assembly: 10 kits
- Irix C Implant Kit Assembly: 10 kits
- Irix C Instrument Kit Assembly: 10 kits

Zimmer may at its discretion opt to modify the configuration of the kits, for example including a lower quantity of a specific implant size in the kits. The Parties agree and acknowledge that multiple Firm Orders may be placed by separate product lines in order to fulfill Zimmer's obligations under this Section 3.3.

**3.4 Irix-A Purchase.** X-spine shall notify Zimmer immediately upon receipt of Regulatory Clearance from the FDA for the Irix-A Products. Within thirty (30) days of such notice from X-spine, Zimmer shall place a binding Firm Order to purchase twenty-five (25) Irix-A kits in configurations to be mutually agreed upon by the Parties.

**3.5 Shipping.**

**(a)** X-spine shall ship the Products FOB shipping point (X-spine's facility in Dayton, Ohio or other facility designated by X-spine) to the Zimmer facilities designated by Zimmer. All shipments shall be made by a carrier designated by Zimmer, and shipping costs be borne by Zimmer.

**(b)** X-spine shall use commercially reasonable efforts to deliver the Products no later than the delivery date(s) specified in the applicable Firm Order, as long as such Firm Order is accepted by X-spine. X-spine's acceptance of any such Firm Order shall not be unreasonably withheld or delayed. X-spine shall be deemed to have accepted a Firm Order unless X-spine delivers a written rejection to Zimmer within ten (10) Business Days of X-spine's receipt of the Firm Order.

**(c)** In the event that X-spine is not able to timely make available an entire Firm Order, X-spine shall (i) make available for delivery as much of the Firm Order as possible, and (ii) provide prompt notice to Zimmer of the anticipated shortfall, which notice shall specify the cause for the delay and the estimated delivery date for the remaining Products. Any delays of greater than thirty (30) days beyond the lead times specified in Exhibit E (excluding delays caused by force majeure as provided in Section 14.2) ("**Material Shipping Delays**") shall constitute a material breach of this Agreement by X-spine, except that one Material Shipping Delay per rolling twelve (12) month period shall be permitted without constituting a material breach of this Agreement by X-Spine ("**Excused Material Shipping Delay**"). If any Excused Material Shipping Delay is greater than ninety (90) days beyond the lead times specified in Exhibit E (excluding delays caused by force majeure as provided in Section 14.2), such delay shall no longer be excused and it shall constitute a material breach of this Agreement by X-spine. Notwithstanding the foregoing, a shipping delay impacting less than ten percent (10%) of any individual SKU within an applicable Firm Order shall not constitute a Material Shipping Delay.

(d) Notwithstanding the foregoing, to the extent a Firm Order of Products exceeds one hundred and twenty-five percent (125%) of the amount specified in the Forecast (such amount to be calculated in terms of SKU's) provided at least sixty (60) but no more than ninety (90) days prior to the Firm Order (measured by units of Product) (the amount above such one hundred and twenty-five percent (125%) threshold is referred to herein as the "**Excess Products**"), the Parties shall negotiate and mutually agree upon revised lead times for the Excess Products, and a failure of X-spine to deliver such Excess Products within the time periods set forth in the previous sentence shall not constitute a material breach of this Agreement. To the extent a Firm Order of Products falls below fifty percent (50%) of the amount specified in the Forecast provided at least thirty (30) days, but no more than sixty (60) days, prior to such Firm Order (measured by total dollar amount) (the shortfall below such fifty percent (50%) threshold is referred to herein as the "**Shortfall Products**"), Zimmer shall be obligated to purchase the Shortfall Products within ninety (90) days of manufacture. For the initial inventory purchase described in Section 3.3, the delivery lead times shall not be initiated until the applicable Firm Orders are accepted by X-spine.

(e) X-spine shall package, label, store and make available for shipment all Products in compliance with Applicable Laws, the Specifications and any reasonable requests by Zimmer and in accordance with good commercial and industry practice. The shipping container used by X-spine shall be validated per ISTA standard 3A (as published by International Safe Transit Association), to ensure that the safety and integrity of the Product is maintained during transit. The Products shall be ready for resale. X-spine shall package the Products suitably for export and appropriately to prevent damage during shipment. The packing slip/delivery note for each shipment of Products shall have the part number, purchase order number and delivery quantity.

**3.6 Quality Testing.** Prior to shipping Products to Zimmer, X-spine will inspect and perform quality testing on each Product to confirm finished device acceptance to ensure that each production run, lot or batch of finished devices meets acceptance criteria. X-spine shall document the results of said inspection and quality testing for each Product. Such documentation shall be made available to Zimmer upon request. X-spine will ship to Zimmer only those Products that have passed such inspection and quality testing and are defect free and conform to the Specifications.

**3.7 Acceptance of Products.** Zimmer, its Marketing Partners and/or the end users of the Products shall have a reasonable right of inspection to verify that the Products conform to the applicable Firm Order and the terms of this Agreement. Any defective or non-conforming Product shall be returned to X-spine. X-spine shall bear all costs of return (including freight and insurance) and shall either replace the defective or non-conforming Product without charge (including payment of freight and insurance for delivery of the replacement product) or, at Zimmer's request, refund to Zimmer the entire amount paid in connection with the rejected Product. Nothing in this Section 3.7, including the exercise of rights hereunder, shall be construed as a waiver of Zimmer's indemnification rights, its warranty rights or any other common law or statutory remedies.

**3.8 Minimum Payments.**

**(a) Minimum Thresholds.**

**(i) Loss of Co-Exclusivity and the Right of First Refusal.** In the event that the aggregate transfer price for the Firm Orders submitted in any given measurement period (comprised of a calendar year unless otherwise indicated) by Zimmer is less than the dollar amounts set forth below (the “**Minimum Thresholds**”), then, at the option of X-spine (A) the co-exclusive Distribution rights granted to Zimmer under Section 2.1 shall become nonexclusive and (B) the Right of First Refusal granted to Zimmer under Article XIII shall become void and without effect. The Minimum Thresholds for this Section 3.8(a)(i) shall be as follows:

| <b>Loss of Co-Exclusivity and the Right of First Refusal</b> |                            |
|--|----------------------------|
| <b>Measurement Period</b>                                    | <b>Minimum Requirement</b> |
| July through December of 2015                                | \$1,500,000                |
| Each calendar year from 2016 through 2019                    | \$3,000,000                |
| Each calendar year from 2020 and thereafter                  | \$2,000,000                |

For the sake of clarity, if X-spine properly exercises its rights under clause (A) above, Section 2.5(a)(i) will also be rendered void and without effect.

**(ii) Loss of Option to License.** In addition to Section 3.8(a)(i) above, in the event that the aggregate transfer price for the Firm Orders submitted in any given measurement period (comprised of a calendar year unless otherwise indicated) by Zimmer is less than the Minimum Thresholds set forth below, then, at the option of X-spine, the Option to License granted to Zimmer under Article XII shall become void and without effect. The Minimum Thresholds for this Section 3.8(a)(ii) shall be as follows:

| <b>Loss of Option to License</b>            |                            |
|---|----------------------------|
| <b>Measurement Period</b>                   | <b>Minimum Requirement</b> |
| July through December of 2015               | \$1,000,000                |
| Each calendar year from 2016 through 2019   | \$2,000,000                |
| Each calendar year from 2020 and thereafter | \$1,250,000                |

(iii) As used below, unless otherwise noted, the term “Minimum Thresholds” shall apply to both of the Minimum Thresholds set forth above.

(b) To the extent that the aggregate transfer price for the Firm Orders for any calendar year exceeds one or both of the Minimum Thresholds for such period, Zimmer shall have the right to carry forward the excess and apply it toward such Minimum Threshold(s) for any subsequent calendar year.

(c) Notwithstanding the foregoing, and without limiting the indemnification or termination provisions herein, Zimmer shall have no obligations and X-spine shall have no rights under Section 3.8(a) for any given calendar year if Zimmer’s Distribution of any particular Product is materially and adversely affected for a continuous period of at least sixty (60) days or for a total period of at least seventy-five (75) days (on a non-continuous basis) during such calendar year by any of the following (each, an “**Impeding Event**”): (i) any claim, action or litigation (including claims, actions or litigation related to intellectual property or product liability) relating to such Product or this Agreement which prevents or impedes Zimmer from selling such Products (e.g., patent infringement injunction); (ii) any occurrence or development that reasonably calls into question the safety or efficacy of such Product or reasonably poses a substantial legal liability on Zimmer; (iii) the FDA or other Regulatory Authority withdraws or otherwise materially limits Regulatory Clearance for such Product; (iv) X-spine is in breach of this Agreement and such breach adversely affects, in any material way, Zimmer’s ability to Distribute such Product; or (v) any other circumstance beyond Zimmer’s control legally prevents Zimmer from Distributing such Product.

(d) In order to exercise its rights under either Section 3.8(a)(i) or Section 3.8(a)(ii), X-spine must notify Zimmer in writing thereof within thirty (30) days of the end of the measurement period for which Zimmer failed to meet the applicable Minimum Threshold(s). Zimmer shall be entitled to retain its co-exclusive Distribution, Right of First Refusal rights and/or Option to License by submitting, within thirty (30) days after its receipt of such notice, one or more Firm Orders for the Products required to make up the shortfall in meeting the applicable Minimum Threshold(s) for such measurement period. For clarification, orders made pursuant to this subsection (d) do not count toward the applicable Minimum Threshold(s) for the following calendar year (in other words, such orders do not count twice).

(e) For clarification purposes, X-spine’s sole remedy for Zimmer’s failure to meet the Minimum Thresholds under Section 3.8(a)(ii) is to render the Option to License under Article XII void and without effect, and X-spine’s sole remedies for Zimmer’s failure to meet the Minimum Thresholds under both Section 3.8(a)(i) and Section 3.8(a)(ii) are (i) to render nonexclusive the Distribution rights under Section 2.1, (ii) to render the Right of First Refusal under Article XIII void and without effect and (iii) to render the Option to License under Article XII void and without effect.

**3.9 Preliminary Test Kits.** The Parties agree that Zimmer may, in advance of the Initial Inventory Purchase and subject to availability and shipping terms as determined by X-spine in its reasonable judgment, order X-spine-branded kits from each of the Axle, Irix-C and Irix-A product families. Upon accepting any such orders, X-spine shall fill the orders using commercially reasonable efforts.

**ARTICLE IV  
PRICING AND PAYMENTS**

**4.1 Transfer Pricing.** With the exception of Irix-A Products, the initial Transfer Price (“**Transfer Price**”) for each Product offered for sale, by X-spine to Zimmer, is set forth in Exhibit A. The initial Transfer Price for Irix-A Products shall be agreed upon by the Parties using a pricing approach substantially similar to that set forth in Sections 4.1(a) and 4.1(b) (i.e. a 75% Average Gross Margin for Zimmer on Irix-A Implant Products and a 20% Average Gross Margin for X-spine on Instrument Products). These Transfer Prices shall be firm through December 31, 2015. Thereafter, the Transfer Prices shall be adjusted as follows during the Distribution Term:

(a) Effective on January 1 of each calendar year beginning on January 1, 2016, the Transfer Price for each Implant Product shall be adjusted to equal the Transfer Price that if paid by Zimmer to X-spine would ultimately have resulted in a seventy-five percent (75%) Average Gross Margin for Zimmer, based upon Zimmer’s sales to end users, during the Pricing Measurement Period of the previous calendar year; provided that such annual adjustment shall not increase or decrease the Transfer Price for any Implant Product by more than five percent (5%) of the total Transfer Price for that Implant Product. Zimmer shall calculate the new Transfer Prices for the Implant Products on an annual basis and Zimmer shall notify X-spine of the new Transfer Prices no later than September 30 of the calendar year immediately preceding the calendar year in which such new Transfer Prices are to take effect.

(b) Effective on January 1 of each calendar year beginning on January 1, 2016, the Transfer Price for each Instrument Product shall be adjusted to equal the Transfer Price that if paid by Zimmer to X-spine would ultimately have resulted in a twenty percent (20%) Average Gross Margin for X-spine, based upon X-spine’s sales to Zimmer, during the Pricing Measurement Period of the previous calendar year; provided that such annual adjustment shall not increase or decrease the Transfer Price for any Instrument Product by more than five percent (5%) of the total Transfer Price for that Instrument Product. X-spine shall calculate the new Transfer Prices for the Instrument Products on an annual basis and X-spine shall notify Zimmer of the new Transfer Prices no later than September 30 of the calendar year immediately preceding the calendar year in which such new Transfer Prices are to take effect.

(c) Notwithstanding the foregoing, in the event that then-cumulative Transfer Price adjustments described in Sections 4.1(a) and (b) above result in an aggregate increase or reduction to the Transfer Price for any Product of twenty percent (20%) or more relative to the Transfer Price set forth in Exhibit A (or in the case of Irix-A Products, the initial Transfer Price as agreed to by the Parties), the Parties shall review and negotiate the Transfer Price using commercially reasonable judgment based upon then-current market circumstances. If the Parties are unable to reach agreement on a new Transfer Price for any particular Product, the Transfer Price for such Product shall be adjusted such that the aggregate increase or reduction beyond twenty percent (20%) shall be borne equally by the Parties (each Party’s Average Gross Margin would be reduced by the same absolute percentage). For clarification by example, if the current Transfer Price resulted in an Average Gross Margin of seventy-five percent (75%) for Zimmer and fifty-five percent (55%) for X-spine, a reduction in Transfer Price to result in an Average Gross Margin of seventy percent (70%) for Zimmer and fifty percent (50%) for X-spine would be acceptable. In no case, however, shall Transfer Prices fall below seventy percent (70%) of those set forth in Exhibit A (or in the case of Irix-A Products, the initial Transfer Price as agreed to by the Parties).

(d) Each Party shall have reasonable access to the books and records of the other Party as may be necessary in order to verify the Average Gross Margin calculation for any pricing adjustment made under this Section 4.1.

**4.2 Royalty Payments.** Zimmer shall make royalty payments to X-spine in an amount equal to four percent (4%) of Net Sales of all Products except for Axle Products and two percent (2%) of Net Sales of Axle Products, in each case to the extent received by Zimmer during the Distribution Term and with the following limitations:

(a) In the event Zimmer reasonably determines that it needs a license or other access to Intellectual Property Rights of a Third Party in order to Distribute the Products, any consideration paid to such Third Party by Zimmer in order to obtain such license or access (including upfront fees, royalties and other forms of consideration) shall be credited against any royalty payments due to X-spine under this Agreement. Nothing herein shall be construed to limit Zimmer's indemnification rights under Section 10.1.

(b) Multiple royalties shall not be payable in the case of multiple resales of the Products through a distribution chain. Royalties shall be payable in arrears on a quarterly basis in immediately available funds. So long as royalties are due hereunder, Zimmer shall provide to X-spine reports (in written or electronic form) on Net Sales for each calendar quarter and the amount of royalties due thereon. Each report shall be due on the sixtieth (60<sup>th</sup>) day following the last day of the applicable calendar quarter. Royalty payments shall be due and payable on the date each report is due.

(c) The obligation to pay royalties under this Section 4.2 shall terminate with respect to each Product in each jurisdiction upon the expiration of the last to expire valid Patent claim covering such Product in such jurisdiction.

**4.3 Payment Terms.** Zimmer shall pay X-spine for purchased Products within sixty (60) days from the date Zimmer receives the purchased Products and the applicable invoice from X-spine. Zimmer shall receive a three percent (3%) discount on any invoice if Zimmer makes a full payment within ten (10) days of receipt of the purchased Products and the invoice.

**4.4 Taxes.** X-spine shall be responsible for any and all federal, state or local excise or gross receipts taxes, personal property taxes, customs duties or levies and any foreign taxes which may be imposed on manufacturing or production activities related to the Products, or on articles, supplies or services ordered hereunder by reason of their sale, delivery to or subsequent payment by Zimmer. X-spine represents that any federal, state or local sales/use taxes which are charged on the Products ordered hereunder will be promptly remitted to the designated jurisdiction and that X-spine is authorized and properly registered with the jurisdiction taxing authorities to collect and remit said taxes. In the event that X-spine has an obligation to collect said sales/use taxes, fails to do so and is subsequently assessed by a taxing authority or agency, X-spine waives all rights to seek contribution from Zimmer, its Marketing Partners or end users for any interest or penalty charged. Further, X-spine shall not have the right to seek contribution for any sales/use taxes assessed on Products sold to Zimmer to the extent that Zimmer has either previously self-assessed and paid said taxes itself or the statute of limitations with respect to the jurisdiction has expired. Zimmer shall be responsible for any federal, state or local sales or gross receipts taxes, personal property taxes, customs duties or levies and any foreign taxes which may be imposed on the sale of the Products by Zimmer.



**ARTICLE V**  
**MANUFACTURING**

**5.1 Inventory.** X-spine shall use commercially reasonable efforts to maintain sufficient manufacturing capacity (including appropriate manufacturing, storage and distribution facilities and qualified personnel) to meet Zimmer's Forecasts for the Products. Without limiting the foregoing, X-spine shall keep a safety stock of no less than two (2) months' supply of the Products (based upon the Forecasts) at all times during the Distribution Term.

**5.2 Manufacturing.** X-spine shall be responsible in all respects for manufacturing and supplying the Products. The Products shall be manufactured and sterilized in accordance with the Specifications and all Applicable Laws, including Good Manufacturing Practices (as defined by the FDA) and standard 13485 specifications (as defined by the International Organization for Standards ("ISO")). X-spine shall maintain accurate and complete records relating to its manufacture, sterilization and testing of the Products, including all records required under Applicable Laws, throughout the Distribution Term and any applicable Transition Period (or for such longer period as may be required by Applicable Laws).

**5.3 Process and Product Modifications.** X-spine shall notify Zimmer at least thirty (30) days in advance of any proposed material changes to the manufacturing processes for the Products. X-spine shall not materially alter or modify the Products or their packaging or labeling without the prior written consent of Zimmer. X-spine will use reasonable efforts to make product Improvements and modifications as may be reasonably requested by Zimmer, and Zimmer shall pay commercially reasonable expenses for such product Improvements and modifications.

**5.4 Product Warranty.** X-spine warrants to Zimmer, its Marketing Partners and the end users of each Product, that such Product, when delivered in accordance with the applicable Firm Order, will (i) conform to the Specifications, (ii) have been manufactured, tested, stored, packaged, labeled, sterilized and shipped in compliance with Applicable Laws and the Specifications and (iii) be free of defects in design, material, engineering, fabrication and workmanship. X-spine further warrants to Zimmer that the Products, when delivered, shall be free and clear of any liens, security interests or encumbrances of any nature whatsoever. X- SPINE DISCLAIMS ALL IMPLIED WARRANTIES, INCLUDING ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

**5.5 Specifications.** X-spine shall provide to Zimmer information concerning the Specifications as reasonably requested by Zimmer from time to time.

**5.6 Subcontracting.** X-spine shall be permitted to subcontract its obligations under this Agreement only to subcontractors currently engaged by X-spine (and disclosed to Zimmer) as of the Effective Date and approved through X-spine's supplier assessment process. X-spine shall cause such permitted subcontractors to comply with all terms under this Agreement and all Applicable Laws in connection with their performance hereunder. X-spine shall remain primarily responsible for performance of its obligations hereunder, including obligations relating to product quality assurance, compliance with Applicable Laws and Confidential Information, regardless of whether any of X-spine's obligations are undertaken by a subcontractor. Except as set forth in the first sentence of this Section 5.6, X-spine shall not subcontract its obligations under this Agreement to any Person without providing Zimmer with prior written notice of X- Spine's selection and qualification of the proposed subcontractor consistent with the requirements of X-Spine's quality system.

**5.7 Product Branding.** All Products will be branded as private label for Zimmer, which shall include use of the following: (a) new product names determined by Zimmer, (b) part numbers specific to Zimmer and (c) packaging and labeling consistent with Zimmer's current branding. Zimmer shall provide X-spine with detailed direction on the branding of the Products. X-spine shall be responsible for the development, quality and regulatory efforts required in conjunction with the branding activities described in this Section 5.7. Without limiting Zimmer's rights under Section 5.7(c), the Parties agree that Zimmer-specific marking or labeling shall be included on Product packaging and labeling but not on actual physical Products (unless otherwise agreed to by the Parties). Zimmer shall compensate X-spine for reasonable, pre- approved costs incurred for this work.

## **ARTICLE VI REGULATORY MATTERS**

### **6.1 Compliance.**

**(a)** Each Party shall comply in all material respects with all Applicable Laws that pertain to its activities under this Agreement and, except as otherwise provided for herein, shall bear the entire cost and expense of such compliance.

**(b)** Without limiting the generality of the foregoing, both Parties will abide by the FCPA, the Anti-Kickback Statute, and all other anti-corruption and anti-bribery laws of the United States, as well as the local anti-corruption and anti-bribery laws of each country within the Territory. Neither Party shall offer, give, promise to give or authorize giving, directly or indirectly, any money or anything else of value to any government official (including any employee of a state-owned or controlled entity or public international organization), political party, political official, candidate for public office or any other Person or entity, with the knowledge that such payment, offer or promise to pay will be made to any governmental official in an effort to win or retain business, secure any advantage over competitors, or for the purpose of influencing such governmental official to make one or more business decisions favorable to Zimmer, X-spine or both. The Parties understand that, for these purposes, in some cases, doctors, nurses, hospital administrators, and other healthcare providers may be considered government officials. Zimmer represents that it does not desire and covenants that it will not request any service or action by X-spine which may constitute a violation of applicable anti-corruption laws.

(c) X-spine shall comply with Zimmer's Code of Business Conduct and compliance policies and procedures related to the engagement and retention of health care professionals ("**Code of Conduct**").

## **6.2 Regulatory Clearances.**

(a) X-spine represents and warrants to Zimmer that it has applied for and received Regulatory Clearance for the Products (except the Irix-A Products) in the United States and that such Regulatory Clearance is in good standing.

(b) X-spine shall use commercially reasonable efforts to obtain Regulatory Clearance for the Irix-A Products in the United States.

(c) X-spine shall use commercially reasonable efforts to apply for and obtain Regulatory Clearance for the Products in jurisdictions outside of the United States as requested by Zimmer.

(d) During the Distribution Term and any applicable Transition Period, X-spine shall be responsible as the manufacturer of record of the Products for all costs and expenses relating to the application for and maintenance of Regulatory Clearances in the Territory. X-spine shall have primary responsibility for all communications, submissions and interactions with the Regulatory Authorities for the purpose of obtaining and maintaining Regulatory Clearances. X-spine shall notify Zimmer any time that it applies for, obtains or loses any Regulatory Clearance. To the extent permitted under Applicable Laws, X-spine hereby grants to Zimmer the fully paid up right to use during the Term any and all Regulatory Clearances and regulatory approvals related to the Products owned by or licensed to X-spine and existing as of the Effective Date or obtained during the Term necessary or useful for Zimmer to exercise its rights and perform its obligations under this Agreement.

## **6.3 Actions by Regulatory Authorities.**

(a) X-spine shall be primarily responsible to Regulatory Authorities throughout the Territory as the manufacturer of record of the Products.

(b) If either Party receives notice of an audit, inspection, investigation, inquiry, import or export ban, product seizure, enforcement proceeding or similar action by a Regulatory Authority with respect to any Product or a Party's activities in connection with any Product, it will notify the other Party as soon as reasonably practicable, but in any event within seventy-two (72) hours after its receipt of notice of the action and will promptly deliver to the other Party copies of all relevant documents received from the Regulatory Authority. The Parties shall cooperate in response to the action, including providing information and documentation as requested by the Regulatory Authority. If the action primarily concerns the activities of Zimmer or its Marketing Partners or Affiliates, then Zimmer shall have primary responsibility to respond to the Regulatory Authority and will bear all costs in connection therewith; otherwise, X-spine shall have primary responsibility to respond and will bear all costs in connection therewith. In either case, upon request of the responding Party, the other Party shall provide consulting advice and assistance with the response.

**6.4 Inspections.** Zimmer shall have the right, upon reasonable prior notice to X-spine and not more frequently than once per year and during regular business hours, to inspect and audit X-spine's, and to the extent possible, X-spine's subcontractor's, facilities and operations for the purpose of verifying their compliance with their obligations under Regulatory Laws, this Agreement and applicable quality system requirements, including the right to (a) inspect and take samples of the Products, (b) observe manufacturing and related operations, processes and methods, (c) review documentation and (d) conduct quality assurance, quality system and regulatory compliance audits. Zimmer will be responsible for the cost and expense of such audit.

**6.5 Product Labels.** During the Distribution Term and any applicable Transition Period, X-spine shall have sole responsibility for obtaining all necessary Product labels and for negotiating the language of the Product labels with the applicable Regulatory Authorities in the Territory. All labels (and any changes to labels) shall, without limitation, include both Zimmer-specific and X-spine-specific part numbers and be subject to approval of Zimmer prior to implementation, except as required by Applicable Law. X-spine shall establish and maintain procedures to control label integrity, inspection and storage and to control operations of labeling used for each production unit, lot or batch to prevent labeling mix-ups. X-spine shall control the packaging and labeling of the Products to ensure conformance to their respective Specifications and Applicable Laws.

**6.6 Product Complaints and Reports.** The Parties each shall collect and record Product Complaints (and any other events required to be recorded under Applicable Laws) in accordance with Applicable Laws and their standard procedures and policies in effect from time to time. Each Party shall provide to the other Party reports of such complaints or events within seventy-two (72) hours after receipt. X-spine shall be responsible for investigating all Product Complaints. X-spine shall be responsible for submitting to the Regulatory Authorities all required reports and other materials, including annual reports, distribution reports and safety reports. Each Party shall immediately notify the other Party of any material information it learns concerning the safety or efficacy of the Product, regardless of whether formal reporting to any Regulatory Authority is required.

**6.7 Field Actions.** If either Party in good faith determines that a removal, correction, recall or other Field Action involving a Product or its labeling is warranted (whether or not required by a Regulatory Authority), such Party shall immediately notify the other Party in writing and shall advise such other Party of the reasons underlying its determination that a removal, correction, recall or other Field Action is warranted. The Parties shall consult with each other as to any action to be taken in regard to such removal, correction, recall or other Field Action. If, after consultations, either Party in good faith believes that such a removal, correction, recall or Field Action should be undertaken with respect to the Product or its labeling, the Parties shall cooperate in carrying out the same, and Zimmer shall follow any reasonable direction for X-spine with respect thereto. X-spine shall be responsible for all of Zimmer's reasonable out-of-pocket costs and expenses, including the replacement cost of the Products, in the event of removals, corrections, recalls or other Field Actions with respect to any Product except to the extent such removal, correction, recall or other Field Action was due to an act or omission of Zimmer in which case Zimmer shall be responsible for X-spine's reasonable out-of-pocket costs and expenses in connection therewith. X-spine shall be responsible for any required reporting to Regulatory Authorities with respect to any removal, correction, recall or other Field Action involving the Product or its labeling.

## **6.8 Additional Quality and Regulatory Provisions.**

**(a)** During the Distribution Term and any applicable Transition Period, X- spine shall be responsible for all design control, manufacturing, process, validation and process control activities relative to the Products, including design assurance and product and process validations, as required by the FDA's Quality System Regulations ("QSRs"), ISO standards, and applicable regulations, and Applicable Laws.

**(i)** X-spine shall develop, conduct, control, and monitor production processes to ensure that the Products conform to the Specifications. This includes the establishment and maintenance of procedures for acceptance activities, to include inspections, tests, or other verification activities, to ensure that specified requirements are met for incoming Products, in-process Products and finished goods.

**(ii)** X-spine shall establish and maintain procedures for changes to a manufacturing specification, method, or process. X-spine shall notify Zimmer of any material change(s) to a manufacturing specification, method or process pursuant to Section 5.3.

**(iii)** X-spine shall establish and maintain schedules for the adjustment, cleaning, and other maintenance of equipment to ensure that manufacturing Specifications are met.

**(iv)** X-spine shall ensure that all inspection, measuring, and test equipment is suitable for its intended purposes and is capable of producing valid results.

**(v)** X-spine shall establish and maintain procedures to ensure that equipment is routinely calibrated, inspected, checked and maintained.

**(vi)** X-spine shall establish and maintain documented process validations to support all cleaning and sterilization instructions included in any Product labeling.

**(b)** X-spine shall be responsible for managing an effective document change control system relative to the design, manufacture, and labeling of the Products at the location of X-spine and its permitted Third-Party vendors.

**(c)** X-spine shall be responsible for managing an effective product and process validation system relative to the design and manufacture of the Products at the location of X-spine and its permitted Third-Party manufacturers. X-spine shall develop and implement validation or qualification protocols for significant processes, equipment and computer systems.

**(d)** X-spine shall establish and maintain procedures for acceptance activities, including inspections, tests or other verification activities to ensure that specified requirements are met for incoming Product, in-process Product and finished Product, as required by the QSRs. X-spine shall identify by suitable means the acceptance of Product and, if applicable, shall indicate the conformance or non-conformance of Product with established acceptance criteria throughout manufacturing, packaging, labeling and servicing of Product, as required by the QSRs. X-spine shall establish and maintain procedures to control Product that does not conform, by addressing identification, documentation, evaluation, segregation and reevaluation of non-conforming Product as required by the QSRs.

**(e)** X-spine shall maintain appropriate documented procedures designed to prevent mix-ups. X-spine shall provide evidence to the effect that packaging containers maintain the integrity, quality, and function of the Product for the entire shelf life, and not produce toxic residues during storage, all consistent with industry practice. Packaging must be designed to prevent or indicate the occurrence of tampering.

**(f)** X-spine shall establish and maintain procedures for implementing and documenting corrective and preventive actions, including analyzing processes, work operations, concessions, quality audit reports, quality records, service records, complaints and returned Product, as required by the QSRs. Appropriate statistical methodology shall be employed where necessary to detect recurring quality problems.

**(g)** X-spine shall deliver Products to Zimmer using documented procedures for the handling, storage, packaging, preservation and delivery of the Products. The shipping container shall be validated to ensure that the safety and integrity of each Product is maintained during transit. Zimmer shall deliver Products to its customers using documented procedures for handling, storage, packing, preservation and delivery of the Products.

**(h)** Zimmer reserves the right to request lot specific compliance to specification information in the form of a certificate of compliance.

**(i)** X-spine shall establish and maintain a quality system in compliance with QSR, ISO, and various international requirements for the manufacture of the Products. X-spine shall also ensure that its permitted subcontractors and vendors of Products maintain a quality system in compliance with QSR requirements.

**(j)** X-spine shall establish procedures for identifying training needs and ensure that all personnel are trained adequately to perform their assigned responsibilities. Training shall be documented.

**(k)** X-spine and Zimmer shall enter into a supplier quality agreement in order to fulfill Zimmer supplier control requirements. The Parties agree to work together in good faith to finalize and execute such agreement within thirty (30) days after the Effective Date.

**6.9 Quality Records.** Both X-spine and Zimmer shall retain all applicable quality records (e.g., Device Master Records, Device History Records, distribution records, complaint records, etc., as applicable) for a period of five (5) years after the expiration of the expected life of the Products. Where the expected life of the Products is undetermined, the records shall be retained permanently.

**6.10 Regulatory Representations and Warranties.** X-spine hereby represents and warrants to Zimmer that:

(a) This Agreement is not intended to violate the Anti-Kickback Statute, 42 U.S.C. 1320-7b(b). Zimmer has referenced and made available to X-spine a copy of its Code of Conduct and a summary of Zimmer's Anti-Kickback Statute policies and procedures on Zimmer's website (www.zimmer.com). None of X-spine, its Affiliates or any of their respective officers, directors, subcontractors, agents or employees (collectively, "**X-spine Parties**") have ever been debarred, excluded or suspended by the Office of Inspector General of the Department of Health and Human Services, or from federal or state procurement programs, or convicted of a criminal offense with respect to health care reimbursement. Without limiting the generality of the foregoing, X-spine further represents and warrants that none of the X-spine Parties has been, is currently, or, during the Term, will become: (a) an individual who has been debarred by the FDA pursuant to 21 U.S.C. §335a(a) or §335a(b) (a "**Debarred Individual**") from providing services in any capacity to a Person that has an approved or pending drug product application, or an employer, employee or partner of a Debarred Individual, or (b) an entity that has been by the FDA pursuant to 21 U.S.C. §335a(a) or §335a (b) (a "**Debarred Entity**") from submitting or assisting in the submission of any abbreviated drug application, or an employee, partner, shareholder, member, subsidiary or Affiliate of a Debarred Entity. No Debarred Individual or Debarred Entity will perform on X-spine's behalf any services or render any assistance relating thereto in connection with this Agreement. X-spine further represents and warrants that X-spine has no knowledge of any circumstances which may affect the accuracy of the foregoing representations and warranties, including FDA investigations of, or debarment proceedings against the X-spine Parties, and X-spine will immediately notify Zimmer if X-spine becomes aware of any such circumstances during the term of this Agreement.

(b) No X-spine Party has ever been in violation of the FCPA.

(c) No government official is a principal, owner, officer, employee or agent of any entity in which X-spine has an interest, and no government official has any material financial interest in the business of the X-spine.

(d) There are no circumstances that may affect the accuracy of the foregoing representatives and warranties, including FDA investigations of, or debarment proceedings against, X-spine or any Person performing services or rendering assistance relating thereto, and X-spine will immediately notify Zimmer if it becomes aware of any such circumstances during the Term.

(e) X-spine represents and warrants that the terms of this Agreement are not inconsistent with any other contractual or legal obligations X-spine may have or with the policies of any institution with which X-spine is associated.

(f) X-spine warrants that it does not undertake the direct or indirect sales and marketing promotion of Zimmer products to sources of federal health care program business, including individuals and entities in a position to recommend or refer federal health care program business. X-spine warrants that it does not employ or contract with any health care professional in a position to recommend or refer Zimmer's products for purchase by any source of federal health care program business and further warrants no owner, investor or manager of X-spine is authorized to undertake any such activities. In the event of any subsequent ownership, investment, management or employment structure of X-spine changes these representations, X-spine with notify Zimmer within five (5) Business Days and such changes in representation may be a basis for Zimmer to terminate this agreement immediately upon written notice to X-spine.

## ARTICLE VII CONFIDENTIALITY

7.1 **Confidentiality.** In the course of their activities pursuant to this Agreement, the Parties anticipate that they may disclose Confidential Information to one another and that either Party may, from time to time, be either the disclosing Party or the recipient of Confidential Information. The Parties wish to protect such Confidential Information in accordance with this Section 7.1. The provisions of this Section shall apply to disclosures furnished to or received by a Party and its agents and representatives (which may include agents and representatives of its Affiliates and Marketing Partners). Each Party shall advise its agents and representatives of the requirements of this Section and shall be responsible to ensure their compliance with such provisions.

(a) For purposes hereof, "**Confidential Information**" with respect to a disclosing Party means all information, in any form or media that the disclosing Party furnishes to the recipient, whether furnished before or after the Effective Date, and all notes, analyses, compilations, studies and other materials, whether prepared by the recipient or others, that contain or reflect such information; provided, however, that Confidential Information does not include information that (i) is or hereafter becomes generally available to the public other than as a result of a disclosure by the recipient, (ii) was already known to the recipient prior to receipt from the disclosing Party as evidenced by prior written documents in its possession not subject to an existing confidentiality obligation to the disclosing Party, (iii) is disclosed to the recipient on a non-confidential basis by a Person who is not in breach of any confidentiality obligation to the disclosing Party or (iv) is developed by or on behalf of the recipient without reliance on Confidential Information received hereunder. The contents of this Agreement shall be deemed to be Confidential Information of each Party.

(b) The recipient of Confidential Information shall (i) maintain its confidentiality using efforts and precautions at least as great as those it uses and takes to protect its own confidential information and trade secrets; (ii) use such Confidential Information solely in connection with the discharge of its obligations under this Agreement and (iii) not disclose such Confidential Information to any Person other than those of its agents and representatives who need to know such Confidential Information in order to accomplish the objectives for which it was disclosed. Notwithstanding the foregoing, the recipient of Confidential Information may disclose it to the extent necessary to comply with Applicable Laws or regulations or with an order issued by a court or regulatory body with competent jurisdiction; provided that, in connection with such disclosure, the recipient uses commercially reasonable efforts to obtain confidential treatment or an appropriate protective order, to the extent available, with respect to such Confidential Information.



(c) Within thirty (30) days of the disclosing Party's request, the recipient of Confidential Information shall redeliver to the disclosing Party all Confidential Information provided to the recipient in tangible form, and the recipient shall not retain any copies, extracts or other reproductions, in whole or in part, of such Confidential Information. All notes or other work product prepared by the recipient based upon or incorporating Confidential Information of the disclosing Party shall be destroyed, and such destruction shall be certified in writing to the disclosing Party by an authorized representative of the recipient who supervised such destruction. Notwithstanding the foregoing, in-house legal counsel to the recipient shall be permitted to retain in its files one copy of all Confidential Information to evidence the scope of the Party's obligation of confidentiality.

(d) The obligations under this Section shall remain in effect from the Effective Date through the fifth (5<sup>th</sup>) anniversary of the expiration or termination of the Term of this Agreement.

(e) In addition to any other remedies available in law or equity, the disclosing Party shall be entitled to temporary and permanent injunctive relief in the event of a breach (or threatened breach) under this Section.

(f) The provisions of this Section shall supersede and replace any prior agreements between the Parties relating to Confidential Information covered hereby, including the Mutual Confidential Information Disclosure Agreement, dated as of August 12, 2011.

7.2 **Publicity.** Neither X-spine nor Zimmer shall issue any press release or otherwise publicize the subject matter of this Agreement without the prior written approval of the other Party, except to the extent that such press release or other public announcement is required by law in the opinion of legal counsel to the releasing Party or that the substance thereof has been previously reviewed and released by the other Party or is in the public domain through no fault of the releasing Party. In the event of a required press release or other public announcement, the releasing Party shall provide the other Party with a copy of the proposed text prior to such announcement. The Parties agree that if either Party is required to file this Agreement with any Governmental Authority, the releasing Party shall redact the financial terms of this Agreement to the extent possible in order to keep the financial terms of this Agreement confidential.

## ARTICLE VIII INTELLECTUAL PROPERTY RIGHTS

8.1 **Intellectual Property Representations.** X-spine hereby represents and warrants to, and covenants with, Zimmer as follows:

(a) X-spine owns or holds valid and enforceable rights to use and license (to the extent a license is required), without, to the best of its knowledge, infringing, misappropriating or violating the rights of any Person, any Intellectual Property that is necessary for (i) X-spine to manufacture and sell the Products, (ii) Zimmer to Distribute the Products as contemplated by this Agreement, (iii) Zimmer to make, have made, use, sell, offer to sell, have sold, import/export and otherwise commercialize the Products as contemplated by this Agreement, and (iv) X-spine to grant to Zimmer and its Marketing Partners the Distribution rights and Intellectual Property Rights under this Agreement.

(b) X-spine has not previously granted any license, covenant not to sue or other right that would be inconsistent with or conflict with the grant of the Distribution rights and license rights under this Agreement.

(c) No Person has asserted and there is no threatened or pending claim, suit, proceeding, action or demand (a “**Claim**”) with respect to any of the Products or X-spine IP, which Claim (i) challenges the validity of X-spine’s interest in the X-spine IP, (ii) alleges that the manufacture, use, sale or import/export of the Products or X-spine’s use or practice of the X- spine IP infringes, misappropriates or violates the rights of any Person or (iii) seeks to enjoin or restrain the manufacture, use, sale or import/export of the Products or X-spine’s use or practice of the X-spine IP in any manner that would interfere with the transactions contemplated by this Agreement. X-spine has no knowledge that any Person intends to assert such a Claim.

**8.2 Trademarks.** Zimmer and its Marketing Partners shall have the right to use X- spine’s Trademarks associated with the Products as may be necessary in order to comply with applicable Regulatory Laws. Zimmer and its Marketing Partners shall comply with the reasonable instructions of X-spine as to the form and manner in which such Trademarks shall be used. Other than as expressly provided herein, no Party shall acquire or have any right to use the name or Trademarks of the other Party without its prior written consent. All uses by Zimmer or its Marketing Partners or Affiliates of X-spine’s Trademarks shall inure to the exclusive benefit of X-spine.

**8.3 Axle Products License.**

(a) Zimmer hereby grants to X-spine a non-exclusive, perpetual, worldwide license under Patent No. 8,439,953, and U.S. Patent Publication Nos. 13/0204301, 08/0140125 and 03/0040746 to Distribute the Axle Products pursuant to and subject to the limitations set forth in Section 2.1.

(b) The license granted under this Section 8.3 shall be transferable under a Change of Control. For the sake of clarity, whether the license is transferred or not, the license is granted solely for the Distribution of Axle Products and may not be applied to any other activities (whether by X-spine or a transferee).

(c) The license granted under this Section 8.3 shall include the following royalty payments based on Net Sales (the definition of Net Sales shall apply to X-spine and the Axle Products, mutatis mutandis) of Axle Products received by X-spine:

(i) Except as further provided below, during the Term of this Agreement, the license granted under this Section 8.4 shall be royalty-free.

(ii) Upon X-spine's exercising of its right in Section 3.8(a) to render nonexclusive Zimmer's Distribution rights, X-spine shall make royalty payments to Zimmer in an amount equal to one percent (1%) of Net Sales.

(iii) After the expiration or termination of this Agreement, X-spine shall make royalty payments to Zimmer in an amount equal to two percent (2%) of Net Sales.

(iv) Upon a Change of Control, X-spine or its successor shall make royalty payments to Zimmer in an amount equal to four percent (4%).

In the event that more than one of the previous royalty rates applies, X-spine shall make royalty payments at whichever rate is highest. The obligation to pay royalties under this Section 8.4 shall terminate with respect to any jurisdiction upon the expiration of the last to expire, valid Patent claim under Patent No. 8,439,953 in such jurisdiction. Zimmer shall not directly or indirectly challenge or induce any Third Party to challenge X-spine's activities relating to this license during the Distribution Term.

(d) Multiple royalties shall not be payable in the case of multiple resales of the Products through a distribution chain. Royalties shall be payable in arrears on a quarterly basis in immediately available funds. So long as royalties are due hereunder, X-spine shall provide to Zimmer reports (in written or electronic form) on Net Sales for each calendar quarter and the amount of royalties due thereon. Each report shall be due on the sixtieth (60<sup>th</sup>) day following the last day of the applicable calendar quarter. Royalty payments shall be due and payable on the date each report is due.

(e) X-spine may not grant sublicenses under this Section 8.3. Notwithstanding the foregoing, X-spine may engage Third Parties to manufacture the Axle Products, in whole or in part, for X-spine that are to be sold by X-spine. Zimmer shall have the sole and exclusive right, in its discretion, to institute and prosecute lawsuits against Third Persons for infringement of the rights licensed in this Section 8.3. All sums recovered in any such lawsuits, whether by judgment, settlement, or otherwise, in excess of the amount of reasonable attorneys' fees and other out of pocket expenses of such suit, shall be retained solely by Zimmer. X-spine agrees to reasonably cooperate with Zimmer in the prosecution of any such suit against a Third party and shall execute all papers, testify on all matters, and otherwise cooperate as reasonably necessary for the prosecution of any such lawsuit. For avoidance of doubt, reasonable cooperation shall not include joining as a party to any such lawsuit. Zimmer shall reimburse X-spine for reasonable expenses incurred as a result of such cooperation.

**8.4 Reverse Engineering.** During the Distribution Term, neither Zimmer nor its Affiliates shall "reverse engineer" the Products in order to design or develop any products that are substantially similar to and competitive with the Products.

**8.5 X-spine Intellectual Property.** During the Distribution Term, Zimmer shall not directly or indirectly challenge or induce any Third Party to challenge the validity or enforceability of any present or future Patent controlled by X-spine related to the Products or any patent claim(s) therein, or initiate or participate in any re-examination or other proceeding related to the validity, enforceability or patentability of any claim of any such X-spine Patent before any tribunal or patent office. This Section shall not prohibit Zimmer from responding to a subpoena, process, or discovery requests in any litigation or administrative proceeding provided that the Zimmer give prompt notice to X-spine of the receipt of said subpoena, process or discovery requests.

**8.6 Zimmer Intellectual Property.** Zimmer agrees not to make any infringement claims against X-spine related to (a) the Products during the Distribution Term, and (b) any Products licensed under Article XII, during the term of the IP License for such Product.

## **ARTICLE IX REPRESENTATIONS AND WARRANTIES**

Each Party hereby represents and warrants to, and covenants with, the other Party that:

**(a)** It is a corporation duly organized, validly existing and, if relevant in its jurisdiction of organization, in good standing under the laws of its jurisdiction of organization and has the power and authority to own, lease and operate its assets and to conduct the business now being conducted by it. It has all requisite power and authority to enter into this Agreement and to perform its obligations hereunder.

**(b)** The execution, delivery and performance by it of this Agreement and the consummation by it of the transactions contemplated hereby have been duly authorized and approved by all necessary corporate or equivalent action on its part. This Agreement has been duly executed and delivered by it and constitutes its legal, valid and binding obligation, enforceable against it in accordance with its terms, except as the same may be limited by applicable bankruptcy, insolvency, reorganization, moratorium or other laws relating to or affecting creditors' rights generally and by general equity principles.

**(c)** The execution, delivery and performance by it of this Agreement and the consummation by it of the transactions contemplated hereby do not and will not: (i) violate any Applicable Laws; (ii) conflict with, or result in the breach of any provision of, its certificate of incorporation, bylaws or equivalent organizational documents; (iii) result in the creation of any lien or encumbrance of any nature upon any property being transferred or licensed by it pursuant to this Agreement; or (iv) violate, conflict with, result in the breach or termination of, or constitute a breach under (or event which, with notice, lapse of time or both, would constitute a breach under), any permit, contract or agreement to which it is a party or by which any of its properties or businesses are bound.

**(d)** No authorization, consent or approval of, or notice to or filing with, any Governmental Authority is required for the execution, delivery and performance by it of this Agreement, other than Regulatory Clearances that have not been obtained prior to the Effective Date.

**ARTICLE X**  
**INDEMNIFICATION AND INSURANCE**

**10.1 Indemnification by X-spine.**

(a) X-spine shall indemnify, defend and hold harmless Zimmer and its Affiliates and Marketing Partners and their respective shareholders, directors, officers, employees and agents (the “**Zimmer Indemnified Parties**”) from and against any and all liabilities, damages, losses, penalties, fines, costs and expenses, including reasonable attorneys’ fees (each, an “**Indemnifiable Loss**”), paid or incurred by them in connection with any Claim based upon or arising from: (i) any facts or circumstances that would constitute a breach by X- spine of any of its representations, warranties or obligations under this Agreement; (ii) any bodily injury, death or property damage resulting from any defect in the design, engineering, fabrication, manufacture or label (including the label warnings) of any Product manufactured by or on behalf of X-spine or from the failure of any such Product to conform to the applicable Specifications therefor, unless the Claim arises from Products modified by Zimmer without X- spine consent (a “**Product Liability Claim**”); (iii) any infringement or violation of a Third-Party’s Intellectual Property Rights as a result of the use, manufacture, sale or distribution of any Product; (iv) any violation by X-spine of Applicable Laws; or (v) any negligent or more culpable act or omission of X-spine or its Affiliates or subcontractors or any of their respective employees or agents relating to the activities subject to this Agreement.

(b) Zimmer shall give X-spine prompt written notice of any Claim with respect to which X-spine’s indemnification obligations may apply, but any delay or failure of such notice shall not excuse X-spine’s indemnification obligations except to the extent that X- spine’s legal position is prejudiced thereby. X-spine shall have the right to assume and control the defense and settlement of any such Claim; except that Zimmer shall have the right to assume and control, at X-spine’s expense, the defense and settlement of any such Claim if: (i) such Claim relates to Indemnifiable Losses under Section 10.1(a)(iii), (ii) Zimmer reasonably determines that there is a conflict of interest between Zimmer and X-spine with respect to such Claim; (iii) X-spine fails to employ counsel reasonably satisfactory to Zimmer to represent Zimmer within a reasonable time after X-spine’s receipt of notice of the Claim or (iv) in the reasonable opinion of counsel to Zimmer, the Claim could result in Zimmer becoming subject to injunctive or other non-monetary relief that could have a material adverse effect on Zimmer’s ongoing business. The Party not controlling the defense shall have the right to participate in the Claim at its own expense, but in any event shall cooperate with the controlling Party in the investigation and defense of the Claim.

(c) If X-spine is entitled to, and does, assume and control the defense and settlement of any Claim with respect to which its indemnification obligations apply, then X-spine shall not settle such Claim without Zimmer’s prior written consent (which consent shall not be unreasonably withheld or delayed), unless (i) the sole relief provided in such settlement is monetary in nature and shall be paid in full by X-spine and (ii) such settlement does not include any finding or admission of a violation by Zimmer of any Applicable Laws or Third Party’s rights. Whenever Zimmer assumes and controls the defense and settlement of a Claim with respect to which X-spine’s indemnification obligations apply, X-spine shall not be liable for any settlement thereof effected by Zimmer unless Zimmer shall have obtained X-spine’s prior written consent to the proposed settlement (which consent shall not be unreasonably withheld or delayed).

(d) X-spine shall maintain, from the Effective Date through the first anniversary of the expiration date of the Term, a policy of insurance for Product Liability Claims. Such policy shall (i) have a per occurrence limit of at least \$1,000,000 and an annual aggregate limit of at least \$5,000,000, and (ii) provide for at least thirty (30) days' advance written notice to Zimmer of cancellation or material change in coverage. Promptly following execution of this Agreement and annually thereafter, X-spine shall provide to Zimmer evidence of such coverage and a certificate of insurance indicating that Zimmer is an additional insured. If X-spine breaches its obligation to maintain insurance, (x) Zimmer shall have the right to obtain coverage as required on X-spine's behalf and at X-spine's expense, (y) Zimmer shall have the right to set off the cost of such coverage against any payment owed to X-spine and (z) X-spine shall indemnify Zimmer from and against all costs and expenses associated with obtaining such coverage.

## **10.2 Indemnification by Zimmer.**

(a) Zimmer shall indemnify, defend and hold harmless X-spine and its Affiliates and their respective shareholders, directors, officers, employees and agents from and against any and all Indemnifiable Losses paid or incurred by them in connection with any Claim based upon or arising from: (i) any facts or circumstances that would constitute a breach by Zimmer of any of its representations, warranties or obligations under this Agreement; (ii) any violation by Zimmer of Applicable Laws; (iii) any negligent or more culpable act or omission of Zimmer or its Affiliates or Marketing Partners or any of their respective employees or agents relating to the activities subject to this Agreement; (iv) any claims arising from Zimmer private label branding, including claims of trademark infringement; or (v) claims arising from modifications to Products performed by Zimmer without written consent from X-spine.

(b) X-spine shall give Zimmer prompt written notice of any Claim with respect to which Zimmer's indemnification obligations may apply, but any delay or failure of such notice shall not excuse Zimmer's indemnification obligations except to the extent that Zimmer's legal position is prejudiced thereby. Zimmer shall have the right to assume and control the defense and settlement of any such Claim; except that X-spine shall have the right to assume and control, at Zimmer's expense, the defense and settlement of any such Claim if: (i) X-spine reasonably determines that there is a conflict of interest between Zimmer and X-spine with respect to such Claim; (ii) Zimmer fails to employ counsel reasonably satisfactory to X-spine to represent X-spine within a reasonable time after Zimmer's receipt of notice of the Claim or (iii) in the reasonable opinion of counsel to X-spine, the Claim could result in X-spine becoming subject to injunctive or other non-monetary relief that could have a material adverse effect on X-spine's ongoing business. The Party not controlling the defense shall have the right to participate in the Claim at its own expense, but in any event shall cooperate with the controlling Party in the investigation and defense of the Claim.

(c) If Zimmer is entitled to, and does, assume and control the defense and settlement of any Claim with respect to which its indemnification obligations apply, then Zimmer shall not settle such Claim without X-spine's prior written consent (which consent shall not be unreasonably withheld or delayed), unless (i) the sole relief provided in such settlement is monetary in nature and shall be paid in full by Zimmer and (ii) such settlement does not include any finding or admission of a violation by X-spine of any Applicable Laws or Third Party's rights. Whenever X-spine assumes and controls the defense and settlement of a Claim with respect to which Zimmer's indemnification obligations apply, Zimmer shall not be liable for any settlement thereof effected by X-spine unless X-spine shall have obtained Zimmer's prior written consent to the proposed settlement (which consent shall not be unreasonably withheld or delayed).

**10.3 Combined Obligations.** To the extent that Zimmer and X-spine have indemnification obligations to one another in connection with a single Claim, Zimmer and X-spine shall contribute to the aggregate damages arising from such Claim in such proportion as is appropriate to reflect their relative responsibilities for such damages, as well as any other relevant equitable considerations. The amount paid or payable by Zimmer or X-spine for purposes of apportioning the aggregate damages shall be deemed to include all reasonable legal fees and expenses incurred by such Party in connection with investigating, preparing for or defending against such Claim.

## ARTICLE XI TERM AND TERMINATION

**11.1 Term.** Unless earlier terminated in accordance with Section 11.2, the initial term of this Agreement (the "**Initial Term**") shall begin on the Effective Date and shall continue for ten (10) years. The Initial Term shall be automatically extended for renewal terms of two (2) years (each, a "**Renewal Term**") unless either Party notifies the other Party in writing that it desires not to renew the Initial Term or Renewal Term at least six (6) months prior to the expiration of such Initial Term or Renewal Term, as applicable.

**11.2 Termination.** This Agreement may be terminated as follows:

(a) If a Party is dissolved under applicable corporate law or becomes subject to an Insolvency Event, the other Party may terminate this Agreement by delivering written notice thereof.

(b) If either Party believes the other is in material breach of this Agreement, it may give notice of such breach to the other Party, and the breaching Party shall have thirty (30) days in which to remedy the breach. If the breach is not remedied within such thirty (30) day period, the non-breaching Party may terminate this Agreement immediately upon delivery to the breaching Party of a written notice of termination. The non-breaching Party's right to terminate this Agreement shall not be construed as an exclusive remedy.

(c) Either Party may terminate this Agreement in accordance with the terms of Section 14.2.

(d) Zimmer may terminate this Agreement at its sole discretion immediately upon notice to X-spine under the following circumstances: (i) if X-spine is subject to a Change of Control involving a Zimmer Competitor; or (ii) in accordance with the terms of Section 6.10(f).

**11.3 Order Fulfillment; Depletion of Inventory.** Upon the expiration or termination of this Agreement for any reason other than pursuant to Section 11.2(b) as a result of a material breach by Zimmer, (i) at Zimmer's written request, X-spine shall continue to manufacture and deliver all Products that are the subject of Firm Orders submitted by Zimmer prior to the expiration or termination of this Agreement, and (ii) Zimmer shall be permitted to sell to depletion any remaining inventory of the Products, including any Products delivered pursuant to clause (i) above.

**11.4 Survival.** Termination or expiration of this Agreement for any reason shall be without prejudice to any rights that shall have accrued to the benefit of any Party prior to such termination or expiration. The following Articles and Sections shall survive the expiration or termination of this Agreement: Articles VII, IX, X, and XI and Sections 4.4, 5.4, 6.3, 6.6, 6.7, 6.8, 6.10, 8.1, 8.4, 14.4 and 14.9. For the avoidance of doubt, in the event Zimmer exercises its Option to License, the IP License shall be perpetual and Article XII shall survive indefinitely.

## **ARTICLE XII OPTION TO LICENSE**

**12.1 Option.** Upon the occurrence of a License Trigger Event, Zimmer shall have the option (the "**Option to License**") to acquire from X-spine a non-exclusive, perpetual, irrevocable, worldwide, royalty-bearing license under the X-spine IP to make, have made, use, sell, offer to sell, have sold, import/export and otherwise commercialize any of the Products throughout the Territory for all uses and applications in the Field (the "**IP License**"). The IP License shall be sublicenseable to Zimmer's Marketing Partners, Affiliates, and Third Party manufacturers as is necessary or useful to commercialize the Products.

**12.2 Royalties.** In the event Zimmer exercises its Option to License, Zimmer shall make royalty payments to X-spine beginning on the IP License Effective Date (as defined below) in an amount equal to two percent (2%) of Net Sales of all Products included in the IP License except for Axle Products and one percent (1%) of Net Sales of Axle Products, in each case to the extent received by Zimmer and with the following limitations:

(a) In the event Zimmer reasonably determines that it needs a license or other access to Intellectual Property Rights of a Third Party in order to make, have made, use, sell, offer to sell, have sold, import/export and otherwise commercialize any Product, any consideration paid to such Third Party by Zimmer in order to obtain such license or access (including upfront fees, royalties and other forms of consideration) shall be credited against any royalty payments due hereunder. Nothing herein shall be construed to limit Zimmer's indemnification rights under Section 10.1.

(b) Multiple royalties shall not be payable in the case of multiple resales of a Product through a distribution chain. Royalties shall be payable in arrears on a quarterly basis in immediately available funds. So long as royalties are due hereunder, Zimmer shall provide to X-spine reports (in written or electronic form) on Net Sales for each calendar quarter and the amount of royalties due thereon. Each report shall be due on the sixtieth (60<sup>th</sup>) day following the last day of the applicable calendar quarter. Royalty payments shall be due and payable on the date each report is due.



(c) The obligation to pay royalties under this Section 12.2 shall terminate with respect to each Product in each jurisdiction upon the expiration of the last to expire valid Patent claim covering such Product in such jurisdiction.

**12.3 IP License Effective Date.** In order to exercise its Option to License pursuant to Section 12.1 above, Zimmer shall provide ten (10) days prior written notice thereof to X-spine. The effective date of the IP License (the “**IP License Effective Date**”) shall be the tenth (10<sup>th</sup>) day after such notice is delivered to X-spine or a later effective date if so specified by Zimmer in such notice. Upon the valid exercise of such Option to License, effective as of the IP License Effective Date, X-spine hereby grants to Zimmer the IP License subject to the terms and conditions of this Agreement.

**12.4 Information Transfer.** As soon as practicable after the IP License Effective Date, and in no event more than thirty (30) days thereafter, X-spine shall disclose in writing to Zimmer, without charge, all Proprietary Information and other information known to X-spine that is necessary or useful in connection with the manufacture and sale of the Products, including design, engineering and manufacturing drawings; supplier and vendor records; Specifications; testing data; protocols; operating procedures; work instructions; regulatory filings; Regulatory Clearances; risk analyses; design history files; project history files; and device master records.

**12.5 Transition Period.** As soon as practicable after the IP License Effective Date, Zimmer shall begin the process of applying for Regulatory Clearances for the licensed Products with Zimmer (or its designee) as the manufacturer of record. X-spine shall provide reasonable assistance as requested by Zimmer in connection with such Regulatory Clearances. At Zimmer’s request, X-spine shall continue to manufacture and deliver each Product to Zimmer in accordance with the terms of this Agreement until the expiration of the Transition Period for such Product.

**12.6 Effect on the Agreement.** Upon Zimmer’s receipt of Regulatory Clearance for any Product in any jurisdiction, the Parties shall have no further rights or obligations under the following provisions with respect to such Product in such jurisdiction: Sections 3.8, 6.2 and 6.3(a). Upon the expiration of the Transition Period for any Product, the following provisions shall terminate with respect to such Product and thereafter the Parties shall have no further rights or obligations under such provisions with respect to such Product: Articles II, III, IV, V and XII, and Sections 6.4-6.8 and 8.2-8.3. Notwithstanding the foregoing, nothing herein shall affect any rights, obligations, claims, liabilities or remedies of any Party accruing or arising under any provision of this Agreement prior to the termination of such provision under this Section 12.6.

### **ARTICLE XIII RIGHT OF FIRST REFUSAL**

**13.1 Offer.** In the event that X-spine receives a bona fide offer from one or more Third Parties (a “**Third-Party Offer**”) during the Term of the Agreement, that would result in (a) a Change of Control of X-spine or (b) the sale, license or other divestment of its rights in and to the Products or any of the X-spine IP (a “**Covered Transaction**”), and X-spine desires to accept such Third-Party Offer, X-spine shall provide prompt written notice of such Third-Party Offer (a “**Transaction Notice**”) to Zimmer and shall offer to consummate the Covered Transaction with Zimmer on substantially equivalent terms and conditions. The Transaction Notice shall describe in detail the terms of the Covered Transaction and shall be accompanied by a copy of the Third-Party Offer. If the consideration to be provided by the Third Party includes any non-cash component, Zimmer shall have the right to provide cash in lieu thereof in an amount equal to the fair value of such non-cash component.

**13.2 Review and Negotiation Periods.** Within twelve (12) Business Days after receipt by Zimmer of a Transaction Notice (the “**Review Period**”), Zimmer may elect by written notice to X-spine to consummate the Covered Transaction on substantially equivalent terms and conditions (an “**Election**”). The Parties shall have one hundred twenty (120) days from the Review Period to negotiate and sign a definitive agreement (the “**Negotiation Period**”). During the Negotiation Period, X-spine shall provide Zimmer with any relevant information that Zimmer reasonably requests and Zimmer shall notify X-spine if it is no longer interested in pursuing the transaction.

**13.3 Forfeiture of Right.**

**(a) No Election.** If Zimmer does not make an Election within the Review Period, then the right of first refusal shall be forfeited, solely with respect to the Covered Transaction that triggered the Review Period, for one (1) year and X-spine shall be free to consummate the Covered Transaction with the Third Party at a price and on terms that are no more favorable to the Third Party than the price and terms set forth in the Third-Party Offer. If X-spine does not consummate the Covered Transaction with the Third Party within one year after the end of the Review Period (or, if earlier, within one (1) year of the date Zimmer notifies X-spine in writing of its decision not to negotiate a Covered Transaction), then Zimmer’s rights under this Article XIII shall apply again with respect to such transaction and to any subsequent Covered Transaction.

**(b) Failed Negotiation Period.** If Zimmer does make an Election but the Parties are unable to sign a definitive agreement within the Negotiation Period (and X-spine shall have negotiated and responded to information requests in good faith throughout the Negotiation Period), then the right of first refusal shall be forfeited for one (1) year and X-spine shall be free to consummate any Covered Transaction with any Third Party. If X-spine does not consummate a Covered Transaction within one year after the end of the Negotiation Period, then Zimmer’s rights under this Article XIII shall apply again with respect to any subsequent Covered Transaction.

**ARTICLE XIV  
MISCELLANEOUS**

**14.1 Agency.** The Parties are independent contractors. Neither Party is, nor shall be deemed to be, an employee, agent, partner or legal representative of the other Party for any purpose. Neither Party shall have the right, power or authority to enter into any contracts in the name of, or on behalf of, the other Party, nor shall either Party have the right, power or authority to pledge the credit of the other Party in any way or hold itself out as having the authority to do so.

**14.2 Force Majeure.** If the performance of any obligation under this Agreement is prevented, restricted or interfered with by reason of war, revolution, civil commotion, acts of terrorism, blockade, embargo, labor unrest or strikes, government acts, natural disasters, acts of God or similar events which are beyond the reasonable control of the Party affected, then the Party so affected shall, upon giving prior written notice to the other Party, be excused from such performance to the extent of such prevention, restriction, or interference, provided that the Party so affected shall use commercially reasonable efforts to avoid or remove such causes of nonperformance, and shall continue performance hereunder with reasonable dispatch whenever such causes are removed. If such conditions inhibiting complete performance shall continue in excess of ninety (90) days, then the Party that is not affected by the force majeure event shall have the option, by delivery of written notice of termination to the affected Party, to terminate this Agreement.

**14.3 Entire Agreement; Amendments.** This Agreement (together with all Exhibits and other attachments referred to herein) constitutes the entire agreement between the Parties hereto concerning its subject matter and supersedes all previous negotiations, agreements and commitments with respect thereto. This Agreement shall not be released, discharged, amended or modified in any manner except by a written instrument signed by duly authorized officers or representatives of each of the Parties hereto.

**14.4 Governing Law; Jurisdiction.**

(a) This Agreement shall be governed by and interpreted in accordance with the substantive laws of the State of Ohio, without regard to its choice of law rules.

(b) The Parties hereto agree that any suit, action or proceeding seeking to enforce any provision of, or based upon any matter arising out of or in connection with, this Agreement or the transactions contemplated hereby shall be brought (i) if by X-spine, in the federal courts of the Southern District of Ohio or the state courts of Montgomery County, Ohio, as applicable, and (ii) if by Zimmer, in the federal courts of the District of Minnesota or the state courts of Hennepin County, Minnesota, as applicable. Each of the Parties hereby irrevocably consents to the jurisdiction of such courts (and of the appropriate appellate courts therefrom) in any such suit, action or proceeding and irrevocably waives, to the fullest extent permitted by law, any objection that it may now or hereafter have to the laying of the venue of any such suit, action or proceeding in any such court or that any such suit, action or proceeding brought in any such court has been brought in an inconvenient forum. Process in any such suit, action or proceeding may be served on any Party anywhere in the world, whether within or without the jurisdiction of any such court.

**14.5 Partial Illegality.** If any provision of this Agreement, or the application thereof to any Party or circumstances, shall be declared void, illegal or unenforceable, the remainder of this Agreement shall be valid and enforceable to the extent permitted by Applicable Laws. In such event, the Parties shall use their best efforts to replace the invalid or unenforceable provision by a provision that, to the extent permitted by Applicable Laws, achieves the purposes intended under the invalid or unenforceable provision. Any deviation by either Party from the terms and provisions of this Agreement in order to comply with Applicable Laws shall not be considered a breach of this Agreement.

**14.6 Waiver of Compliance.** No provision of this Agreement shall be waived by any act, omission or knowledge of a Party or its agents or employees, except by an instrument in writing expressly waiving such provision and signed by a duly authorized officer of the waiving Party, which waiver shall be effective only with respect to the specific obligation and instance described therein.

**14.7 Notices.** Except as otherwise provided herein, all notices and other communications in connection with this Agreement shall be in writing and shall be sent to the respective Parties at the following addresses, or to such other addresses as may be designated by the Parties in writing from time to time in accordance with this Section, by registered or certified mail, postage prepaid, or by express courier service, service fee prepaid, or by facsimile in accordance with this Section.

To X-spine: X-spine Systems, Inc.  
452 Alexandersville Rd  
Miamisburg, OH 45342  
Attn: President  
Fax No.: 937-847-8410

To Zimmer: Zimmer Spine, Inc.  
7375 Bush Lake Road  
Edina, MN 55439  
Attn: President

With a copy to: Zimmer Spine, Inc.  
7375 Bush Lake Road  
Edina, MN 55439  
Attn: Legal Department

All notices shall be deemed given and received (i) if delivered by hand, immediately, (ii) if sent by mail, three (3) Business Days after posting, (iii) if delivered by express courier service, the next Business Day in the jurisdiction of the recipient or (iv) if sent by fax, at the time shown in the confirmed electronic receipt, or on the first Business Day thereafter if the notice is not sent on a Business Day.

**14.8 Counterparts and Facsimile/Electronic.** This Agreement may be executed in counterparts, each of which shall be deemed to be an original and all of which together shall be deemed to be one and the same instrument. A manual signature on this Agreement or any document executed in connection with this Agreement, the image of which is transmitted electronically (including facsimile or e-mail), shall constitute an original signature for purposes of this Agreement.

**14.9 Limitation on Liability.** Except with respect to the indemnification and confidentiality obligations, neither Party shall be liable to the other for indirect, incidental, consequential, punitive or special damages, including lost profits, arising from or relating to any breach of this Agreement, regardless of any notice of the possibility of such damages.

**14.10 Offset Rights.** To the extent that X-spine owes any payment obligations to Zimmer under this Agreement, Zimmer shall be entitled to withhold and offset such obligations against payments otherwise due to X-spine by Zimmer under this Agreement.

**14.11 Further Actions.** Each Party agrees, subsequent to the execution and delivery of this Agreement and without any additional consideration, to execute, acknowledge and deliver such further documents and instruments, and to do all such other acts, as may be necessary or appropriate in order to carry out the purposes and intent of this Agreement.

**14.12 Assignment.** Neither Party shall have the right to assign any of its rights or obligations under this Agreement without the prior written consent of the non-assigning Party, except that (a) Zimmer may assign its rights and obligations under this Agreement to an Affiliate without X-spine's approval and (b) X-spine may assign its rights and obligations under this Agreement upon a Change of Control to an acquiring party that is not a Zimmer Competitor, so long as such acquiring party is reasonably qualified to undertake all of X-spine's obligations and agrees in writing to be bound by the terms of this Agreement. If and to the extent that a Party assigns any of its rights and/or obligations hereunder in accordance with this Section 14.12, then this Agreement shall be binding upon the assignee to the same extent as if it were a Party hereto, and each reference herein to the name of the assigning Party shall be deemed to include the assignee. Any assignment not in accordance with this Section 14.12 shall be void.

**14.13 Jointly Prepared.** This Agreement has been prepared jointly and shall not be strictly construed against either Party.

**14.14 Third-Party Rights.** Except as otherwise expressly provided herein, this Agreement is not intended to confer any benefits upon, or create any rights in favor of any Person other than the Parties.

**14.15 Expenses.** Except as otherwise expressly provided in this Agreement, each Party shall be responsible for its own expenses incurred in connection with this Agreement and the transactions contemplated hereby.

*[SIGNATURES ON FOLLOWING PAGE]*

IN WITNESS WHEREOF, each Party has caused this Agreement to be executed by its respective duly authorized representative as of the Effective Date.

**X-SPINE SYSTEMS, INC.**

By: /s/ David Kirschman

Name: David Kirschman

Title: CEO

**ZIMMER SPINE, INC.**

By: /s/ Steven J. Healy

Name: Steven J. Healy

Title: President

*[Signature page to Zimmer/X-spine Distribution Agreement]*

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BACTERIN INTERNATIONAL HOLDINGS, INC.

6.00% CONVERTIBLE SENIOR NOTES DUE 2021

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INDENTURE

DATED AS OF JULY 31, 2015

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WILMINGTON TRUST, NATIONAL ASSOCIATION

AS TRUSTEE

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**CROSS REFERENCE TABLE\***

| Trust<br>Indenture<br>Act<br>Section | Indenture<br>Section |
|--------------------------------------|----------------------|
| 310 (a)(1)                           | 7.10                 |
| (a)(2)                               | 7.03; 7.10           |
| (a)(3)                               | N.A.                 |
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| (b)                                  | 7.08; 7.10           |
| (c)                                  | N.A.                 |
| 311 (a)                              | 7.12                 |
| (b)                                  | 7.12                 |
| (c)                                  | N.A.                 |
| 312 (a)                              | 2.08                 |
| (b)                                  | 12.03                |
| (c)                                  | 12.03                |
| 313 (a)                              | 7.06                 |
| (b)(1)                               | N.A.                 |
| (b)(2)                               | 7.06                 |
| (c)                                  | 7.06                 |
| (d)                                  | 7.06                 |
| 314 (a)                              | 4.03                 |
| (b)                                  | N.A.                 |
| (c)(1)                               | 12.04                |
| (c)(2)                               | 12.04                |
| (c)(3)                               | N.A.                 |
| (d)                                  | N.A.                 |
| (e)                                  | 12.05                |
| (f)                                  | N.A.                 |
| 315 (a)                              | 7.01(b)              |
| (b)                                  | 7.05                 |
| (c)                                  | 7.01(a)              |
| (d)                                  | 7.01(c)              |
| (e)                                  | 6.12                 |
| 316 (a) (last sentence)              | 2.14(b)              |
| (a)(1)(A)                            | 6.06                 |
| (a)(1)(B)                            | 6.05                 |
| (a)(2)                               | N.A.                 |
| (b)                                  | 6.08                 |
| (c)                                  | 1.05                 |
| 317 (a)(1)                           | 6.09                 |
| (a)(2)                               | 6.10                 |
| (b)                                  | 2.07                 |
| 318 (a)                              | 12.01                |

N.A. means not applicable.

\* This Cross Reference Table is not part of the Indenture.



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INDENTURE, dated as of July 31, 2015, between Bacterin International Holdings, Inc., a Delaware corporation (the “**Company**”), and Wilmington Trust, National Association, a national banking association, as trustee (the “**Trustee**”).

Each party agrees as follows for the benefit of the other party and for the equal and ratable benefit of the Holders (as defined below) of the Company’s 6.00% Convertible Senior Notes due 2021:

## ARTICLE 1

### DEFINITIONS AND INCORPORATION BY REFERENCE

Section 1.01 *Definitions.*

“**Additional Interest**” has the meaning ascribed to it in the Registration Rights Agreement.

“**Affiliate**” of any specified Person means any other Person, directly or indirectly, controlling or controlled by or under direct or indirect common control with such specified Person. For the purposes of this definition, “**control**,” when used with respect to any specified Person, means the power to direct or cause the direction of the management and policies of such Person, directly or indirectly, whether through the ownership of voting securities, by contract or otherwise; and the terms “**controlling**” and “**controlled**” have meanings correlative to the foregoing.

“**Applicable Procedures**” means, with respect to any transfer or transaction involving a Global Note or any beneficial interest therein, the rules and procedures of the Depository for such Note, in each case to the extent applicable to such transfer or transaction and as in effect from time to time.

“**Authorized Denomination**” means, with respect to a Note, a principal amount thereof equal to \$1,000 or any integral multiple of \$1,000 in excess thereof.

“**Bankruptcy Law**” means Title 11, United States Code, or any similar U.S. federal, state or non-U.S. law for the relief of debtors.

“**Board of Directors**” means the board of directors of the Company or a committee of such board duly authorized to act for it.

“**Board Resolution**” means a written copy of one or more resolutions certified by the Secretary or an Assistant Secretary of the Company to have been duly adopted by the Board of Directors and to be in full force and effect on the date of such certification, and delivered to the Trustee.

“**Business Day**” means any day other than a Saturday, a Sunday or a day on which the Federal Reserve Bank of New York is authorized or required by law or executive order to close or be closed.

“**Capital Stock**” means, for any Person, any and all shares, interests, rights to purchase, warrants, options, participations or other equivalents of, or interests in (however designated), the equity of such Person, but excluding any debt securities convertible into such equity.

“**Close of Business**” means 5:00 p.m., New York City time.

“**Common Stock**” means the shares of the common stock of the Company, \$0.000001 par value per share.

“**Company**” means the party named as such in the first paragraph of this Indenture until a successor or assignee replaces it pursuant to the applicable provisions hereof and, thereafter, means the successor or assignee.

“**Company Order**” means a written request or order signed in the name of the Company by any Officer.

“**Conversion Price**” means, at any time, (i) \$1,000 *divided by* (ii) the Conversion Rate in effect at such time.

“**Conversion Rate**” means, initially, 257.5163 shares of Common Stock per \$1,000 principal amount of Notes, subject to adjustment as provided herein.

“**Corporate Trust Office**” means the corporate trust office of the Trustee at which the trust created by this Indenture will be administered, which office, as of the Issue Date, is located at Wilmington Trust, National Association, Global Corporate Capital Markets, 50 South Sixth Street, Suite 1290, Minneapolis, MN 55402, Attention: Bacterin International Holdings, Inc. Account Manager, and may later be located at such other address as the Trustee, upon delivering notice to the Holders, the Paying Agent, the Conversion Agent, the Registrar and the Company, designates.

“**Custodian**” means any receiver, trustee, assignee, liquidator, custodian or similar official under any Bankruptcy Law.

“**Default**” means any event which is (or after notice, passage of time or both would be) an Event of Default.

“**Depository**” means DTC; *provided* that the Company may at any time, upon delivering notice to the Holders, the Trustee, the Registrar, the Paying Agent and the Conversion Agent, appoint a successor Depository.

“**DTC**” means The Depository Trust Company.

“**Exchange Act**” means the Securities Exchange Act of 1934, as amended.

“**Fundamental Change**” means an event that will be deemed to occur if any of the following occurs:

(a) a “person” or “group” within the meaning of Section 13(d) of the Exchange Act, other than the Company or the Subsidiaries, has become the direct or indirect “beneficial owner” (as defined below) of shares of the Company’s common equity representing more than 50% of the voting power of the Company’s common equity;

(b) the consummation of:

(i) any sale, lease or other transfer in one transaction or a series of transactions of all or substantially all of the consolidated assets of the Company and the Subsidiaries to any person; or

(ii) any transaction or series of related transactions in connection with which (whether by means of exchange, liquidation, consolidation, merger, combination, reclassification, recapitalization, acquisition or otherwise) all of the Common Stock is exchanged for, converted into, acquired for, or constitutes solely the right to receive, other securities, other property, assets or cash, but excluding any merger, consolidation, share exchange or acquisition of the Company with or by another Person pursuant to which the Persons that “beneficially owned” (as defined below), directly or indirectly, the shares of the Company’s Voting Stock immediately prior to such transaction beneficially own, directly or indirectly, immediately after such transaction, shares of the surviving, continuing or acquiring corporation’s Voting Stock representing more than 50% of the total outstanding voting power of all outstanding classes of Voting Stock of the surviving, continuing or acquiring corporation in substantially the same proportions vis-à-vis each other as immediately prior to such transaction; or

(c) the Company’s stockholders approve any plan or proposal for the liquidation or dissolution of the Company.

A transaction or event described in clause (a) or (b) above will not constitute a Fundamental Change, however, if at least 90% of the consideration received or to be received by the holders of the Common Stock, excluding cash payments for fractional shares or dissenters rights, in connection with the transaction or transactions, consists of shares of common stock traded on any of the NASDAQ Capital Market, the NASDAQ Global Market, the NASDAQ Global Select Market, the NYSE MKT LLC or the New York Stock Exchange (or any of their respective successors) or which will be so traded or quoted when issued or exchanged in connection with such transaction or event and as a result of such transaction or event, the Notes become convertible or exchangeable solely into such consideration (excluding cash payable in lieu of any fractional share) in accordance with Section 10.08 hereof.

For the purposes of this definition of “Fundamental Change,” whether a person is a “**beneficial owner**” or whether shares are “**beneficially owned**” will be determined in accordance with Rule 13d-3 under the Exchange Act.

“**Global Note**” means a Note represented by a certificate substantially in the form set forth in Exhibit A that is duly executed by the Company and authenticated by the Trustee, as provided herein, and deposited with the Trustee, as custodian for the Depository.

“**Global Note Legend**” means the legend identified as such in Exhibit A hereto.

“**Holder**” means a Person in whose name a Note is registered in the Register.

“**Indenture**” means this Indenture, as amended or supplemented from time to time in accordance with the terms of this Indenture.

“**Indirect Participant**” means a Person who holds a beneficial interest in a Global Note through a Participant.

“**Initial Purchaser**” means Leerink Partners LLC.

“**Institutional Accredited Investor Global Note**” means a Global Note that is an Institutional Accredited Investor Note.

“**Institutional Accredited Investor Note**” means (i) each Note that, at the time of its original issuance, was not a Rule 144A Note, and each Note issued in exchange therefor or substitution thereof; and (ii) each Institutional Accredited Investor Note issued pursuant to Section 2.10(e)(i) in exchange for, or upon the transfer of, another Note, and each Note issued in exchange therefor or substitution thereof; *provided, however*, that a Note will cease to be an Institutional Accredited Investor Note at such time, if any, as such Note is transferred to, or exchanged for, a Note that does not bear the Restricted Note Legend or that is a Rule 144A Note.

“**Institutional Accredited Investor Physical Note**” means a Physical Note that is an Institutional Accredited Investor Note.

“**Issue Date**” means July 31, 2015.

“**Last Reported Sale Price**” of the Common Stock on any date means the closing sale or trading price (or, if no closing sale or trading price is reported, the average of the last bid and last ask prices or, if more than one in either case, the average of the average last bid and the average last ask prices) per share on such date as reported in composite transactions for the principal U.S. national or regional securities exchange on which the Common Stock is traded. If the Common Stock is not listed for trading on a U.S. national or regional securities exchange on such date, the “Last Reported Sale Price” of the Common Stock will be the last quoted bid price per share for the Common Stock in the over-the-counter market on such date as reported by OTC Markets Group Inc. or a similar organization. If the Common Stock is not so quoted, the “Last Reported Sale Price” will be the average of the mid-point of the last bid and last ask prices per share for the Common Stock on the relevant date from each of at least three (3) nationally recognized independent investment banking firms selected by the Company for this purpose. The “Last Reported Sale Price” will be determined without regard to after-hours trading or any other trading outside of regular trading session hours.

“**Market Disruption Event**” means the occurrence or existence during the one-half hour period ending on the scheduled close of trading on the principal U.S. national or regional securities exchange or other market on which the Common Stock is listed for trading or trades of any material suspension or limitation imposed on trading (by reason of movements in price exceeding limits permitted by the stock exchange or otherwise) in the Common Stock or in any options contracts or futures contracts relating to the Common Stock.



“**Non-Affiliate Legend**” means the legend identified as such in Exhibit A hereto.

“**Notes**” means the Company’s 6.00% Convertible Senior Notes due 2021 issued under this Indenture.

“**Officer**” means the Chairman of the Board, the Vice Chairman, the Chief Executive Officer, the President, the Chief Financial Officer, any Executive Vice President, any Senior Vice President, any Vice President, the Treasurer or the Secretary of the Company.

“**Officers’ Certificate**” means a written certificate containing the information specified in Sections 12.04 and 12.05 hereof, signed in the name of the Company by any two Officers, and delivered to the Trustee; *provided*, that, if such certificate is given pursuant to Section 4.05 hereof, (i) one of the Officers signing such certificate must be the Chief Financial Officer of the Company; and (ii) such certificate need not contain the information specified in Sections 12.04 and 12.05 hereof.

“**Open of Business**” means 9:00 a.m., New York City time.

“**Opinion of Counsel**” means a written opinion containing the information specified in Sections 12.04 and 12.05 hereof, from legal counsel satisfactory to the Trustee. The counsel may be an employee of, or counsel to, the Company who is satisfactory to the Trustee.

“**Option**” means the Initial Purchaser’s option to purchase up to nine million seven hundred fifty thousand dollars (\$9,750,000) aggregate principal amount of additional Notes as provided for in the Rule 144A Purchase Agreement.

“**Participant**” means, with respect to the Depository a Person who has an account with the Depository.

“**Person**” means any individual, corporation, limited liability company, partnership, joint venture, association, joint-stock company, trust, unincorporated organization, or government or any agency or political subdivision thereof.

“**Physical Note**” means a Note (other than a Global Note) that is represented by a certificate substantially in the form set forth in Exhibit A that is duly executed by the Company and authenticated by the Trustee as provided herein and registered in the name of the Holder of such Note.

“**Preliminary Offering Memorandum**” means the Preliminary Offering Memorandum relating to the offering of the Notes dated July 13, 2015.

“**Pricing Term Sheet**” means the pricing term sheet relating to the Preliminary Offering Memorandum and distributed in connection with the pricing of the initial offering of Notes.

“**Registration Rights Agreement**” means the Registration Rights Agreement, dated as of the date hereof, among the Company, the Initial Purchaser and the other parties named therein.

“**Restricted Note Legend**” means the legend identified as such set forth in Exhibit A hereto, or any other similar legend indicating the restricted status of the Notes under the Securities Act.

“**Restricted Stock Legend**” means a legend in the form set forth in Exhibit B hereto or any other similar legend indicating the restricted status of the Common Stock under the Securities Act.

“**Rule 144**” means Rule 144 under the Securities Act (or any successor provision), as it may be amended from time to time.

“**Rule 144A**” means Rule 144A under the Securities Act (or any successor provision), as it may be amended from time to time.

“**Rule 144A Global Note**” means a Global Note that is a Rule 144A Note.

“**Rule 144A Note**” means (i) each Note that, on the original issue date thereof, was issued and sold in reliance upon Rule 144A, and each Note issued in exchange therefor or substitution thereof; and (ii) each Rule 144A Note issued, pursuant to Section 2.10(e)(ii), in exchange for, or upon the transfer of, another Note, and each Note issued in exchange therefor or substitution thereof; *provided, however*, that a Note will cease to be a Rule 144A Note at such time, if any, as such Note is transferred to, or exchanged for, a Note that does not bear the Restricted Note Legend or that is an Institutional Accredited Investor Note.

“**Rule 144A Physical Note**” means a Physical Note that is a Rule 144A Note.

“**Rule 144A Purchase Agreement**” means that certain Purchase Agreement, dated as of July 27, 2015, between the Company and the Initial Purchaser.

“**SEC**” means the Securities and Exchange Commission.

“**Securities Act**” means the Securities Act of 1933, as amended.

“**Significant Subsidiary**” means any Subsidiary that is a “significant subsidiary” of the Company within the meaning of Rule 1-02(w) of Regulation S-X promulgated under the Exchange Act.

“**Stock Price**” means, for any Make-Whole Fundamental Change, (i) if the holders of the Common Stock receive only cash in consideration for their shares of Common Stock in such Make-Whole Fundamental Change and such Make-Whole Fundamental Change is of the type described in clause (b) of the definition of Fundamental Change, the amount of cash paid per share of the Common Stock in such Make-Whole Fundamental Change; and (ii) otherwise, the average of the Last Reported Sale Price per share of the Common Stock over the five consecutive Trading Days ending on, and including, the Trading Day immediately preceding the Make-Whole Fundamental Change Effective Date for such Make-Whole Fundamental Change.

“**Subsidiary**” means a Person more than 50% of the outstanding Voting Stock of which is owned, directly or indirectly, by the Company or by one or more other Subsidiaries of the Company, or by the Company and one or more other Subsidiaries of the Company.

“**TIA**” means the Trust Indenture Act of 1939, as amended and in effect from time to time.

“**Trading Day**” means a day on which (i) trading in the Common Stock (or other security for which a Last Reported Sale Price must be determined) generally occurs on the NASDAQ Global Market or, if the Common Stock (or such other security) is not then listed on the NASDAQ Global Market, on the principal other U.S. national or regional securities exchange on which the Common Stock (or such other security) is then listed or, if the Common Stock (or such other security) is not then listed on a U.S. national or regional securities exchange, on the principal other market (including, without limitation, the OTCQX marketplace) on which the Common Stock (or such other security) is then listed or admitted for trading; and (ii) there is no Market Disruption Event; *provided, however*, that if the Common Stock (or such other security) is not so listed or traded, then “Trading Day” means a Business Day.

“**Transfer Agent**” means, initially, American Stock Transfer & Trust Company, LLC, in its capacity as the transfer agent for the Common Stock, and any successor entity acting in such capacity.

“**Transfer-Restricted Security**” means any Note or share of Common Stock issued upon conversion thereof that constitutes a “restricted security” (as defined in Rule 144); *provided, however*, that such Note or share will cease to be a Transfer-Restricted Security upon the earliest to occur of the following events:

(A) such Note or share is sold or otherwise transferred pursuant to a registration statement that was effective under the Securities Act at the time of such sale or transfer;

(B) such Note or share is sold or otherwise transferred pursuant to an available exemption (including Rule 144) from the registration and prospectus-delivery requirements of, or in a transaction not subject to, the Securities Act and, immediately after such sale or transfer, such Note or share ceases to constitute a “restricted security” (as defined in Rule 144); and

(C) such Note or share becomes eligible for resale, by a Person that is not an Affiliate of the Company and that has not been an Affiliate of the Company during the immediately preceding three (3) months, pursuant to Rule 144 without any limitations thereunder as to volume, manner of sale, availability of current public information or notice.

“**Trust Officer**” means any officer within the corporate trust department of the Trustee (or any successor group of the Trustee) and also means, with respect to a particular corporate trust matter with respect to this Indenture, any other officer of the Trustee to whom such matter is referred because of his or her knowledge of and familiarity with the particular subject, in each case with direct responsibility for the administration of this Indenture.

“**Trustee**” means the party named as the “Trustee” in the first paragraph of this Indenture until a successor replaces it pursuant to the applicable provisions of this Indenture and, thereafter, means such successor. The foregoing sentence will likewise apply to any such subsequent successor or successors.

“**Uniform Commercial Code**” means the New York Uniform Commercial Code as in effect on the Issue Date.

“**Voting Stock**” of a Person means Capital Stock of such Person of the class or classes pursuant to which the holders thereof have the general voting power under ordinary circumstances to elect at least a majority of the board of directors, managers or trustees of such Person (irrespective of whether or not at the time Capital Stock of any other class or classes will have or might have voting power by reason of the happening of any contingency).

Section 1.02      *Other Definitions.*

| <b>Term:</b>  | <b>Section Defined in:</b> |
|---|----------------------------|
| “ <b>Act</b> ”  | 1.05                       |
| “ <b>Additional Shares</b> ”                            | 10.07(a)                   |
| “ <b>Agent Members</b> ”                                | 2.02(c)                    |
| “ <b>Averaging Period</b> ”                             | 10.05(e)                   |
| “ <b>Conversion Agent</b> ”                             | 2.06(a)                    |
| “ <b>Conversion Consideration</b> ”                     | 10.03(a)(i)                |
| “ <b>Conversion Date</b> ”                              | 10.02(a)                   |
| “ <b>Conversion Notice</b> ”                            | 10.02(a)                   |
| “ <b>Defaulted Amount</b> ”                             | 2.04(c)                    |
| “ <b>Default Interest</b> ”                             | 2.04(c)                    |
| “ <b>Effective Date</b> ”                               | 1.01(a)(x)(III)            |
| “ <b>Event of Default</b> ”                             | 6.01(a)                    |
| “ <b>Ex-Dividend Date</b> ”                             | 1.01(a)(x)(IV)             |
| “ <b>Expiration Date</b> ”                              | 10.05(e)                   |
| “ <b>Expiration Time</b> ”                              | 10.05(e)                   |
| “ <b>Fundamental Change Notice</b> ”                    | 3.02(a)                    |
| “ <b>Fundamental Change Notice Date</b> ”               | 3.02(a)                    |
| “ <b>Fundamental Change Repurchase Date</b> ”           | 3.01(c)                    |
| “ <b>Fundamental Change Repurchase Notice</b> ”         | 3.03(a)(i)                 |
| “ <b>Fundamental Change Repurchase Price</b> ”          | 3.01(b)                    |
| “ <b>Initial Notes</b> ”                                | 2.01(b)                    |
| “ <b>Interest Payment Date</b> ”                        | 2.04(a)(ii)                |
| “ <b>Make-Whole Fundamental Change</b> ”                | 10.07(a)                   |
| “ <b>Make-Whole Fundamental Change Effective Date</b> ” | 10.07(b)                   |
| “ <b>Maturity Date</b> ”                                | 2.04(a)(i)                 |
| “ <b>Paying Agent</b> ”                                 | 2.06(a)                    |
| “ <b>Reference Property</b> ”                           | 10.08(a)                   |
| “ <b>Reference Property Unit</b> ”                      | 10.08(a)                   |
| “ <b>Register</b> ”                                     | 2.06(a)                    |

| <b>Term:</b>                           | <b>Section Defined in:</b> |
|--|----------------------------|
| “Registrar”                            | 2.06(a)                    |
| “Regular Record Date”                  | 2.04(a)(ii)                |
| “Reorganization Event”                 | 5.01                       |
| “Reorganization Successor Corporation” | 5.01(a)(ii)                |
| “Reporting Event of Default”           | 6.04(a)                    |
| “Special Interest”                     | 6.04(a)                    |
| “Special Regular Record Date”          | 2.04(c)(i)                 |
| “Spin-Off”                             | 10.05(c)(ii)               |
| “Successor Person”                     | 10.08(a)                   |
| “Temporary Notes”                      | 2.12                       |
| “Valuation Period”                     | 10.05(c)(ii)               |

Section 1.03 *Incorporation by Reference of TIA. Whenever this Indenture refers to a provision of the TIA, the provision is incorporated by reference in and made a part of this Indenture.*

The following TIA terms used in this Indenture have the following meanings:

- (a) “**Commission**” means the SEC;
- (b) “**indenture securities**” means the Securities;
- (c) “**indenture security holder**” means a Holder;
- (d) “**indenture to be qualified**” means this Indenture;
- (e) “**indenture trustee**” or “**institutional trustee**” means the Trustee; and
- (f) “**obligor**” on the indenture securities means the Company or any successor.

All other terms used in this Indenture that are defined by the TIA, by the TIA by reference to another statute or by rules under the TIA, and not otherwise defined herein, have the respective meanings ascribed to them in such definitions.

Section 1.04 *Rules of Construction. In this Indenture:*

- (a) a term has the meaning assigned to it;
- (b) an accounting term not otherwise defined has the meaning assigned to it and will be construed in accordance with U.S. generally accepted accounting principles;
- (c) “**or**” is not exclusive;
- (d) “**including**” means including, without limitation;
- (e) words in the singular include the plural, and words in the plural include the singular, unless the context requires otherwise;

(f) “**herein**,” “**hereof**” and other words of similar import refer to this Indenture as a whole and not to any particular Article, Section or other subdivision of this Indenture, unless the context requires otherwise;

(g) all references to \$, dollars, cash payments or money refer to United States currency; and

(h) unless the context requires otherwise, all references to interest on the Notes will (i) include any Additional Interest payable pursuant to the Registration Rights Agreement and any Special Interest payable pursuant to Section 6.04 hereof; and (ii) for the avoidance of doubt, not include any Default Interest payable on a Defaulted Amount pursuant to Section 2.04 hereof.

Section 1.05 *Acts of Holders.* Any request, demand, authorization, direction, notice, consent, waiver or other action provided by this Indenture to be given or taken by Holders may be embodied in and evidenced by one or more instruments of substantially similar tenor signed by such Holders in person or by an agent duly appointed in writing; and, except as herein otherwise expressly provided, such action will become effective when such instrument or instruments are delivered to the Trustee and to the Company. Such instrument or instruments (and the action embodied therein and evidenced thereby) are herein sometimes referred to as the “**Act**” of Holders signing such instrument or instruments. Proof of execution of any such instrument or of a writing appointing any such agent will be sufficient for any purpose of this Indenture and conclusive in favor of the Trustee and the Company, if made in the manner provided in this Section 1.05.

The fact and date of the execution by any Person of any such instrument or writing may be proved by the affidavit of a witness of such execution or by a certificate of a notary public or other officer authorized by law to take acknowledgments of deeds, certifying that the individual signing such instrument or writing acknowledged to such officer the execution thereof. Where such execution is by a signer acting in a capacity other than such signer’s individual capacity, such certificate or affidavit will also constitute sufficient proof of such signer’s authority. The fact and date of the execution of any such instrument or writing, or the authority of the Person executing the same, may also be proved in any other manner that the Trustee deems sufficient.

Any request, demand, authorization, direction, notice, consent, waiver or other Act of the Holder of any Note will bind every future Holder of the same Note and the Holder of every Note issued upon the registration of transfer thereof or in exchange therefor or in lieu thereof in respect of anything done, omitted or suffered to be done by the Trustee, the Company, the Paying Agent, the Conversion Agent or the Registrar in reliance thereon, whether or not notation of such action is made upon such Note.

If the Company will solicit from the Holders any request, demand, authorization, direction, notice, consent, waiver or other Act, the Company may, at its option, by or pursuant to a Board Resolution, fix in advance a record date for the determination of Holders entitled to give such request, demand, authorization, direction, notice, consent, waiver or other Act, but the Company will have no obligation to do so. If such a record date is fixed, such request, demand, authorization, direction, notice, consent, waiver or other Act may be given before or after such record date, but only the Holders of record at the Close of Business on such record date will be deemed to be Holders for the purposes of determining whether Holders of the requisite proportion of outstanding Notes have authorized or agreed or consented to such request, demand, authorization, direction, notice, consent, waiver or other Act, and, for that purpose, the outstanding Notes will be computed as of such record date; *provided* that no such authorization, agreement or consent by the Holders on such record date will be deemed effective unless it will become effective pursuant to the provisions of this Indenture not later than six months after the record date.

## ARTICLE 2

### THE NOTES

#### Section 2.01 *Designation, Amount and Issuance of Notes.*

(a) *Designation.* The Notes will be designated as “6.00% Convertible Senior Notes due 2021.”

(b) *Initial Notes.* The initial aggregate principal amount of Notes to be originally issued, authenticated and delivered on the Issue Date under this Indenture is sixty five million dollars (\$65,000,000). If the Initial Purchaser exercises the Option, then there will be originally issued, authenticated and delivered up to an additional nine million seven hundred fifty thousand dollars (\$9,750,000) principal amount of additional Notes pursuant to such exercise (the Notes issued pursuant to the immediately preceding sentence, and the Notes, if any, issued pursuant to this sentence, collectively, the “**Initial Notes**”).

(c) *Additional Notes.* Without the consent of any Holder, and notwithstanding anything to the contrary in Section 2.01(b) hereof, the Company may increase the aggregate principal amount of the Notes issued under this Indenture by originally issuing additional Notes with the same terms as the Initial Notes (except, to the extent applicable, with respect to the issue date, the issue price and the date as of which interest shall begin to accrue (including pre-issuance accrued interest) on, and the first Interest Payment Date (and related Regular Record Date) for, such additional Notes), which Notes will, subject to the foregoing, be considered to be part of the same series of Notes as those initially issued hereunder; *provided, however*, that if any such additional Notes are not fungible with other Notes issued hereunder for federal income tax purposes, then such additional Notes shall have a separate CUSIP number.

(d) *Issuance of Notes Upon Transfers, Exchanges, Etc.* From time to time, the Company may issue and execute, and the Trustee may authenticate, Notes delivered upon registration of transfer of, or in exchange for, or in lieu of, other Notes pursuant to Sections 2.10, 2.11, 2.12, 3.06 and 10.02 hereof.

#### Section 2.02 *Form of Notes.*

(a) *General.* The Notes will be substantially in the form of Exhibit A hereto, but may include any notations, legends or endorsements required by any applicable law (or regulation promulgated thereunder), stock exchange rule or usage, or any insertions, omissions or other variations otherwise permitted or required by this Indenture. Whenever any such notation, legend or endorsement, or any such insertion, omission or other variation is applicable to a Note, the Company will provide such notation, legend or endorsement, or such insertion, omission or other variation to the Trustee in writing.

Each Note will bear a Trustee's certificate of authentication substantially in the form set forth in Exhibit A hereto.

Notes will bear the legends, if any, required by Section 2.09.

The terms and provisions contained in the Notes will constitute, and are hereby expressly made, a part of this Indenture and, to the extent applicable, the Company and the Trustee, by their execution and delivery of this Indenture, expressly agree to such terms and provisions and to be bound thereby. However, to the extent that any provision of any Note conflicts with the express provisions of this Indenture, the provisions of this Indenture will govern and control.

(b) *Form of Initial and Subsequent Notes Upon Original Issuance.* The Initial Notes will initially be issued in the form of Global Notes. Additional Notes issued pursuant to Section 2.01(c) may be initially issued as Global Notes or Physical Notes.

(c) *Global Notes.* Each Global Note will represent the aggregate principal amount of then outstanding Notes endorsed thereon, which aggregate principal amount may, from time to time, be reduced or increased to reflect transfers, exchanges, conversions or repurchases by the Company.

Only the Trustee, or the custodian holding such Global Note for the Depository, at the direction of the Trustee, may endorse a Global Note to reflect the amount of any increase or decrease in the aggregate principal amount of then outstanding Notes represented thereby, and whenever the Holder of a Global Note delivers instructions to the Trustee to increase or decrease the aggregate principal amount of then outstanding Notes represented by a Global Note in accordance with Section 2.10 hereof, the Trustee, or the custodian holding such Global Note for the Depository, at the direction of the Trustee, will endorse such Global Note to reflect such increase or decrease in the aggregate principal amount of then outstanding Notes represented thereby. None of the Trustee, the Company or any agent of the Trustee or the Company will have any responsibility or bear any liability for any aspect of the records relating to, or payments made on account of, the ownership of any beneficial interest in a Global Note or with respect to maintaining, supervising or reviewing any records relating to such beneficial interest.

Neither any member of, or participant in, the Depository (collectively, the "**Agent Members**") nor any other Person on whose behalf an Agent Member may act will have any rights under this Indenture with respect to any Global Note or under such Global Note, and the Company, the Trustee and any agent of the Company or the Trustee, may, for all purposes, treat the Depository, or its nominee, if any, as the absolute owner and Holder of such Global Note.

The Holder of a Global Note may grant proxies and otherwise authorize any Person, including Agent Members and Persons that may hold interests through Agent Members, to take any action that such Holder is entitled to take under this Indenture or the Notes with respect to such Global Note, and, notwithstanding the foregoing, nothing herein will prevent the Company, the Trustee, the Paying Agent or any agent of the Company, the Trustee or the Paying Agent from giving effect to any written certification, proxy or other authorization furnished by such Holder or impair, as between the Depository, its Agent Members and any other Person on whose behalf an Agent Member may act, the operation of their respective customary practices governing the exercise of the rights of a Holder of any interest in any Global Note.



Section 2.03      *Denomination of Notes. The Notes will be issuable in registered form without coupons in denominations of any Authorized Denomination.*

Section 2.04      *Payments.*

(a)      *General.*

(i)      *Payment at Maturity.* Unless earlier paid or deemed paid pursuant to any of Sections 3.05 or 10.03 hereof, the Notes will mature on July 15, 2021 (the “**Maturity Date**”) and, on the Maturity Date, the Company will pay each Holder of Notes \$1,000 in cash for each \$1,000 principal amount of Notes held, together with accrued and unpaid interest to, but not including, the Maturity Date (with such interest to be payable to the Holder of such Notes as of the Close of Business on the Regular Record Date immediately preceding the Maturity Date).

(ii)      *Payment of Interest.* Each Note will accrue interest at a rate equal to 6.00% per annum from the most recent date to which interest has been paid or duly provided for, or, if no interest has been paid or duly provided for, the Issue Date (or such other date provided for in Section 2.01(c) with respect to Notes issued in accordance with such Section) until, subject to Section 2.04(c), the date the principal amount of such Note is paid or deemed to be paid, as the case may be, pursuant to clause (i) of this Section 2.04(a) or any of Sections 3.05 or 10.03 hereof. Additional Interest will accrue on the Notes to the extent provided in the Registration Rights Agreement and Special Interest will accrue on the Notes to the extent provided in Section 6.04 hereof, in each case in addition to interest accruing on the Notes pursuant to the immediately preceding sentence.

Except as otherwise provided herein (including Section 2.01(c) with respect to additional Notes issued pursuant to such Section and including Section 3.01(b) and Section 10.02(d)), interest will be payable in arrears on April 15, 2016 and, thereafter, semi-annually in arrears on January 15 and July 15 of each year (each, an “**Interest Payment Date**”) to the Holder of each such Note as of the Close of Business on the January 1 or July 1 (or April 1, 2016, in the case of the interest payment due on April 15, 2016), as the case may be, and whether or not on a Business Day, immediately preceding the applicable Interest Payment Date (each such date, a “**Regular Record Date**”). Interest on a Note that has been converted or repurchased after a Regular Record Date and on or before the related Interest Payment Date will be paid in the manner set forth in Section 3.01(b) and Section 10.02(d), as applicable. Interest will be computed on the basis of a 360-day year comprised of twelve 30-day months.

(iii)      *Method of Payment.* The Company will pay, or cause the Paying Agent to pay, the principal of, the Fundamental Change Repurchase Price for, and the interest due on, any Global Note to the Depositary by wire transfer of immediately available funds on the relevant payment date.

The Company will pay, or cause the Paying Agent to pay, the principal of and the Fundamental Change Repurchase Price for any Physical Note by check or wire transfer, in the manner set forth below, to the applicable Holder of such Note at the office of the Paying Agent on the relevant payment date upon surrender thereof to the Paying Agent and, if applicable, satisfaction of any other requirements therefor set forth in Article 3. The Company will pay, or cause the Paying Agent to pay, interest due, on an Interest Payment Date, on (and, subject to the immediately preceding sentence, the principal of or the Fundamental Change Repurchase Price for) any Physical Note to the applicable Holder of such Note (i) by check mailed to such Holder's registered address; or (ii) if such Holder delivers, not later than the Regular Record Date relating to such Interest Payment Date (or, with respect to the payment of the principal of or the Fundamental Change Repurchase Price for such Note, the date that is fifteen (15) days immediately preceding the Maturity Date or related Fundamental Change Repurchase Date, as applicable), a written request to the Registrar that the Company make such payments by wire transfer to an account of such Holder within the United States, by wire transfer of immediately available funds to such account, which request shall remain in effect until such Holder notifies the Registrar, in writing, to the contrary.

(b) *Interest Rights Preserved.* Subject to the provisions of Section 2.04(c) hereof, and, to the extent applicable, Sections 2.10 and 2.11 hereof, each Note delivered under this Indenture upon registration of transfer of, or in exchange for, or in lieu of, any other Note will carry any rights to the payment and accrual of interest that were carried by the relevant surrendered Note, Notes, or portion(s) thereof.

(c) *Defaulted Amounts.* Whenever any amount payable on a Note (including, the principal of, the Fundamental Change Repurchase Price for, and interest on, such Note) has become due and payable, but the Company fails to punctually pay or to duly provide for such amount (any such amount, a "**Defaulted Amount**"), in each case regardless of whether such failure constitutes an Event of Default, then such Defaulted Amount will forthwith cease to be payable to the Holder of such Note on the relevant payment date by virtue of its having been due such payment on such payment date, but will instead, to the extent permitted under applicable law, accrue interest ("**Default Interest**") at a rate equal to 6.00% per annum plus 100 basis points from, and including, such payment date and to, but excluding, the date on which such Defaulted Amount is paid by the Company in accordance with either clause (i) or (ii) below.

(i) The Company may elect to pay any Defaulted Amount and Default Interest on such Defaulted Amount to the Persons in whose names the Notes (or their respective predecessor Notes) are registered at the Close of Business on a special record date for the payment of such Defaulted Amount and Default Interest (a "**Special Regular Record Date**") fixed in accordance with the following procedures:

(A) At least twenty five (25) days before the date on which the Company proposes to pay such Defaulted Amounts and Default Interest thereon, the Company will deliver to the Trustee written notice of (I) the proposed payment date for such Defaulted Amounts and Default Interest thereon; and (II) the aggregate amount of such Defaulted Amounts and Default Interest thereon.

(B) Upon delivering such notice to the Trustee, the Company will either (I) deposit with the Trustee an amount of money, in immediately available funds, equal to the aggregate amount of such Defaulted Amounts and Default Interest thereon; or (II) take other actions as are necessary to ensure that an amount of money, in immediately available funds, equal to the aggregate of such Defaulted Amounts and Default Interest thereon will be deposited with the Trustee by 11:00 a.m., New York City time, on or prior to the proposed payment date, and in either case, upon receipt of such money, the Trustee will hold such money in trust for the benefit of the Persons entitled to such Defaulted Amounts and Default Interest pursuant to this Section 2.04(c)(i).

(C) Upon (i) delivery of such notice; and (ii) the Company's deposit of such money or taking of such other action(s) set forth in clause (B) above, the Company will promptly fix a Special Regular Record Date for the payment of such Defaulted Amounts and Default Interest thereon, which Special Regular Record Date will be not more than fifteen (15) calendar days and not less than ten (10) calendar days prior to the proposed payment date, and notify the Trustee and the Holders of the Special Regular Record Date and the date on which such Defaulted Amounts and Default Interest thereon will be paid by the Company.

(D) After such notice has been delivered by the Company, such Defaulted Amounts and Default Interest thereon will be paid to the Persons in whose names the Notes (or their respective predecessor Notes) are registered at the Close of Business on the Special Regular Record Date specified in such notice and such Defaulted Amounts and Default Interest thereon will no longer be payable pursuant to the following clause (ii) of this Section 2.04(c).

(ii) The Company may pay any Defaulted Amounts and Default Interest on such Defaulted Amounts in any other lawful manner that is not inconsistent with the requirements of any securities exchange or automated quotation system on which the Notes are then listed (or, if applicable, have been approved for listing) or designated for issuance, and upon such notice as may be required by such exchange or automated quotation system, if, after notice given by the Company to the Trustee of the proposed payment pursuant to this clause, such manner of payment will be deemed practicable by the Trustee. The Trustee will not have any duty or responsibility to any Holder to determine whether any Default Interest is payable, or, if any Default Interest is payable, the amount of such Default Interest that is payable.

Section 2.05 *Execution and Authentication.*

(a) *In General.* A Note will be valid only if executed by the Company and authenticated by the Trustee.

(b) *Execution.* A Note will be deemed to have been executed by the Company when an Officer signs such Note on behalf of the Company. The Officer's signature may be manual or facsimile (including .pdf), and such Officer's signature will be valid whether or not such signatory remains an Officer at the time the Trustee authenticates such Note.

(c) *Authentication.* A Note will be deemed authenticated when an authorized signatory of the Trustee manually signs the certificate of authentication on such Note. An authorized signatory of the Trustee will manually sign the certificate of authentication on a Note only if (i) the Company delivers such Note to the Trustee; (ii) such Note is validly executed by the Company in accordance with Section 2.05(b) hereof; (iii) the Company delivers an Officers' Certificate and an Opinion of Counsel to the Trustee; and (iv) the Company delivers, before or with such Note, a Company Order setting forth (A) a request that the Trustee authenticate such Note; (B) the principal amount of such Note; (C) the name of the Holder of such Note; (D) the date on which such Note is to be authenticated; and (E) any insertions, omissions or other variations, notations, legends or endorsements permitted under Section 2.02 hereof and applicable to such Note. The Company Order shall specify that the Trustee shall deliver such Note to the Holder or the Depository, and the Trustee will promptly deliver such Note at the Company's expense in accordance with such Company Order.

The Trustee or the Company may appoint an authenticating agent. If the Trustee appoints an authenticating agent and such authenticating agent is reasonably acceptable to the Company, such authenticating agent may authenticate a Note whenever the Trustee may authenticate such Note. For purposes of this provision, each reference in this Indenture to authentication by the Trustee will be deemed to include authentication by an authenticating agent, and an authenticating agent will have the same rights to deal with the Company as the Trustee would have if it were performing the duties that the authentication agent was validly appointed to undertake.

Section 2.06 *Registrar, Paying Agent and Conversion Agent.*

(a) *General.* The Company will maintain an office or agency in the continental United States where Notes may be presented for registration of transfer or for exchange (the "**Registrar**"), an office or agency where the Notes may be presented for payment or repurchase (the "**Paying Agent**"), an office or agency where the Notes may be presented for conversion (the "**Conversion Agent**") and an office or agency where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made.

The Registrar will keep a register for the recordation of, and will record, the names and addresses of Holders, the Notes held by each Holder and the transfer, exchange, repurchase and conversion of Notes (the "**Register**"). Absent manifest error, the entries in the Register will be conclusive and the parties may treat each Person whose name is recorded in the Register pursuant to the terms hereof as a Holder hereunder for all purposes of this Indenture. The Register will be in written form or in any form capable of being converted into written form within a reasonably prompt period of time.

The Company may have one or more Registrars, one or more Paying Agents, one or more Conversion Agents and one or more places where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made. Before appointing any Registrar, Paying Agent or Conversion Agent that is not otherwise a party to this agreement, the Company will enter into an appropriate agency agreement with such Registrar, Paying Agent or Conversion Agent, as the case may be, which agency agreement will implement the provisions of this Indenture that relate to such replacement or additional registrar, paying agent or conversion agent, as the case may be. The term Registrar includes any additional registrars named pursuant to this Indenture. The term Paying Agent includes any additional paying agent named pursuant to this Indenture. The term Conversion Agent includes any additional conversion agent named pursuant to this Indenture. Upon the occurrence of any Event of Default under Section 6.01(a)(ix) or 6.01(a)(x) hereof with respect to the Company, the Trustee shall be the Paying Agent.

(b) *Initial Designations.* The Company initially appoints the Trustee as each of the Registrar, the Paying Agent, and Conversion Agent, and the Notes initially may be presented for registration of transfer or for exchange, payment, repurchase and conversion to the Trustee, in its capacity as the Registrar, Paying Agent or Conversion Agent, as the case may be, at the Corporate Trust Office. Notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made at the office of the Company identified in Section 12.02 hereof.

(c) *Removal, Resignation and Replacement.* The Company may remove any Registrar, Paying Agent or Conversion Agent by delivering written notice to the Trustee and to such Registrar, Paying Agent or Conversion Agent; *provided, however,* that no such removal will become effective unless (i) after such removal, at least one Registrar, Paying Agent and Conversion Agent will remain; (ii) a successor has accepted appointment as Registrar, Paying Agent or Conversion Agent, as the case may be, the Company and such successor have entered into an agency agreement in accordance with Section 2.06(a) hereof, and the Company has delivered written notice of such appointment and a copy of such agency agreement to the Trustee; or (iii) the Company has delivered written notice to the Trustee that the Trustee will serve as the successor Registrar, Paying Agent or Conversion Agent, as the case may be, in accordance with Section 2.06(d) hereof; and *provided, further,* that the right to effect any such change or removal in no way relieves the Company of its obligation to maintain a Registrar, Paying Agent and Conversion Agent in the continental United States. The Company may also change the place where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made, or reduce the number of such places; *provided, however,* that the right to effect any such change or reduction in no way relieves the Company of its obligation to maintain a place in the continental United States where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made.

In addition, the Registrar, Paying Agent or Conversion Agent may resign at any time by delivering written notice of such resignation to each of the Company and the Trustee; *provided, however,* that if the Trustee is serving as Registrar, Paying Agent or Conversion Agent, the Trustee may resign from such capacity only if it also resigns as Trustee in accordance with Section 7.08 hereof. If, after any such resignation, at least one Registrar, Paying Agent and Conversion Agent does not remain, the Trustee will immediately be deemed to serve such empty office or agency in accordance with Section 2.06(d) hereof.

(d) *Failure to Maintain an Office or Agency.* If the Company fails to maintain in the continental United States, a Registrar, Paying Agent, Conversion Agent or place where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made, the Trustee will act as the Registrar, Paying Agent, Conversion Agent, or place, as the case may be, and the office where the Notes may be presented for registration of transfer or for exchange, presented for payment or repurchase or surrendered for conversion will be the Corporate Trust Office. In each such case, the Trustee will be entitled to compensation for such action pursuant to Section 7.07 hereof. In the event the Trustee so acts as such place where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made, the Trustee will be under no obligation to forward or otherwise deliver any such notice or demand to the Company and will in no event be held liable in connection with its acting as such place.

(e) *Notices.* Promptly upon the effectiveness of any removal or appointment of a Registrar, Paying Agent or Conversion Agent, or upon any change in the location of the office of any Registrar, Paying Agent or Conversion Agent, or of the place where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made, the Company will deliver to each Holder, with a copy to the Trustee, notice of such removal, appointment or change in location, as the case may be, which notice will include a brief description of the removal, appointment or change in location, as the case may be, and list the name and address of each continuing (and newly appointed, if applicable) Registrar, Paying Agent and Conversion Agent and place where notices and demands to, or upon, the Company with respect to the Notes and this Indenture may be made.

Section 2.07 *Money and Securities Held in Trust.*

Except as otherwise provided herein, by no later than 11:00 a.m., New York City time, on each due date for a payment on any Note, the Company will deposit with the Paying Agent an amount of money in immediately available funds, if deposited on the due date sufficient to make such payment when due.

The Company will require that each Paying Agent (other than the Trustee, if the Trustee is a Paying Agent) agree in writing that it will (i) segregate all money and securities it holds for making payments with respect to the Notes; (ii) hold such money and securities in trust for the benefit of Holders; and (iii) notify the Trustee, in writing, as promptly as practicable, if the Company defaults in making any payment on the Notes.

If any such default has occurred and is continuing, the Paying Agent will, upon receiving a written request from the Trustee, promptly pay to the Trustee all of the money and securities it holds in trust. In addition, at any time, the Company may require a Paying Agent to pay all money and securities that it holds for making payments with respect to the Notes to the Trustee and to account for any money and securities it has disbursed. After delivering all of such money and securities to the Trustee pursuant to this Section 2.07, the Paying Agent (in its capacity as such) will have no further liability for such money and securities.

Section 2.08 *Holder Lists.*

The Trustee will preserve in as current a form as is reasonably practicable the most recent list available to it of the names and addresses of Holders. If the Trustee is not the Registrar, the Company will furnish to the Trustee, (i) within five Business Days after each Regular Record Date, a list of the names and addresses of Holders as of such Regular Record Date; and (ii) at such other times as the Trustee may request in writing, within 30 days after receipt by the Company of such request, a list of the names and addresses of Holders as of no more than fifteen (15) days immediately prior to the date such list is furnished, in each case, in such form as the Trustee may reasonably require.

Section 2.09 *Restrictive Legends.*

(a) *Global Note Legend.* Each Global Note will bear the Global Note Legend.

(b) *Non-Affiliate Legend.* Each Note will bear the Non-Affiliate Legend.

(c) *Restricted Note Legend.* Each Note that is a Transfer-Restricted Security will bear the Restricted Note Legend. If a Note is issued in exchange for, in substitution of, or to effect a partial conversion of, another Note (such other Note being referred to as the “old Note” for purposes of this Section 2.09(c)), including pursuant to Section 2.10(b), Section 2.10(c), Section 2.11 or Section 10.02(c), then, unless the Company determines otherwise in its reasonable discretion, such Note will bear the Restricted Note Legend if such old Note bore the Restricted Note Legend at the time of such exchange or substitution, or on the related Conversion Date with respect to such conversion, as applicable; *provided, however*, that such Note need not bear the Restricted Note Legend if such Note does not constitute a Transfer-Restricted Security immediately after such exchange or substitution, or as of such Conversion Date, as applicable.

(d) *Acknowledgement and Agreement by the Holders.* A Holder’s acceptance of any Note bearing any legend required by this Section 2.09 will constitute such Holder’s acknowledgement of, and agreement to comply with, the restrictions set forth in such legend.

(e) *Restricted Stock Legend.*

(i) Each share of Common Stock issued upon conversion of any Note will bear the Restricted Stock Legend if such Note was (or would have been had it not been converted) a Transfer-Restricted Security at the time such share was issued; *provided, however*, that such share need not bear the Restricted Stock Legend if the Company determines, in its reasonable discretion, that such share need not bear the Restricted Stock Legend.

(ii) Notwithstanding anything to the contrary in this Section 2.09(e), a share of Common Stock issued upon conversion of any Note need not bear a Restricted Stock Legend if such share is issued in an uncertificated form that does not permit affixing legends thereto, *provided* the Company takes measures (including the assignment thereto of a “restricted” CUSIP number) that it reasonably deems appropriate to enforce the transfer restrictions referred to in the Restricted Stock Legend.

Section 2.10 *Transfer and Exchange; Transfer Restrictions.*

(a) *Provisions Applicable to All Transfers and Exchanges.*

(i) Subject to this Section 2.10, Physical Notes and beneficial interests in Global Notes may be transferred or exchanged from time to time and the Registrar will record each such transfer or exchange in the Register.

(ii) Each Note issued upon transfer or exchange of any other Note (such other Note being referred to as the “old Note” for purposes of this clause (ii)) or portion thereof in accordance herewith will be the valid obligation of the Company, evidencing the same indebtedness, and entitled to the same benefits hereunder, as such old Notes or portion thereof, as applicable.

(iii) None of the Company, the Trustee, the Registrar, the Paying Agent and the Conversion Agent will impose any service charge on any Holder for any transfer, exchange or conversion of Notes, but the Company, the Trustee, the Registrar and the Conversion Agent may require payment of a sum sufficient to cover any transfer tax or similar governmental charge that may be imposed in connection with any transfer, exchange or conversion of Notes, other than exchanges or transfers pursuant to Section 2.12, Article 3, Article 10 or Section 9.08 not involving any transfer.

(iv) Notwithstanding anything to the contrary herein or in the Notes, the Company, the Trustee and the Registrar will not be required to register the transfer of or exchange any Note that (1) has been surrendered for conversion, except to the extent that any portion of such Note is not subject to conversion; or (2) is subject to a Fundamental Change Repurchase Notice validly delivered pursuant to Section 3.03, except to the extent that any portion of such Note is not subject to a Fundamental Change Repurchase Notice or the Company fails to pay the applicable Fundamental Change Repurchase Price when due.

(v) The Trustee will have no obligation or duty to monitor, determine or inquire as to compliance with any transfer restrictions imposed hereunder or under applicable law with respect to any Note, other than to require the delivery of such certificates or other documentation or evidence as expressly required hereby and to examine the same to determine substantial compliance as to form with the requirements hereof.

(vi) Each Note issued upon transfer of, or in exchange for, another Note will bear each legend, if any, required by Section 2.09.

(vii) Upon satisfaction of the requirements hereof to effect a transfer or exchange of any Note, the Company will cause such transfer or exchange to be effected as soon as reasonably practicable but in no event later than the third (3rd) Business Day after the date of such satisfaction.

(viii) Neither the Trustee nor any agent shall have any responsibility or liability for any actions taken or not taken by the Depositary.

(ix) The Company will bear responsibility for obtaining any necessary CUSIP number(s) in respect of Notes not bearing a Restricted Note Legend and causing such Notes to be available through the facilities of the Depositary, when and if applicable.

(b) *Transfers and Exchanges of Global Notes.*

(i) Subject to clause (ii) below, no Global Note may be transferred or exchanged in whole except (A) by the Depositary to a nominee of the Depositary; (B) by a nominee of the Depositary to the Depositary or to another nominee of the Depositary; or (C) by the Depositary or any such nominee to a successor Depositary or a nominee of such successor Depositary



(ii) No Global Note (or portion thereof) may be transferred to, or exchanged for, a Physical Note; *provided, however*, that a Global Note will be exchanged, pursuant to customary procedures, for Physical Notes if:

(A) (x) the Depository notifies the Company or the Trustee that the Depository is unwilling or unable to continue as depository for such Global Note; or (y) the Depository ceases to be a “clearing agency” registered under Section 17A of the Exchange Act and, in each case, the Company fails to appoint a successor Depository within ninety (90) days of such notice or cessation;

(B) an Event of Default has occurred and is continuing and the Company, the Trustee or the Registrar has received a written request from any owner of a beneficial interest in such Global Note to exchange such beneficial interest for one or more Physical Notes; or

(C) the Company, in its sole discretion, by delivering a written request to the Registrar, the Trustee and the owner(s) of beneficial interest(s) in such Global Note, permits the exchange of any such beneficial interest for one or more Physical Notes at the request of such owner(s).

In such event, the Company will execute, and the Trustee, upon receipt of an Officers’ Certificate and a Company Order for the authentication and delivery of Notes, will authenticate and deliver (x) in the case of clause (B) above, one or more Physical Notes to such beneficial owner having an aggregate principal amount equal to the principal amount of such beneficial interest referred to in clause (B) above; and (y) in the case of clause (A) or (C) above, one or more Physical Notes to each owner of a beneficial interest in such Global Note, with such Physical Notes having, with respect to each such owner, an aggregate principal amount equal to the beneficial interest of such owner in such Global Note, and, and, in each case, if the remaining principal amount of such Global Note immediately after such exchange is zero, then the Trustee will, upon delivery of such Global Note to the Trustee, cancel such Global Note.

(iii) Upon satisfaction of the requirements hereof to effect a transfer or exchange of any Global Note (or any portion thereof in an Authorized Denomination):

(A) the Trustee will reflect any resulting decrease of the principal amount of such Global Note by notation on the “Schedule of Increases and Decreases of Global Note” forming part of such Global Note (and, if such notation results in such Global Note having a principal amount of zero, the Company may (but is not required to) instruct the Trustee to cancel such Global Note pursuant to Section 2.13);

(B) if required to effect such transfer or exchange, then the Trustee will reflect any resulting increase of the principal amount of any other Global Note by notation on the “Schedule of Increases and Decreases of Global Note” forming part of such other Global Note;

(C) if required to effect such transfer or exchange, then the Company will issue, execute and deliver, and the Trustee will authenticate, in each case in accordance with Section 2.05, a new Global Note bearing each legend, if any, required by Section 2.09; and

(D) if such Global Note (or portion thereof) is to be exchanged for one or more Physical Notes, then the Company will issue, execute and deliver, and the Trustee will authenticate, in each case in accordance with Section 2.05, one or more Physical Notes registered in such name(s) and in Authorized Denominations (not to exceed, in the aggregate, the principal amount of such Global Note (or portion thereof)) as the Depositary specifies, or as otherwise determined pursuant to customary procedures, and bearing each legend, if any, required by Section 2.09.

(iv) Each transfer or exchange of a beneficial interest in any Global Note will be made in accordance with the Applicable Procedures.

(c) *Transfers and Exchanges of Physical Notes.*

(i) Subject to this Section 2.10, a Holder of a Physical Note may (x) transfer such Physical Note (or any portion thereof in an Authorized Denomination) to one or more other Person(s); (y) exchange such Physical Note (or any portion thereof in an Authorized Denomination) for one or more other Physical Notes in Authorized Denominations having an aggregate principal amount equal to the aggregate principal amount of the Physical Note (or portion thereof) to be exchanged; and (z) if then permitted by the Applicable Procedures, transfer such Physical Note (or any portion thereof in an Authorized Denomination) in exchange for a beneficial interest in a Global Note; *provided, however*, that, to effect any such transfer or exchange, such Holder must:

(A) surrender such Physical Note to be transferred or exchanged to the office of the Registrar, together with any endorsements or instruments of transfer reasonably required by the Company, the Trustee or the Registrar; and

(B) deliver such certificates, documentation or evidence as may be required pursuant to Section 2.10(d).

(ii) Upon the satisfaction of the requirements hereof to effect a transfer or exchange of any Physical Note (such Physical Note being referred to as the “old Physical Note” for purposes of this Section 2.10(c)(ii)) of a Holder (or any portion of such old Physical Note in an Authorized Denomination):

(A) such old Physical Note will be promptly cancelled pursuant to Section 2.13;

(B) if such old Physical Note is to be transferred or exchanged only in part, then the Company will issue, execute and deliver, and the Trustee will authenticate, in each case in accordance with Section 2.05, one or more Physical Notes that (x) are in Authorized Denominations and have an aggregate principal amount equal to the principal amount of such old Physical Note not to be transferred or exchanged; (y) are registered in the name of such Holder; and (z) bear each legend, if any, required by Section 2.09;

(C) in the case of a transfer:

(I) to the Depositary or a nominee thereof that will hold its interest in such old Physical Note (or portion thereof) to be so transferred in the form of one or more Global Notes, the Trustee will reflect an increase of the principal amount of one or more existing Global Notes by notation on the "Schedule of Increases and Decreases of Global Note" forming part of such Global Note(s), which increase(s) are in Authorized Denominations and aggregate to the principal amount to be so transferred, and which Global Note(s) bear each legend, if any, required by Section 2.09; *provided, however*, that if such transfer cannot be so effected by notation on one or more existing Global Notes (whether because no Global Notes bearing each legend, if any, required by Section 2.09 then exist, because any such increase will result in any Global Note having an aggregate principal amount exceeding the maximum aggregate principal amount permitted by the Depositary or otherwise), then the Company will issue, execute and deliver, and the Trustee will authenticate, in each case in accordance with Section 2.05, one or more Global Notes that (x) are in Authorized Denominations and have an aggregate principal amount equal to the principal amount to be so transferred; and (y) bear each legend, if any, required by Section 2.09; and

(II) to a transferee that will hold its interest in such old Physical Note (or portion thereof) to be so transferred in the form of one or more Physical Notes, the Company will issue, execute and deliver, and the Trustee will authenticate, in each case in accordance with Section 2.05, one or more Physical Notes that (x) are in Authorized Denominations and have an aggregate principal amount equal to the principal amount to be so transferred; (y) are registered in the name of such transferee; and (z) bear each legend, if any, required by Section 2.09; and

(D) in the case of an exchange, the Company will issue, execute and deliver, and the Trustee will authenticate, in each case in accordance with Section 2.05, one or more Physical Notes that (x) are in Authorized Denominations and have an aggregate principal amount equal to the principal amount to be so exchanged; (y) are registered in the name of the Person to whom such old Physical Note was registered; and (z) bear each legend, if any, required by Section 2.09.

(d) *Requirement to Deliver Documentation and Other Evidence.* If a Holder of any Note that is identified by a “restricted” CUSIP number or that bears a Restricted Note Legend, or is a Transfer-Restricted Security, requests to:

- (i) cause such Note to be identified by an “unrestricted” CUSIP number;
- (ii) remove such Restricted Note Legend; or
- (iii) register the transfer of such Note to the name of another Person,

then the Company and the Trustee may refuse to effect such identification, removal or transfer, as applicable, unless there is delivered to the Company and the Trustee such certificates or other documentation or evidence as the Company or the Trustee may reasonably require in order to determine that such identification, removal or transfer, as applicable, complies with the Securities Act and other applicable securities laws (which may include certifications in the forms set forth in Exhibit C and Exhibit D hereto with such revisions as the Company or the Trustee reasonably deems appropriate); *provided, however*, that no such certificates, documentation or evidence need be so delivered if such request is being made in connection with a sale or other transfer of such Note pursuant to an effective registration statement under the Securities Act, or after such Note has been sold or otherwise transferred pursuant to an effective registration statement under the Securities Act, unless the Company determines, in its reasonable discretion, that giving effect to such request would violate the Securities Act.

(e) *Special Transfer Restrictions.*

(i) *Transfers of Interests from a Rule 144A Note to an Institutional Accredited Investor Note.* A Rule 144A Physical Note or a beneficial interest in a Rule 144A Global Note may not be transferred to a Person who takes delivery thereof in the form of an Institutional Accredited Investor Physical Note or a beneficial interest in an Institutional Accredited Investor Global Note unless:

(A) in the case such Person is to take such delivery in the form of a beneficial interest in an Institutional Accredited Investor Global Note, the transferor delivers to the Registrar (1) a written order from a Participant or an Indirect Participant given to the Depositary in accordance with the Applicable Procedures directing the Depositary to credit or cause to be credited a beneficial interest in such Institutional Accredited Investor Global Note in an amount equal to the interest to be transferred; and (2) instructions given in accordance with the Applicable Procedures containing information regarding the Participant account to be so credited, or, in lieu of the foregoing, such other instructions or documentation as the Registrar may reasonably require in order to comply with the Applicable Procedures in connection with such transfer;

(B) without limiting the generality of Section 2.10(d), such transferor delivers to the Registrar a certificate substantially in the form set forth in Exhibit C hereto, including the certification set forth in Item 4 thereof; and

(C) without limiting the generality of Section 2.10(d), such transferee Person delivers to the Registrar a certificate substantially in the form set forth in Exhibit D hereto, including the certification set forth in Item 1(b) thereof; and

(ii) *Transfers of Interests from an Institutional Accredited Investor Note to a Rule 144A Note.* An Institutional Accredited Investor Physical Note or a beneficial interest in an Institutional Accredited Investor Global Note may not be transferred to a Person who takes delivery thereof in the form of a Rule 144A Physical Note or a beneficial interest in a Rule 144A Global Note unless:

(A) in the case such Person is to take such delivery in the form of a beneficial interest in a Rule 144A Global Note, the transferor delivers to the Registrar (1) a written order from a Participant or an Indirect Participant given to the Depositary in accordance with the Applicable Procedures directing the Depositary to credit or cause to be credited a beneficial interest in such Institutional Accredited Investor Global Note in an amount equal to the interest to be transferred; and (2) instructions given in accordance with the Applicable Procedures containing information regarding the Participant account to be so credited, or, in lieu of the foregoing, such other instructions or documentation as the Registrar may reasonably require in order to comply with the Applicable Procedures in connection with such transfer;

(B) without limiting the generality of Section 2.10(d), such transferor delivers to the Registrar a certificate substantially in the form set forth in Exhibit C hereto, including the certification set forth in Item 3 thereof; and

(C) without limiting the generality of Section 2.10(d), such transferee Person delivers to the Registrar a certificate substantially in the form set forth in Exhibit D hereto, including the certification set forth in Item 1(a) thereof; and

Section 2.11 *Replacement Notes.*

If (a)(i) a mutilated Note is surrendered to the Registrar; or (ii) the Holder of a Note claims that such Note has been lost, destroyed or stolen and provides the Company and the Trustee with (A) evidence of such loss, theft or destruction that is reasonably satisfactory to the Company and the Trustee; and (B) any amount or kind of security or indemnity that the Trustee requests to protect itself and the Company requests to protect itself, the Trustee and the Registrar, from any loss that it may suffer upon replacement of such Note; and, in either case, (b) such Holder satisfies any other reasonable requirements of the Company and the Trustee, including the payment of any tax or other governmental charge that may be imposed in connection with the replacement of such Note, then, unless the Company or the Trustee receives notice that such Note has been acquired by a bona fide purchaser, the Company will, in accordance with Section 2.05 hereof, promptly execute and deliver to the Trustee, and the Trustee, upon receipt of a Company Order, in accordance with Section 2.05 hereof, and the documents required by Sections 12.04 and 12.05 hereof, will promptly authenticate and deliver, in the name of such Holder, a replacement Note having the same aggregate principal amount as the Note that was mutilated or claimed to be lost, destroyed or stolen, bearing any restrictive legends required by Section 2.09 hereof and with a certificate number not contemporaneously outstanding.

Every new Note issued pursuant to this Section 2.11 in exchange for any mutilated Note, or in lieu of any destroyed, lost or stolen Note, will constitute an original contractual obligation of the Company and any other obligor upon the Notes, regardless of whether the mutilated, destroyed, lost or stolen Note will be at any time enforceable by anyone, and will be entitled to all benefits of (and will be subject to all the limitations set forth in) this Indenture equally and proportionately with any and all other Notes duly issued hereunder.

Section 2.12 *Temporary Notes.* Until Physical Notes are ready for delivery, the Company may execute and the Trustee or an authenticating agent appointed by the Trustee will, upon receipt of a Company Order, authenticate and deliver temporary Notes (printed or lithographed) (“**Temporary Notes**”). Temporary Notes will be issuable in any Authorized Denomination, and substantially in the form of Physical Notes, but with such omissions, insertions and variations as may be appropriate for Temporary Notes, all as may be determined by the Company. Every such Temporary Note will be executed by the Company and authenticated by the Trustee or such authenticating agent upon the same conditions and in substantially the same manner, and with the same effect, as the Physical Notes. Without unreasonable delay the Company will prepare, execute and deliver to the Trustee or such authenticating agent Physical Notes (other than any Global Note) and thereupon any or all Temporary Notes (other than any Global Note) may be surrendered in exchange therefor, at each office or agency maintained by the Company pursuant to Section 2.06 hereof and the Trustee or such authenticating agent will authenticate and deliver in exchange for such Temporary Notes Physical Notes having an aggregate principal amount equal to such Temporary Notes. Such exchange will be made by the Company at its own expense and without any charge therefor. Until so exchanged, the Temporary Notes will, in all respects, be entitled to the same benefits and subject to the same limitations under this Indenture as Physical Notes authenticated and delivered hereunder.

Section 2.13 *Cancellation.* At any time, the Company may deliver Notes to the Trustee for cancellation. Whenever any Note is surrendered to the Registrar, Conversion Agent or Paying Agent for registration of transfer, exchange, conversion, repurchase or payment, the Registrar, Conversion Agent or Paying Agent, as the case may be, will promptly forward such Note to the Trustee. Upon receipt of any such Note, the Trustee, in its customary manner, will promptly cancel and dispose of such Note. The Company may not issue new Notes to replace Notes that it has repurchased, paid or delivered to the Trustee for cancellation or that a Holder has converted pursuant to Article 10 hereof.

Section 2.14 *Outstanding Notes.* At any time, Notes outstanding are limited to all Notes authenticated by the Trustee except (i) those cancelled by it; (ii) those delivered to it for cancellation; and (iii) those deemed not outstanding under Sections 3.05 and 10.02 hereof and clauses (a) and (b) of this Section 2.14.

(a) If a Note is replaced pursuant to Section 2.11 hereof, such Note will cease to be outstanding at the time of its replacement unless the Trustee and the Company receive proof satisfactory to them that such Note is held by a bona fide purchaser.

(b) In addition, any Notes that are owned by Affiliates of the Company will be disregarded and deemed not to be outstanding for purposes of determining whether the Holders of the requisite aggregate principal amount of Notes have given or concurred in any request, demand, authorization, direction, notice, consent, waiver or other action hereunder, except that, in determining whether the Trustee shall be protected in relying upon any such request, demand, authorization, direction, notice, consent or waiver, only Notes that a Trust Officer of the Trustee actually knows to be so owned shall be so disregarded. Subject to the foregoing, only Notes outstanding at the time of any such determination will be considered in such determination (including determinations pursuant to Article 6 and Article 9 hereof).

Section 2.15 *Persons Deemed Owners.* Prior to due presentment of a Note for registration of transfer, the Company, the Trustee and any agent of the Company or the Trustee may treat the Person in whose name such Note is registered in the Register as the owner of such Note for the purpose of receiving the payment of the principal, Fundamental Change Repurchase Price of, and interest, if any, on, such Note, for the purpose of conversion of such Note and for all other purposes whatsoever with respect to such Note, and none of the Company, the Trustee or any agent of the Company or the Trustee will be affected by any notice to the contrary.

Section 2.16 *Repurchases.* The Company may, from time to time, repurchase Notes in open market purchases or in negotiated transactions without delivering prior notice to Holders.

Section 2.17 *CUSIPs.*

(a) Whenever “CUSIP” and “ISIN” numbers are generally in use, the Company will use CUSIP and ISIN numbers with respect to the Notes, which CUSIP and ISIN numbers (i) for Notes that are Transfer-Restricted Securities, will be restricted numbers; and (ii) for Notes that are not Transfer-Restricted Securities, will be unrestricted numbers. Whenever the Company uses CUSIP and ISIN numbers, the Trustee will also use CUSIP and ISIN numbers in each notice it delivers to the Holders; *provided, however*, that neither the Company nor the Trustee will be responsible for any defect in any CUSIP or ISIN number that appears on any Note, check, advice of payment or notice. The Company will promptly notify the Trustee in writing in the event of any change in the CUSIP or ISIN numbers.

(b) In addition, if, when any shares of Common Stock are issued upon conversion of a Note, CUSIP and ISIN numbers are generally in use, the Company will use CUSIP and ISIN numbers with respect to such shares of Common Stock, which CUSIP and ISIN numbers (i) for shares of Common Stock to which the restrictions on transfer set forth in the Restricted Stock Legend apply, will be restricted numbers; and (ii) for shares of Common Stock to which the restrictions on transfer set forth in the Restricted Stock Legend do not apply, will be unrestricted numbers.

(c) Whenever any of the CUSIP or ISIN numbers with respect to the Notes or the shares of Common Stock issuable upon conversion of the Notes change, cease to be used, or begin to be used, the Company will deliver prompt written notice of such change, cessation, or beginning to each of the Trustee and the Holders.

## ARTICLE 3

### REPURCHASE AT THE OPTION OF THE HOLDER

#### Section 3.01 *Fundamental Change Permits Holders to Require the Company to Repurchase the Notes.*

(a) *General.* If a Fundamental Change occurs at any time prior to the Maturity Date, each Holder will have the right, at its option, to require the Company to repurchase all of the Holder's Notes, or any portion thereof in an Authorized Denomination, on the Fundamental Change Repurchase Date for such Fundamental Change for an amount of cash equal to the Fundamental Change Repurchase Price for such Fundamental Change Repurchase Date and such Notes.

(b) *Fundamental Change Repurchase Price.* The "**Fundamental Change Repurchase Price**" means, for any Notes to be repurchased on any Fundamental Change Repurchase Date, a price equal to 100% of the principal amount of such Notes, plus accrued and unpaid interest, if any, on such Notes to, but excluding, such Fundamental Change Repurchase Date; *provided, however*, that if such Fundamental Change Repurchase Date occurs after a Regular Record Date, but on or prior to the Interest Payment Date corresponding to such Regular Record Date, the Fundamental Change Repurchase Price for such Notes will be 100% of the principal amount of such Notes, and accrued and unpaid interest, if any, on such Notes to, but excluding, such Interest Payment Date (assuming, solely for these purposes, that such Notes remained outstanding through such Interest Payment Date) will be payable, on such Fundamental Change Repurchase Date, to the Holder of such Notes as of the Close of Business on such Regular Record Date.

(c) *Fundamental Change Repurchase Date.* The "**Fundamental Change Repurchase Date**" means, for any Fundamental Change, the date specified by the Company in the Fundamental Change Notice for such Fundamental Change, which date will be not less than twenty (20) Business Days, nor more than thirty five (35) Business Days, immediately following the Fundamental Change Notice Date for such Fundamental Change.

#### Section 3.02 *Fundamental Change Notice.*

(a) *General.* On or before the Business Day immediately following the effective date of a Fundamental Change, the Company will deliver to each Holder (and to any beneficial owners of a Global Note, as required by applicable law), the Trustee, the Conversion Agent and the Paying Agent (in compliance with the Applicable Procedures, if applicable) written notice of such Fundamental Change and of the resulting repurchase right (the "**Fundamental Change Notice**," and the date of such delivery, the "**Fundamental Change Notice Date**"). Simultaneously with delivering any Fundamental Change Notice to the Holders, the Trustee, the Conversion Agent and the Paying Agent, the Company will publish a notice containing the same information as the Fundamental Change Notice in a newspaper of general circulation in The City of New York and on its website or through such other public medium as the Company may use at such time.



The Fundamental Change Notice for each Fundamental Change will specify, as applicable:

- (A) briefly, the events causing such Fundamental Change;
- (B) the effective date of such Fundamental Change;
- (C) the last date on which a Holder may exercise its right to require the Company to repurchase its Notes as a result of such Fundamental Change under this Article 3;
- (D) the procedures that a Holder must follow to require the Company to repurchase a Note;
- (E) the Fundamental Change Repurchase Price for each \$1,000 principal amount of Notes for such Fundamental Change;
- (F) the Fundamental Change Repurchase Date for such Fundamental Change;
- (G) that the Fundamental Change Repurchase Price for any Note for which a Fundamental Change Repurchase Notice has been duly tendered and not validly withdrawn will be paid promptly following the later of the Fundamental Change Repurchase Date and the time such Note is surrendered for repurchase;
- (H) the name and address of the Paying Agent and of the Conversion Agent;
- (I) the Conversion Rate in effect on the Fundamental Change Notice Date for such Fundamental Change and the Last Reported Sale Price of the Common Stock on the Trading Day immediately preceding the Fundamental Change Notice Date;
- (J) if applicable, any adjustments that will be made to the Conversion Rate as a result of such Fundamental Change, including any Additional Shares by which the Conversion Rate will be increased pursuant to Section 10.07 hereof for a Holder that converts a Note “in connection with” such Fundamental Change;
- (K) that any Notes with respect to which a Fundamental Change Repurchase Notice has been delivered by a Holder may be converted only if such Holder withdraws such Fundamental Change Repurchase Notice in accordance with the terms of this Indenture or to the extent any portion of such Notes are not subject to such Fundamental Change Repurchase Notice;
- (L) the procedures for withdrawing a Fundamental Change Repurchase Notice;
- (M) that if a Note or portion of a Note is subject to a validly delivered Fundamental Change Repurchase Notice, unless the Company defaults in paying the Fundamental Change Repurchase Price for such Note or portion of a Note, interest, if any, on such Note or portion of a Note will cease to accrue on and after the Fundamental Change Repurchase Date; and

(N) the CUSIP and ISIN number(s) of the Notes.

(b) *Failure or Defect.* Notwithstanding anything provided elsewhere in this Indenture, neither the failure of the Company to deliver a Fundamental Change Notice nor a defect in a Fundamental Change Notice delivered by the Company will limit the repurchase rights of any Holder under this Article 3 or impair or otherwise affect the validity of any proceedings relating to the repurchase of any Note pursuant to this Article 3.

Section 3.03 *Fundamental Change Repurchase Notice.*

(a) *General.* To exercise its repurchase rights under Section 3.01(a) hereof with respect to any Notes pursuant to a Fundamental Change, the Holder thereof must:

(i) in the case of Physical Notes, deliver to the Paying Agent, by the Close of Business on the second (2nd) Business Day immediately preceding the Fundamental Change Repurchase Date, subject to extension to comply with applicable law, a duly completed "Fundamental Change Repurchase Notice," substantially in the form set forth in Exhibit A hereto (a "**Fundamental Change Repurchase Notice**") setting forth that such Holder is tendering such Notes for repurchase;

(ii) in the case of Global Notes, exercise such rights in accordance with the Applicable Procedures by the Close of Business on the second (2nd) Business Day immediately preceding the Fundamental Change Repurchase Date, subject to extension to comply with applicable law; and

(iii) deliver such Notes to the Paying Agent (A) by book-entry transfer, if such Notes are Global Notes; or (B) by physical delivery, if such Notes are Physical Notes, in each case, together with any endorsements or other documents reasonably requested by the Paying Agent, the Trustee or the Company.

(b) *Contents of Fundamental Change Repurchase Notice.* The Fundamental Change Repurchase Notice for any Note must state:

(i) if such Note is to be repurchased in part, the portion of the principal amount of such Note to be repurchased, which principal amount must equal an Authorized Denomination;

(ii) that such Note will be repurchased by the Company pursuant to the provisions of this Article 3; and

(iii) if such Note is a Physical Note, the certificate number of such Note.

If the Notes to be repurchased are Global Notes, the Fundamental Change Repurchase Notice for such Notes must comply with the Applicable Procedures.

(c) *Notice to Company.* If any Holder validly delivers to the Paying Agent a Fundamental Change Repurchase Notice with respect to a Note or any portion of a Note, the Paying Agent will promptly deliver to the Company a copy of such Fundamental Change Repurchase Notice.

(d) *Effect of Improper Notice.* Unless and until the Paying Agent receives a validly endorsed and delivered Fundamental Change Repurchase Notice with respect to a Note, together with such Note, in a form that conforms in all material aspects with the description contained in such Fundamental Change Repurchase Notice, the Holder submitting the Notes will not be entitled to receive the Fundamental Change Repurchase Price for such Note.

Section 3.04 *Withdrawal of Fundamental Change Repurchase Notice(a)* .

(a) *General.* After a Holder delivers a Fundamental Change Repurchase Notice with respect to a Note, such Holder may withdraw such Fundamental Change Repurchase Notice (in whole or in part) with respect to such Note or any portion of such Note in principal amount equal to an Authorized Denomination by delivering to the Paying Agent a written notice of withdrawal prior to the Close of Business on the second (2nd) Business Day immediately preceding the Fundamental Change Repurchase Date to the Paying Agent. Any such withdrawal notice must state:

(A) the principal amount of the Notes with respect to which such notice of withdrawal pertains, which must equal an Authorized Denomination;

(B) the principal amount of the Notes, if any, that remains subject to the Fundamental Change Repurchase Notice, which principal amount must equal an Authorized Denomination; and

(C) if the Notes subject to such Fundamental Change Repurchase Notice are Physical Notes, the certificate numbers of the Notes to be withdrawn.

If the Notes to be withdrawn are Global Notes, a Holder must deliver its notice of withdrawal in compliance with the Applicable Procedures.

(b) *Return of Note.* Upon receipt of a validly delivered withdrawal notice, the Paying Agent will promptly (i) if such notice pertains to a Physical Note or a portion of a Physical Note, return such Note or portion of a Note to such Holder, in the amount specified in such withdrawal notice; and, (ii) if such notice pertains to a beneficial interest in a Global Note, in compliance with the Applicable Procedures, deem to be cancelled any instructions for book-entry transfer of such beneficial interest, in the amount specified in such withdrawal notice.

(c) *Notice to Company.* If any Holder validly delivers to the Paying Agent a notice of withdrawal with respect to a Note or any portion of a Note, the Paying Agent will promptly deliver to the Company a copy of such notice of withdrawal.

Section 3.05 *Effect of Fundamental Change Repurchase Notice(d)* .

(a) *General.* If a Holder validly delivers to the Paying Agent a Fundamental Change Repurchase Notice (together with all necessary endorsements) with respect to a Note, such Holder may no longer convert such Note unless and until such Holder validly withdraws such Fundamental Change Repurchase Notice in accordance with Section 3.04 hereof.

(b) *Timing of Payment.* Upon the Paying Agent's receipt of (i) a valid Fundamental Change Repurchase Notice (together with all necessary endorsements); and (ii) the Notes to which such Fundamental Change Repurchase Notice pertains, the Holder of the Notes to which such Fundamental Change Repurchase Notice pertains will be entitled, except to the extent such Holder has validly withdrawn such Fundamental Change Repurchase Notice in accordance with Section 3.04 hereof, to receive the Fundamental Change Repurchase Price with respect to such Notes on the later of the following (subject to extension to comply with applicable law): (x) the Fundamental Change Repurchase Date; and (y)(A) if such Notes are Physical Notes, the date of delivery of such Notes to the Paying Agent, duly endorsed; or (B) if such Notes are Global Notes, the date of book-entry transfer of such Notes to the Paying Agent, or, if such later date is not a Business Day, the Business Day immediately following such later date.

(c) *Effect of Deposit.* If, as of 11:00 a.m., New York City time, on the Fundamental Change Repurchase Date for any Fundamental Change, the Company, in accordance with Section 3.08 hereof, has deposited with the Paying Agent money sufficient to pay the Fundamental Change Repurchase Price for every Note subject to a Fundamental Change Repurchase Notice validly delivered in accordance with Section 3.03 hereof and not validly withdrawn in accordance with Section 3.04 hereof, at the Close of Business on the Fundamental Change Repurchase Date:

(A) the Notes to be repurchased will cease to be outstanding and interest (except Default Interest) will cease to accrue on such Notes (whether or not book-entry transfer of such Notes is made or whether or not such Notes are delivered to the Paying Agent), except to the extent provided in the proviso to Section 3.01(b); and

(B) all other rights of the Holders of such Notes with respect to such Notes (other than the right to receive payment of the Fundamental Change Repurchase Price upon delivery or transfer of such Notes and any Defaulted Amounts or Default Interest with respect to the Notes, and other than as provided in the proviso to Section 3.01(b)) will terminate.

Section 3.06 *Notes Repurchased in Part.* If any Physical Note is to be repurchased only in part, the Holder must surrender such Note at the office of the Paying Agent, whereupon the Company, in accordance with Section 2.05 hereof, will promptly execute, and the Trustee, in accordance with Section 2.05 hereof, will promptly authenticate and deliver, to the surrendering Holder, a new Note or Notes of any authorized denomination or denominations equal to the portion of the principal amount of the Note so surrendered which is not repurchased. If any Global Note is repurchased in part, the Company will instruct the Trustee to decrease the principal amount of such Global Note by the principal amount repurchased. Any Notes that are repurchased or owned by the Company, whether or not in connection with a Fundamental Change, will be submitted to the Trustee for cancellation and will be duly retired by the Company.

Section 3.07 *Covenant to Comply With Securities Laws Upon Repurchase of Notes.* In connection with any repurchase offer pursuant to a Fundamental Change Repurchase Notice under this Article 3, the Company will, to the extent applicable, (i) comply with Rule 13e-4 and any other tender offer rules under the Exchange Act that may be applicable at the time of the offer to repurchase the Notes; (ii) file the related Schedule TO (or any successor schedule, form or report) or any other required schedule under the Exchange Act; and (iii) otherwise comply with any applicable United States federal and state securities laws so as to permit Holders to exercise their rights and obligations under Section 3.01 hereof in the time and in the manner specified in Sections 3.01 and 3.03 hereof.

Section 3.08 *Deposit of Fundamental Change Repurchase Price.* Prior to 11:00 a.m., New York City time, on the Fundamental Change Repurchase Date, the Company will deposit with the Trustee or with the Paying Agent (or, if the Company or a Subsidiary or an Affiliate of either of them is acting as the Paying Agent, will segregate and hold in trust as provided in Section 2.07 hereof) an amount of immediately available funds sufficient to pay the Fundamental Change Repurchase Price of all the Notes or portions thereof that the Company is required to repurchase on such Fundamental Change Repurchase Date.

Section 3.09 *Covenant Not to Repurchase Notes Upon Certain Events of Default.*

(a) *General.* Notwithstanding anything to the contrary in this Article 3, the Company will not purchase any Notes under this Article 3 if, as of the Fundamental Change Repurchase Date, the principal amount of the Notes has been accelerated, such acceleration has not been rescinded and such acceleration did not result from a Default that would be cured by the Company's payment of the Fundamental Change Repurchase Price.

(b) *Deemed Withdrawals.* If, on any Fundamental Change Repurchase Date, (i) a Fundamental Change Repurchase Notice for a Note has been validly tendered in accordance with Section 3.03 hereof and has not been validly withdrawn in accordance with Section 3.04 hereof; and (ii) pursuant to this Section 3.09, the Company is not permitted to purchase Notes, the Paying Agent, upon receipt of written notice from the Company stating that the Company, pursuant to this Section 3.09, is not permitted to purchase Notes, will deem such Fundamental Change Repurchase Notice withdrawn.

(c) *Return of Notes.* If a Holder tenders a Note for purchase pursuant to this Article 3 and, on the Fundamental Change Repurchase Date, pursuant to this Section 3.09, the Company is not permitted to purchase such Note, the Paying Agent will (i) if such Note is a Physical Note, return such Note to such Holder; and (ii) if such Note is held in book-entry form, in compliance with the Applicable Procedures, deem to be cancelled any instructions for book-entry transfer of such Note.

## ARTICLE 4

### COVENANTS

Section 4.01 *Payment of Notes.* The Company will pay or cause to be paid the principal of, Fundamental Change Repurchase Price for, and any accrued and unpaid interest (including, for the avoidance of doubt, any Additional Interest or Special Interest) on, the Notes on the dates and in the manner required under this Indenture. Any principal of, Fundamental Change Repurchase Price for, or interest on, a Note will be considered paid on the date due if the Paying Agent, if other than the Company or a Subsidiary thereof, holds, as of 11:00 a.m. New York City time on the due date, money deposited by the Company in immediately available funds and designated for, and sufficient to pay, such principal, Fundamental Change Repurchase Price or interest then due. To the extent lawful, the Company will also pay Default Interest on any Defaulted Amounts in accordance with Section 2.04 hereof.

Section 4.02 *144A Information* Whenever the Company is not subject to Section 13 or Section 15(d) of the Exchange Act, if any Notes or shares of Common Stock, if any, issuable upon the conversion of the Notes constitute “restricted securities” within the meaning of Rule 144, the Company will, upon the request of a Holder or beneficial owner of the Notes, or a holder or beneficial owner of the Common Stock, if any, issuable upon the conversion of the Notes, promptly furnish or cause to be furnished to the applicable Holder, beneficial owner, or any prospective purchaser designated by the applicable Holder or beneficial owner, of the Notes, or any holder, beneficial owner, or any prospective purchaser designated by the applicable holder or beneficial owner, of the Common Stock, as applicable, all of the information that a prospective purchaser of the Notes or the Common Stock, as applicable, is required to receive under Rule 144A(d)(4) of the Securities Act for the Notes or shares of Common Stock, as applicable, to be resold to such prospective purchaser pursuant to the exemption from registration provided by Rule 144A.

Section 4.03 *Reports.* The Company will deliver to Holders, with a copy to the Trustee, copies of all quarterly and annual reports that the Company is required to deliver to the SEC on Forms 10-Q and 10-K, respectively, and any other documents, information or other reports that the Company is required to file with the SEC under Sections 13 or 15(d) of the Exchange Act no later than the date that the Company is required to file such quarterly and annual reports, other documents, information or other reports with the SEC (after giving effect to any grace period provided by Rule 12b-25 under the Exchange Act). Any document filed by the Company with the SEC via the EDGAR system (or any successor thereto) will be deemed to be delivered to Holders and the Trustee at the time such document is filed via the EDGAR system (or such successor); provided, however, that the Trustee will have no responsibility whatsoever to determine whether the Company has made any filing via the EDGAR system (or any successor thereto). Notwithstanding anything to the contrary in the foregoing, nothing in this paragraph shall require the Company to deliver to any Holder or the Trustee any material for which the Company has sought and received, or is seeking and has not been denied, confidential treatment by the SEC. The Company will also comply with TIA § 314(a).

Delivery under this Section 4.03 of reports, information and documents to the Trustee is for informational purposes only, and the Trustee’s receipt thereof will not constitute constructive notice of any information contained therein or determinable from such information, including the Company’s compliance with any of its covenants hereunder (as to which the Trustee is entitled to rely exclusively on Officers’ Certificates).

Section 4.04 *Additional Interest.*

(a) *General.* Additional Interest will accrue on the Notes to the extent provided in the Registration Rights Agreement, and the Company's obligation to pay any such Additional Interest will be deemed to be obligations under this Indenture and the Notes with the same force and effect as if the relevant provisions of the Registration Rights Agreement were reproduced in this Indenture and the Notes.

(b) *Notice to Trustee.* If the Company is required to pay Additional Interest on any Note, then, no later than five (5) Business Days before the date on which such Additional Interest is scheduled to be paid, the Company will provide to the Trustee (and if the Trustee is not the Paying Agent, to the Paying Agent) an Officers' Certificate stating (i) that the Company is obligated to pay Additional Interest; (ii) the amount of such Additional Interest that the Company is required to and will pay; (iii) the scheduled date on which such Additional Interest will be paid to Holders; and (v) a direction that the Trustee (or, if the Trustee is not the Paying Agent, the Paying Agent) pay such Additional Interest, to the extent it receives funds from the Company to do so, on the scheduled payment date for such Additional Interest. The Trustee will not have any duty or responsibility to any Holder to determine whether any Additional Interest is payable or, if any Additional Interest is payable, the amount of such Additional Interest that is payable.

Section 4.05 *Compliance Certificate.*

(a) *Annual Compliance Certificate.* Within 90 days after the end of each fiscal year of the Company, beginning with the fiscal year ending on December 31, 2015, the Company will deliver to the Trustee an Officers' Certificate, which Officers' Certificate will state (i) that the Officers signing such Officers' Certificate have supervised a review of the activities of the Company and the Subsidiaries with a view to determining whether the Company has kept, observed, performed and fulfilled its obligations under this Indenture during the preceding fiscal year; and (ii) to the best knowledge of each of the Officers signing such Officers' Certificate, (A) whether the Company has kept, observed, performed and fulfilled each and every covenant contained in this Indenture and is not in default in the performance or observance of any of the terms, provisions and conditions of this Indenture (without regard to any period of grace or requirement of notice provided under this Indenture) or, if one or more Defaults or Events of Default have occurred, what events triggered such Defaults or Events of Default and what actions the Company is taking or proposes to take with respect to such Defaults or Events of Default; and (B) whether any event has occurred and remains in existence by reason of which any payment of the principal of, the Fundamental Change Repurchase Price for, or interest on, or any delivery of any of the consideration due upon conversion of, a Note is prohibited, and, if any such event has occurred and remains in existence, a description, in reasonable detail, of such event or events and what actions the Company is taking or proposes to take with respect to such event or events.

(b) *Certificate of Default or Event of Default.* Within five (5) Business Days after a Default or Event of Default occurs, the Company will deliver to the Trustee an Officers' Certificate describing such Default or Event of Default, its status and a description, in reasonable detail, of what action the Company is taking or proposes to take with respect to such Default or Event of Default.

Section 4.06 *Restriction on Purchases by the Company and by Affiliates of the Company.* Neither the Company nor any Subsidiary will purchase or otherwise acquire any Notes without immediately retiring and canceling such Notes. In addition, the Company will use commercially reasonable efforts to prevent any Affiliate of the Company from acquiring any Notes.

Section 4.07 *Corporate Existence.* Subject to Article 5 hereof, the Company will do or cause to be done all things necessary to preserve and keep in full force and effect:

(a) its corporate existence, and the corporate, partnership or other existence of each of the Subsidiaries, in accordance with the respective organizational documents (as the same may be amended from time to time) of the Company or any such Subsidiary; and

(b) the rights (charter and statutory), licenses and franchises of the Company and the Subsidiaries;

*provided, however,* that the Company will not be required to preserve or keep in full force and effect any such right, license or franchise, or the corporate, partnership or other existence of any of the Subsidiaries, if the Board of Directors determines that the preservation thereof is no longer desirable in the conduct of the business of the Company and the Subsidiaries, taken as a whole, and that the loss thereof is not adverse in any material respect to the Holders.

Section 4.08 *Par Value Limitation.*

The Company will not take any action that, after giving effect to any adjustment pursuant to Section 10.05 or 10.07, would result in the Conversion Price becoming less than the par value of one share of Common Stock. In addition, the Company will not engage in any transaction that would require an adjustment to the Conversion Rate pursuant to Section 10.06 that would cause the Conversion Price to be less than the par value of one share of Common Stock.

Section 4.09 *Stay, Extension and Usury Laws.* The Company covenants that, to the extent that it may lawfully do so, it will not at any time insist upon, plead, or in any manner whatsoever claim or take the benefit or advantage of, any stay, extension or usury law wherever enacted, now or at any time hereafter in force, that may affect the covenants or the performance of this Indenture; and the Company, to the extent that it may lawfully do so, hereby expressly waives all benefit or advantage of any such law, and covenants that it will not, by resort to any such law, hinder, delay or impede the execution of any power herein granted to the Trustee, but will instead suffer and permit the execution of every such power as though no such law has been enacted.



Section 4.10 *Further Instruments and Acts.* Upon request of the Trustee, the Company will execute and deliver such further instruments and do such further acts as may be reasonably necessary or proper to carry out more effectively the terms of this Indenture.

## ARTICLE 5

### CONSOLIDATION, MERGER AND SALE OF ASSETS

Section 5.01 *Company May Consolidate, Merge or Sell Its Assets Only on Certain Terms.* The Company will not (1) consolidate with or merge with or into; or (2) sell, lease or otherwise transfer all or substantially all of the consolidated assets of the Company and its Subsidiaries to, another Person (any such transaction, a “**Reorganization Event**”), unless:

(a) either:

(i) the Company is the surviving corporation; or

(ii) the resulting, surviving or transferee Person (if other than the Company) of such Reorganization Event (the “**Reorganization Successor Corporation**”):

(I) is a corporation organized and validly existing under the laws of the United States of America, any State thereof or the District of Columbia; and

(II) expressly assumes, by executing and delivering a supplemental indenture to the Trustee in accordance with Section 9.01 and subject to Section 9.04 hereof, all of the obligations of the Company under the Notes and this Indenture;

(b) immediately after giving effect to such Reorganization Event, no Default will have occurred and be continuing; and

(c) prior to the effective date of such Reorganization Event, the Company delivers to the Trustee an Officers’ Certificate and an Opinion of Counsel, each stating that:

(i) such Reorganization Event and such supplemental indenture comply with Section 5.01(a) hereof;

(ii) all conditions precedent to such Reorganization Event provided in this Indenture have been satisfied; and

(iii) such supplemental indenture, if any, constitutes the legal, valid and binding obligation of the Reorganization Successor Corporation (subject to customary limitations);

Section 5.02 *Successor Substituted.* If any Reorganization Event occurs that complies with Sections 5.01(a)(ii) and 5.01(b) hereof, and the Company has complied with Section 5.01(c) hereof:

(a) from and after the date of such Reorganization Event, the Reorganization Successor Corporation for such Reorganization Event will succeed to, and be substituted for, and may exercise every right and power of, the Company under this Indenture with the same effect as if such Reorganization Successor Corporation had been named as the Company herein; and

(b) except in the case of a Reorganization Event that is a conveyance, transfer or lease of all or substantially all of the Company's assets, the Person named as the "Company" in the first paragraph of this Indenture or any successor (other than such Reorganization Successor Corporation that will thereafter have become such in the manner prescribed in this Article 5) will be discharged from its obligations under the Notes and this Indenture and may be dissolved, wound up and liquidated at any time.

## ARTICLE 6

### DEFAULTS AND REMEDIES

#### Section 6.01 *Events of Default.*

(a) *General.* Each of the following events will be an "Event of Default":

(i) the Company fails to pay the principal of the Notes (including any Fundamental Change Repurchase Price) when due at maturity or upon repurchase upon a Fundamental Change or declaration of acceleration or otherwise;

(ii) the Company fails to pay any interest on the Notes when due and such failure continues for a period of thirty (30) days after the applicable due date;

(iii) the Company fails to give any Fundamental Change Notice or notice of a Make-Whole Fundamental Change, in each case, when due;

(iv) the Company fails to comply with its obligation to convert a Note in accordance with Article 10 hereof upon a Holder's exercise of its conversion rights with respect to such Note;

(v) the Company fails to comply with its obligations under Article 5 hereof;

(vi) the Company fails to perform or observe any of its covenants or warranties in this Indenture or in the Notes (other than a covenant or agreement specifically addressed in clauses (i) through (v) above) and such failure continues for a period of sixty (60) days after days after written notice to the Company by the Trustee or to the Company and the Trustee by the Holders of at least 25% in aggregate principal amount of the outstanding Notes;

(vii) the default by the Company or any Subsidiary with respect to any mortgage, agreement or other instrument under which there may be outstanding, or by which there may be secured or evidenced, any indebtedness for money borrowed by the Company and/or any Subsidiary in excess of one million dollars (\$1,000,000) in the aggregate, whether such indebtedness exists as of the Issue Date or is later created, if that default:

(A) results in such indebtedness becoming or being declared due and payable (prior to its express maturity); or

(B) constitutes a failure to pay the principal of, or interest on, such indebtedness when due and payable at its stated maturity, upon required repurchase, upon declaration of acceleration or otherwise, and after the expiration of any applicable grace period,

and, such acceleration shall not have been rescinded or annulled or such failure to pay shall not have been cured, as the case may be, within thirty (30) days after written notice to the Company by the Trustee or to the Company and the Trustee by the Holders of at least 25% in aggregate principal amount of the outstanding Notes;

(viii) a final judgment for the payment of in excess of one million dollars (\$1,000,000) (excluding any amounts covered by insurance) is rendered against the Company or any Subsidiary, and such judgment is not discharged or stayed within sixty (60) days after (i) the date on which all rights to appeal such judgment have expired if no appeal has commenced; or (ii) the date on which all rights to appeal have been extinguished;

(ix) the Company or any Significant Subsidiary, pursuant to or within the meaning of any Bankruptcy Law:

(A) commences a voluntary case;

(B) consents to the entry of an order for relief against it in an involuntary case;

(C) consents to the appointment of a Custodian of it or for any substantial part of its property;

(D) makes a general assignment for the benefit of its creditors;

(E) takes any comparable action under any foreign laws relating to insolvency; or

(F) generally is not paying its debts as they become due; or

(x) a court of competent jurisdiction enters an order or decree under any Bankruptcy Law that:

(A) is for relief against Company or any Significant Subsidiary in an involuntary case or proceeding;

(B) appoints a Custodian of the Company or any Significant Subsidiary, or for any substantial part of the property of the Company or any Significant Subsidiary;

(C) orders the winding up or liquidation of the Company or any Significant Subsidiary; or

(D) grants any similar relief under any foreign laws,

and, in each such case, the order or decree remains unstayed and in effect for sixty (60) days.

(b) *Cause Irrelevant.* Each of the events enumerated in Section 6.01(a) hereof will constitute an Event of Default whatever the cause and regardless of whether voluntary or involuntary or effected by operation of law or pursuant to any judgment, decree or order of any court or any order, rule or regulation of any administrative or governmental body.

Section 6.02 *Acceleration.*

(a) *Automatic Acceleration in Certain Circumstances.* If an Event of Default specified in Sections 6.01(a)(ix) or 6.01(a)(x) hereof occurs with respect to the Company, the principal amount of, and all accrued and unpaid interest, if any, on, all of the then outstanding Notes will immediately become due and payable without any further action or notice by any party.

(b) *Optional Acceleration.* If any Event of Default other than an Event of Default specified in Section 6.01(a)(ix) or 6.01(a)(x) occurs and is continuing, the Trustee, by delivering a written notice to the Company, or the Holders of at least 25% in aggregate principal amount of the Notes then outstanding, by delivering a written notice to the Company with a copy to the Trustee, may declare the principal amount of, and all accrued and unpaid interest, if any, on all then outstanding Notes immediately due and payable, and upon such declaration, the principal amount of, and all accrued and unpaid interest, if any, on all then outstanding Notes will immediately become due and payable.

(c) *Rescission of Acceleration.* Notwithstanding anything to the contrary in this Indenture, the Holders of a majority of the aggregate principal amount of the then outstanding Notes may, on behalf of the Holders of all of the then outstanding Notes, rescind any acceleration of the Notes and its consequences hereunder by delivering written notice to the Trustee if (i) such rescission would not conflict with any judgment or decree of a court of competent jurisdiction; and (ii) all existing Events of Default (other than the nonpayment of the principal of, interest, if any, on, or the Fundamental Change Repurchase Price for, the Notes that has become due solely as a result of acceleration) have been cured or waived. No such rescission will affect any subsequent Default or impair any right consequent thereto.

Section 6.03 *Other Remedies.* If an Event of Default occurs and is continuing, the Trustee may pursue any available remedy to collect the payment of principal, accrued and unpaid interest, if any, or payment of the Fundamental Change Repurchase Price for, the Notes or to enforce the performance of any provision of the Notes or this Indenture regarding any other matter.

The Trustee may maintain a proceeding even if it does not possess any of the Notes or does not produce any of the Notes in the proceeding. A delay or omission by the Trustee or any Holder in exercising any right or remedy accruing upon an Event of Default will not impair the right or remedy or constitute a waiver of or acquiescence in the Event of Default. No remedy is exclusive of any other remedy. All available remedies are cumulative.

Section 6.04 *Sole Remedy for Failure to Report.*

(a) *General.* Notwithstanding anything to the contrary in the Notes or in this Indenture, the Company may elect that the sole remedy for any Event of Default specified in Section 6.01(a)(vi) hereof relating to the Company's failure to comply with Section 4.03 hereof (a "**Reporting Event of Default**") will, for the period beginning on the date on which such Reporting Event of Default first occurred and ending on the earlier of (A) the date on which such Reporting Event of Default (i) is cured; or (ii) is validly waived in accordance with Section 6.05 hereof; and (B) the sixtieth (60th) calendar day immediately following the date on which such Reporting Event of Default first occurred, consist exclusively of the right to receive additional interest (the "**Special Interest**") on the Notes at a rate equal to 0.50% per annum on the principal amount of the outstanding Notes. Any Special Interest will be payable in the same manner and on the same dates as the stated interest payable on the Notes and will accrue in addition to any Additional Interest that the Company is obligated to pay. The Trustee will not have any duty or responsibility to any Holder to determine whether the Special Interest is payable, or, if the Special Interest is payable, the amount of such Special Interest that is payable.

(b) *Limitation on Remedy.* If (i) a Reporting Event of Default occurs and the Company elects that the sole remedy with respect to such Reporting Event of Default will be the Special Interest; and (ii) on the sixty first (61st) day immediately following, and including, the date on which such Reporting Event of Default first occurred, such Reporting Event of Default has not been cured or validly waived in accordance with Section 6.05 hereof, then the Notes will become subject to acceleration under Section 6.02(a) hereof on account of such Reporting Event of Default. For the avoidance of doubt, Special Interest will cease to accrue from such sixty first (61st) day, without limiting the generality of this Section 6.04 as it may apply to any subsequent Reporting Event of Default.

(c) *Company Election Notice.* To elect to pay the Special Interest as the sole remedy for a Reporting Event of Default, the Company must deliver written notice of such election to the Holders, the Paying Agent and the Trustee prior to the date on which such Reporting Event of Default first occurs. Any such notice must include a brief description of the report that the Company failed, or will fail, to file, a statement that the Company is electing to pay the Special Interest and the date on which such Reporting Event of Default will occur.

If a Reporting Event of Default occurs and the Company fails to timely deliver such notice for such Reporting Event of Default or fails to pay the Special Interest, the Notes will be subject to acceleration under Section 6.02(a) hereof on account of such Reporting Event of Default.

(d) *Other Events of Default.* Notwithstanding anything to the contrary herein, if the Company elects to pay Special Interest with respect to any Reporting Event of Default, the Company's election will not affect the rights of any Holder with respect to any other Event of Default, including with respect to any other Reporting Event of Default; *provided*, that, for the avoidance of doubt, in no event will the Company be obligated to pay Special Interest at a rate greater than 0.50% per annum on the principal amount of then outstanding Notes.

Section 6.05 *Waiver of Past Defaults.* *If an Event of Default described in Sections 6.01(a)(i), 6.01(a)(ii), 6.01(a)(iv) or 6.01(a)(vi) (which, in the case of Section 6.01(a)(vi) only, relates to a covenant that cannot be amended without the consent of each affected Holder) or a Default that would lead to such an Event of Default occurs and is continuing, such Event of Default or Default may be waived only with the consent of each affected Holder. Every other Event of Default or Default may be waived by the Holders of a majority of the aggregate principal amount of then outstanding Notes (including consents obtained in connection with a repurchase of, or tender offer or exchange offer for, Notes). Whenever any Event of Default is so waived, it will cease to exist, and whenever any Default is so waived, it will be deemed cured and any Event of Default arising therefrom will be deemed not to occur. However, no such waiver will extend to any subsequent or other Default or Event of Default or impair any consequent right. This Section 6.05 will apply in lieu of TIA § 316(a)(1)(B), which, as permitted by TIA § 316(a)(1), is hereby expressly excluded from this Indenture.*

Section 6.06 *Control by Majority.* *At any time, the Holders of a majority of the aggregate principal amount of then outstanding Notes may direct the time, method and place of conducting any proceedings for any remedy available to the Trustee or for exercising any trust or power conferred on the Trustee. However, the Trustee may refuse to follow any direction that conflicts with law or this Indenture or, subject to Section 7.01 hereof, that the Trustee determines to be unduly prejudicial to the rights of a Holder or to the Trustee, or that would potentially involve the Trustee in personal liability unless the Trustee is offered indemnity or security satisfactory to it against any loss, liability or expense to the Trustee that may result from the Trustee's instituting such proceeding as the Trustee. Prior to taking any action hereunder, the Trustee will be entitled to indemnification satisfactory to it against all losses and expenses caused by taking or not taking such action. This Section 6.06 will apply in lieu of TIA § 316(a)(1)(A), which, as permitted by TIA § 316(a)(1), is hereby expressly excluded from this Indenture.*

Section 6.07 *Limitation on Suits.* *Except to enforce (i) its rights to receive the principal of, the Fundamental Change Repurchase Price for, or interest, if any, on, a Note; or (ii) the failure of the Company to comply with its obligations under Article 10 to convert any Note, no Holder may pursue a remedy with respect to this Indenture or the Notes unless:*

(a) such Holder has previously delivered to the Trustee written notice that an Event of Default has occurred and is continuing;

(b) the Holders of at least 25% of the aggregate principal amount of then-outstanding Notes deliver to the Trustee a written request that the Trustee pursue a remedy with respect to such Event of Default;

(c) such Holder or Holders have offered and provided to the Trustee security or indemnity satisfactory to the Trustee against any loss, liability or other expense of compliance with such written request;

(d) the Trustee has not complied with such written request within sixty (60) days after receipt of such written request and offer of security or indemnity; and

(e) during such sixty (60) day period, the Holders of a majority of the aggregate principal amount of then outstanding Notes did not deliver to the Trustee a direction inconsistent with such written request.

A Holder may not use this Indenture to prejudice the rights of any other Holder or to obtain a preference or priority over any other Holder, it being understood that the Trustee does not have any affirmative duty to ascertain whether any usage of this Indenture by a Holder is unduly prejudicial to such other Holders.

Section 6.08 *Rights of Holders To Receive Payment. Notwithstanding any other provision of this Indenture, the right of any Holder to receive payment of the principal of, the Fundamental Change Repurchase Price for, accrued and unpaid interest, if any, on, and any consideration due under Article 10 upon conversion of, its Note, on or after the respective due dates therefor as provided herein, or to bring suit for the enforcement of any such payment and/or delivery on or after such respective due dates, will not be impaired or affected without the consent of such Holder and will not be subject to the requirements of Section 6.07 hereof.*

Section 6.09 *Collection Suit by Trustee. If an Event of Default specified in Sections 6.01(a)(i), 6.01(a)(ii) or 6.01(a)(iv) hereof occurs and is continuing, the Trustee is authorized to recover judgment in its own name and as trustee of an express trust against the Company for the whole amount of principal of, the Fundamental Change Repurchase Price for, interest, if any, on, and the Conversion Consideration, if any, due upon conversion of, the Notes, and, to the extent lawful, any Default Interest on any Defaulted Amounts, and such further amount as is sufficient to cover the costs and expenses of collection provided for under Section 7.07 hereof.*

Section 6.10 *Trustee May File Proofs of Claim. The Trustee is authorized to file such proofs of claim and other papers or documents as may be necessary or advisable to have the claims of the Trustee and the Holders allowed in any judicial proceedings relative to the Company, its creditors or its property and, unless prohibited by law or applicable regulations, will be entitled to collect, receive and distribute any money or other property payable or deliverable on any such claims, and any Custodian in any such judicial proceeding is hereby authorized by each Holder to make such payments to the Trustee, and in the event that the Trustee consents to the making of such payments directly to the Holders, to pay to the Trustee any amount due to it for the reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and counsel, and any other amounts due the Trustee under Section 7.07 hereof. To the extent that the payment of any such compensation, expenses, disbursements and advances of the Trustee, its agents and counsel, and any other amounts due the Trustee under Section 7.07 hereof out of the estate in any such proceeding, will be denied for any reason, payment of the same will be secured by a lien on, and will be paid out of, any and all distributions, dividends, money, securities and other properties that the Holders may be entitled to receive in such proceeding whether in liquidation or under any plan of reorganization or arrangement or otherwise. Nothing herein contained will be deemed to authorize the Trustee to authorize or consent to, or to accept or to adopt on behalf of any Holder, any plan of reorganization, arrangement, adjustment or composition affecting the Notes or the rights of any Holder, or to authorize the Trustee to vote in respect of the claim of any Holder in any such proceeding.*

Section 6.11 *Priorities. If the Trustee collects any money or property pursuant to this Article 6, it will pay out the money or property in the following order:*

FIRST: to the Trustee, its agents and attorneys for amounts due under Section 7.07 hereof, including payment of all fees, compensation, expenses and liabilities incurred, and all advances made, by the Trustee and the costs and expenses of collection;

SECOND: to the Holders, for any amounts due and unpaid on the principal of, the Fundamental Change Repurchase Price for, accrued and unpaid interest on, and any Conversion Consideration due upon the conversion of, any Note, without preference or priority of any kind, according to such amounts due and payable on all of the Notes; and

THIRD: the balance, if any, to the Company or to such other party as a court of competent jurisdiction directs.

The Trustee may fix a record date and payment date for any payment to the Holders pursuant to this Section 6.11. If the Trustee so fixes a record date and a payment date, at least 15 days prior to such record date, the Company will deliver to each Holder and the Trustee a written notice, which notice will state such record date, such payment date and the amount of such payment.

Section 6.12 *Undertaking for Costs. In any suit for the enforcement of any right or remedy under this Indenture or in any suit against the Trustee for any action taken or omitted by it as Trustee, a court in its discretion may require the filing by any party litigant in the suit of an undertaking to pay the costs of the suit, and the court in its discretion may assess reasonable costs, including reasonable attorneys' fees and expenses, against any party litigant in the suit, having due regard to the merits and good faith of the claims or defenses made by the party litigant. This Section 6.12 does not apply to a suit by the Trustee, a suit by a Holder pursuant to Section 6.08 hereof or a suit by Holders of more than 10% in aggregate principal amount of the then outstanding Notes.*

## ARTICLE 7

### TRUSTEE

Section 7.01 *Duties of Trustee.*

(a) If an Event of Default has occurred and is continuing, the Trustee will exercise the rights and powers vested in it by this Indenture, and use the same degree of care and skill in its exercise as a prudent Person would exercise or use under the circumstances in the conduct of such Person's own affairs.



(b) Except during the continuance of an Event of Default:

(i) the Trustee undertakes to perform such duties, and only such duties, as are specifically set forth in this Indenture, and no implied covenants or obligations will be read into this Indenture against the Trustee; and

(ii) in the absence of bad faith on its part, the Trustee may conclusively rely upon certificates or opinions furnished to the Trustee and conforming to the requirements of this Indenture.

(c) The Trustee may not be relieved from liabilities for its own negligent action, its own negligent failure to act, or its own willful misconduct, except that:

(i) this paragraph does not limit the effect of Section 7.01(b) hereof;

(ii) the Trustee will not be liable for any error of judgment made in good faith by a Trust Officer unless it is proved that the Trustee was negligent in ascertaining the pertinent facts; and

(iii) the Trustee will not be liable with respect to any action it takes or omits to take in good faith in accordance with a direction received by it pursuant to Sections 6.06, 12.04 or 12.05 hereof.

(d) Whether herein expressly so provided, every provision of this Indenture that in any way relates to the Trustee is subject to this Section 7.01.

(e) The Trustee will not be liable for interest on any money received by it or risk or expend any of its own funds.

(f) Money held in trust by the Trustee need not be segregated from other funds except to the extent required by law.

(g) No provision of this Indenture will require the Trustee to expend or risk its own funds or otherwise incur financial liability in the performance of any of its duties hereunder or in the exercise of any of its rights or powers.

(h) Every provision of this Indenture relating to the conduct or affecting the liability of or affording protection to the Trustee will be subject to the provisions of this Article 7, and the provisions of this Article 7 will apply to the Trustee, Registrar, Paying Agent and Conversion Agent.

(i) The Trustee will not be deemed to have notice of a Default or an Event of Default unless (i) a Trust Officer of the Trustee has received written notice at its Corporate Trust Office thereof from the Company or any Holder; or (ii) a Trust Officer has actual knowledge thereof.

Section 7.02 *Rights of Trustee.*

(a) The Trustee may conclusively rely upon any document believed by it to be genuine and to have been signed or presented by the proper person. The Trustee need not investigate any fact or matter stated in the document. The Trustee may, however, in its discretion make such further inquiry or investigation into such facts or matters as it may see fit and, if the Trustee determines to make such further inquiry or investigation, it will be entitled to examine the books, records and premises of the Company, personally or by agent or attorney and at the expense of the Company, and will incur no liability of any kind by reason of such inquiry or investigation.

(b) Before the Trustee acts or refrains from acting, it may require an Officers' Certificate or an Opinion of Counsel or both. The Trustee will not be liable for any action it takes or omits to take in good faith in reliance on the Officers' Certificate or Opinion of Counsel.

(c) The Trustee may act through agents, attorneys or custodians and will not be responsible for the misconduct or negligence of any agent, attorney or custodian appointed with due care.

(d) So long as the Trustee's conduct does not constitute willful misconduct or negligence, the Trustee will not be liable for any action it takes or omits to take in good faith that it believes to be authorized or within the rights or powers conferred upon it by this Indenture.

(e) The Trustee may consult with counsel of its own selection, and the advice or Opinion of Counsel with respect to legal matters relating to this Indenture and the Notes will be full and complete authorization and protection from liability in respect to any action taken, omitted or suffered by it hereunder in good faith and in reliance upon the advice or opinion of such counsel.

(f) The permissive rights of the Trustee to do things enumerated in this Indenture will not be construed as a duty unless so specified herein.

(g) The Trustee will be under no obligation to exercise any of the rights or powers vested in it by this Indenture at the request or direction of any of the Holders pursuant to this Indenture, unless such Holders have offered to the Trustee security or indemnity satisfactory to the Trustee against the costs, expenses and liabilities that might be incurred by it in compliance with such request or direction.

(h) The Trustee shall not be required to give any bond or surety in respect of the performance of its powers or duties hereunder.

(i) The rights, privileges, protections, immunities and benefits given to the Trustee, including its right to be indemnified, are extended to, and will be enforceable by, the Trustee in each of its capacities hereunder, and each agent, custodian and other Person employed to act hereunder, including the Registrar, Paying Agent and Conversion Agent.

(j) The Trustee may request that the Company deliver an Officers' Certificate setting forth the names of individuals and/or titles of officers authorized at such time to take specified actions pursuant to this Indenture, which Officers' Certificate may be signed by any Person authorized to sign an Officers' Certificate, including any Person specified as so authorized in any such certificate previously delivered and not superseded.

(k) In no event will the Trustee be responsible or liable for any special, indirect, punitive or consequential loss or damage of any kind whatsoever (including, but not limited to, loss of profit) irrespective of whether the Trustee has been advised of the likelihood of such loss or damage and regardless of the form of action.

Section 7.03 Individual Rights of Trustee. The Trustee in its individual or any other capacity may become the owner or pledgee of Notes and may otherwise deal with the Company or its Affiliates with the same rights it would have if it were not Trustee. However, if the Trustee acquires any conflicting interest (within the meaning of TIA § 310) it must eliminate the conflict within 90 days or resign. Any Paying Agent, Registrar, Conversion Agent or co-registrar may do the same with like rights. However, the Trustee must comply with Section 7.10 hereof.

Section 7.04 Trustee's Disclaimer. The Trustee will not be responsible for and makes no representation as to the validity, priority or adequacy of this Indenture or the Notes, it will not be accountable for the Company's use of the proceeds from the Notes, and it will not be responsible for any statement of the Company in this Indenture or in any document issued in connection with the sale of the Notes or in the Notes other than the Trustee's certificate of authentication.

Section 7.05 Notice of Defaults. If a Default occurs and is continuing and is actually known to a Trust Officer, the Trustee will send to each Holder notice of the Default within ninety (90) days after such Default first occurs, or, if it is not known to the Trustee at such time, promptly (and in any event within ten (10) Business Days) after it is known to a Trust Officer; *provided, however*, that except in the case of a Default that is, or would lead to, an Event of Default described in Section 6.01(a)(i), Section 6.01(a)(ii) or Section 6.01(a)(iv), the Trustee may withhold the notice if and so long as it determines in good faith that withholding the notice is in the interests of Holders.

Section 7.06 Reports by Trustee to the Holders. If required by TIA § 313(a), the Trustee will, within sixty (60) days after each June 30 following the Issue Date, mail to each Holder (and each other Person specified in TIA § 313(c)), and file as required by TIA §313(d), a brief report dated as of such June 30 that complies with TIA § 313(a). The Trustee will also comply with TIA § 313(b). The Trustee will simultaneously send a copy of each such report to the Company. The Company will promptly notify the Trustee of the listing or delisting of the Notes on or from any stock exchange.

Section 7.07 *Compensation and Indemnity.*

(a) The Company will pay to the Trustee, from time to time, such compensation as will be agreed upon, from time to time, in writing for its services. The Trustee's compensation will not be limited by any law on compensation of a trustee of an express trust. The Company will reimburse the Trustee upon request for all reasonable fees and expenses incurred or made by it, including costs of collection, in addition to the compensation for its services. Such expenses will include the reasonable compensation, fees and out-of-pocket expenses, disbursements and advances of the Trustee's agents, counsel, accountants and experts. The Company will fully indemnify the Trustee and hold it harmless against any and all loss, liability, claims (including those between the parties to this Indenture), damages or expenses (including reasonable attorneys' fees and expenses) incurred by it in connection with the acceptance and administration of this trust and the performance of its duties hereunder, including the costs and expenses of defending itself against any claim (whether asserted by or against the Company, any Holder or any other Person). The Trustee will notify the Company promptly of any claim for which it may seek indemnity. Failure by the Trustee to so notify the Company of any claim for which it may seek indemnity of which a Trust Officer has actually received written notice will not relieve the Company of its obligations hereunder except to the extent such failure is adjudicated by a court of competent jurisdiction to have materially prejudiced the Company. Except for claims involving the Company, the Company will defend the claim and the Trustee will cooperate in the defense. The Trustee may have one separate counsel, and the Company will pay the fees and expenses of such counsel. The Company will pay the reasonable fees and expenses of counsel to the Trustee incurred in evaluating whether such defense and/or conflict exists. The Company need not reimburse any expense or indemnify against any loss, liability or expense incurred by the Trustee through the Trustee's own willful misconduct or gross negligence. The Company need not pay for any settlement made by the Trustee without the Company's consent, such consent not to be unreasonably withheld. All indemnifications and releases from liability granted hereunder to the Trustee will extend to its officers, directors, employees, agents, attorneys, custodians, successors and assigns. In no event shall the Company have the right, without the related Trustee's written consent, to settle any such claim if such settlement (i) arises from or is part of any criminal action, suit or proceeding; (ii) contains a stipulation to, confession of judgment with respect to, or admission or acknowledgement of, any liability or wrongdoing on the part of such the Trustee; (iii) provides for injunctive relief or specific performance on the part of the Trustee or any other relief other than monetary damages payable in full by the Company; or (iv) does not contain an unconditional release of the Trustee from all liability on all claims that are the subject matter of the related dispute or proceeding.

(b) To secure the Company's payment obligations under this Section 7.07, the Trustee will have a lien prior to the Notes on all money or property held or collected by the Trustee, other than money or property held in trust to pay the principal, accrued and unpaid interest, if any, or payment of the Fundamental Change Repurchase Price for any Notes.

(c) The Company's payment obligations pursuant to this Section 7.07 will survive the resignation or removal of the Trustee and the discharge of this Indenture. If the Trustee incurs expenses after the occurrence of a Default specified in Sections 6.01(a)(ix) or 6.01(a)(x) hereof with respect to the Company, the expenses are intended to constitute expenses of administration under the Bankruptcy Law.

#### Section 7.08 *Replacement of Trustee.*

(a) Subject to this Section 7.08, the Trustee may resign at any time by notifying the Company, in writing. The Holders of a majority in aggregate principal amount of then outstanding Notes may remove the Trustee by notifying the Trustee, in writing. The Company may remove the Trustee if:

- (i) the Trustee fails to comply with Section 7.10 hereof;
- (ii) the Trustee is adjudged bankrupt or insolvent;
- (iii) a receiver or other public officer takes charge of the Trustee or its property; or
- (iv) the Trustee otherwise becomes incapable of acting.

(b) If the Trustee resigns, is removed by the Company or by the Holders of a majority in aggregate principal amount of the Notes then outstanding, or if a vacancy exists in the office of Trustee for any reason (the Trustee in such event being referred to herein as the retiring Trustee), the Company will promptly appoint a successor Trustee.

(c) A successor Trustee will deliver a written acceptance of its appointment to the retiring Trustee and to the Company. Thereupon, the resignation or removal of the retiring Trustee will become effective, and the successor Trustee will have all the rights, powers and duties of the Trustee under this Indenture. The successor Trustee will send a notice of its succession to Holders. The retiring Trustee will, upon payment of all of its costs and the costs of its agents and counsel, promptly transfer all property held by it as Trustee to the successor Trustee, subject to the lien provided for in Section 7.07 hereof.

(d) If a successor Trustee does not take office within sixty (60) days after the retiring Trustee resigns or is removed, the retiring Trustee, the Company or the Holders of at least 10% of the aggregate principal amount of the Notes then outstanding may petition, at the expense of the Company, any court of competent jurisdiction for the appointment of a successor Trustee.

(e) If the Trustee, after written request by any Holder, fails to comply with Section 7.10 hereof, such Holder may petition any court of competent jurisdiction for the removal of the Trustee and the appointment of a successor Trustee.

(f) Notwithstanding the replacement of the Trustee pursuant to this Section 7.08, the Company's obligations under Section 7.07 hereof will continue for the benefit of the retiring Trustee.

Section 7.09 *Successor Trustee by Merger.*

(a) If the Trustee consolidates with, merges or converts into, or transfers all or substantially all its corporate trust business or assets to, another corporation or banking association, the resulting, surviving or transferee corporation or banking association without any further act will be the successor Trustee.

(b) In case at the time such successor or successors by merger, conversion or consolidation to the Trustee succeeds to the trusts created by this Indenture, any of the Notes have been authenticated, but not delivered, any such successor to the Trustee may adopt the certificate of authentication of any predecessor Trustee, and deliver such Notes so authenticated; and, in case at that time any of the Notes have not been authenticated, any such successor to the Trustee may authenticate such Notes, either in the name of any predecessor Trustee hereunder or in the name of the successor to the Trustee.

Section 7.10 *Eligibility; Disqualification.* The Trustee will have (or, in the case of a corporation included in a bank holding company system, the related bank holding company will have) a combined capital and surplus of at least \$100,000,000, as set forth in its (or its related bank holding company's) most recent published annual report of condition. The Trustee will also comply with TIA § 310(b). Nothing in this Indenture will prevent the Trustee from filing with the SEC any application referred to in the penultimate paragraph of TIA § 310(b).

Section 7.11 *Trustee's Application for Instructions from the Company.* Any application by the Trustee for written instructions from the Company may, at the option of the Trustee, set forth in writing any action proposed to be taken or omitted by the Trustee under this Indenture and the date on and/or after which such action will be taken or such omission will be effective. The Trustee will not be liable to the Company for any action taken by, or omission of, the Trustee in accordance with a proposal included in such application on or after the date specified in such application (which date will not be less than three Business Days after the date the Company is deemed to have received such application pursuant to Section 12.02 hereof, unless any such Officer has consented in writing to any earlier date), unless prior to taking any such action (or the effective date in the case of any omission), the Trustee has received written instructions in response to such application specifying the action to be taken or omitted.

Section 7.12 *Preferential Collection of Claims Against the Company.* The Trustee will comply with TIA § 311(a), excluding any creditor relationship set forth in TIA § 311(b). A Trustee who has resigned or been removed will be subject to TIA § 311(a) to the extent set forth therein.

## **ARTICLE 8**

### **SATISFACTION AND DISCHARGE**

Section 8.01 *Discharge of Liability on Notes.* When (a)(i) the Company delivers to the Trustee all outstanding Notes (other than Notes replaced pursuant to Section 2.11 hereof) for cancellation; or (ii) all outstanding Notes have become due and payable, and the Company irrevocably deposits with the Trustee or delivers to the Holders, as applicable, cash (or, solely to satisfy amounts due and owing as a result of conversions of the Notes, Conversion Consideration), sufficient to pay all amounts due and owing on all outstanding Notes (other than Notes replaced pursuant to Section 2.11 hereof); (b) the Company pays all other sums payable by it under this Indenture; and (c) the Company delivers to the Trustee an Officers' Certificate and an Opinion of Counsel, each stating that all of the applicable conditions precedent to the discharge of this Indenture described in this section have been satisfied, then, subject to Section 7.07 hereof, this Indenture will cease to be of further effect with respect to the Notes and the Holders and the Trustee will acknowledge the satisfaction and discharge of this Indenture with respect to the Notes.

Notwithstanding the satisfaction and discharge of this Indenture, (i) any obligation of the Company to any Holder under Article 10 hereof with respect to the conversion of any Note or to the Trustee under Article 7 hereof with respect to compensation or indemnity; and (ii) any obligation of the Trustee with respect to money deposited with the Trustee under this Article 8 and Section 12.02 hereof will survive.

Section 8.02 *Repayment to the Company.* Subject to any applicable unclaimed property law, the Trustee and the Paying Agent, upon receiving a written request from the Company, will promptly turn over to the Company any cash, Conversion Consideration or other property held for payment on the Notes that remains unclaimed two years after the date on which such payment was due. After the Trustee and the Paying Agent return such cash, Conversion Consideration or other property to the Company, the Trustee and the Paying Agent will have no further liability to any Holder with respect to such cash, Conversion Consideration or other property, and any Holder entitled to the payment of such cash, Conversion Consideration or other property under the Notes or this Indenture must look to the Company for payment as a general creditor of the Company.

**ARTICLE 9**  
**AMENDMENTS, SUPPLEMENTS AND WAIVERS**

Section 9.01 *Without Consent of Holders.* The Company and the Trustee may amend or supplement this Indenture or the Notes without the consent of any Holder to:

- (a) add guarantees with respect to the Company's obligations under this Indenture or the Notes;
- (b) secure the Notes;
- (c) provide for the assumption of the Company's obligations under this Indenture and under the Notes by a Reorganization Successor Corporation as set forth in Article 5 hereof;
- (d) provide for the assumption of the Company's obligations under this Indenture and under the Notes by a Successor Person as set forth in Section 10.08 hereof or to modify the conversion rights of the Holders in accordance with Section 10.08 hereof upon the occurrence of a Common Stock Change Event;
- (e) surrender any right or power conferred upon the Company under this Indenture;
- (f) add to the Company's covenants or Events of Default for the benefit of the Holders;
- (g) cure any ambiguity or correct any inconsistency or defect in this Indenture or in the Notes;
- (h) make or change any provisions with respect to questions arising under this Indenture, *provided* that such action, individually or in the aggregate with all other such actions, shall not adversely affect the rights and interests of the Holders in any material respect, as determined in good faith by the Board of Directors and evidenced by resolutions of the Board of Directors;

(i) make any amendment to the provisions of this Indenture relating to the transfer and legending of the Notes as permitted by this Indenture, including to facilitate the issuance and administration of Notes; *provided, however*, that (i) compliance with this Indenture as so amended would not result in Notes being transferred in violation of the Securities Act or any applicable securities law; and (ii) such amendment, individually or in the aggregate with all other such amendments, does not adversely affect the rights and interests of the Holders to transfer Notes in any material respect;

(j) provide for or confirm the issuance of additional Notes in accordance with this Indenture;

(k) enter into supplemental indentures hereto in connection with a Common Stock Change Event pursuant to Section 10.08(a);

(l) comply with any requirement of the SEC in connection with any qualification of this Indenture or any supplemental indenture under the TIA as then in effect;

(m) evidence the acceptance of appointment by a successor Trustee with respect to this Indenture;

(n) comply with the rules of any applicable Depositary;

(o) conform the provisions of this Indenture and the form or terms of the Notes to the "Description of Notes" section of the Preliminary Offering Memorandum, as supplemented by the Pricing Term Sheet; or

(p) to make any other change to this Indenture and the form or terms of the Notes; *provided* that no such change individually, or in the aggregate with all other such changes, shall adversely affect the rights and interests of the Holders in any material respect.

Section 9.02 *With Consent of Holders.* With the written consent of the Holders of at least a majority of the aggregate principal amount of the Notes then outstanding (including consents obtained in connection with a repurchase of, or tender offer or exchange offer for, Notes), by Act of such Holders delivered to the Company and the Trustee, the Company, when authorized by a Board Resolution, may amend or supplement this Indenture or the Notes or waive compliance with any provision of this Indenture or the Notes; provided, however, that, without the consent of each affected Holder, no amendment or supplement to this Indenture or the Notes, or waiver of any provision of this Indenture or the Notes, may:

(a) reduce the principal amount of, or change the Maturity Date of, any Note;

(b) reduce the rate of, or extend the stated time for payment of, interest on any Note;

(c) reduce the Fundamental Change Repurchase Price of any Note or change the time at which, or the circumstances under which, the Notes may, or will be, repurchased;

(d) impair the right of any Holder to institute suit for any payment on any Note, including with respect to any consideration due upon conversion of a Note;



- (e) make any Note payable in a currency other than that stated in the Note;
- (f) make any change that impairs or adversely affects the conversion rights of any Holder under Article 10 hereof or otherwise reduces the number of shares of Common Stock, the amount of cash or any other property receivable by a Holder upon conversion;
- (g) change the ranking of the Notes;
- (h) make any change to any amendment, modification or waiver provision of this Indenture that requires the consent of each affected Holder; or
- (i) reduce the percentage of the aggregate principal amount of then outstanding Notes whose Holders must consent to an amendment or modification of this Indenture or a waiver of a past Default.

It will not be necessary for the consent of the Holders under this Section 9.02 to approve the particular form of any proposed amendment or modification, but it will be sufficient if such consent approves the substance of such proposed amendment or modification.

Section 9.03 *Compliance with TIA.* Each amendment, waiver or supplement to this Indenture or the Note will comply with the TIA as then in effect.

Section 9.04 *Execution of Supplemental Indentures.* Upon the written request of the Company and subject to Section 9.09 hereof, the Trustee will sign any supplemental indenture authorized pursuant to this Article 9 if the amendment contained therein does not affect the rights, duties, liabilities or immunities of the Trustee under this Indenture. If the supplemental indenture adversely affects the Trustee's rights, duties, liabilities or immunities under this Indenture, then the Trustee may, but need not, sign such supplemental indenture.

Section 9.05 *Notices of Supplemental Indentures.* After an amendment or supplement to this Indenture or the Notes pursuant to Sections 9.01 or 9.02 hereof becomes effective, the Company will promptly deliver notice (or the Trustee, at the direction and expense of the Company, will promptly deliver notice prepared by the Company) to each Holder of such amendment or supplement, which notice will briefly describe the substance of such amendment or supplement to this Indenture in reasonable detail and state the effective date of such amendment or supplement. The failure to deliver such notice to each Holder or the Trustee, or any defect in such notice, will not impair or otherwise affect the validity of such amendment or supplement to this Indenture.

Section 9.06 *Effect of Supplemental Indentures.* Upon the execution of any supplemental indenture under this Article 9:

- (a) this Indenture will be modified in accordance therewith;
- (b) such supplemental indenture will form a part of this Indenture for all purposes; and

(c) every Holder of Notes theretofore, or thereafter, authenticated and delivered hereunder will be bound thereby.

Section 9.07 *Revocation and Effect of Consents, Waivers and Actions.*

(a) *Revocation.* Until an amendment, supplement or waiver becomes effective, a consent to it by a Holder is a continuing consent by the Holder, and every subsequent Holder of a Note or portion of a Note that evidences the same debt as the consenting Holder's Note, even if notation of the consent is not made on any Note. However, any such Holder, or subsequent Holder, may revoke the consent as to its Note or portion of a Note if a Trust Officer receives the notice of revocation before the date the amendment, supplement or waiver becomes effective.

(b) *Special Record Dates.* The Company may, but is not obligated to, fix a record date for the purpose of determining the Holders entitled to give their consent or take any other action described above or required, or permitted, to be taken pursuant to this Indenture. If a record date is fixed, then those Persons who were Holders at such record date (or their duly designated proxies), and only those Persons, will be entitled to give such consent, to revoke any consent previously given or to take any such action, regardless of whether such Persons continue to be Holders after such record date. No such consent will be valid or effective for more than 120 days after such record date.

(c) *Binding Effect.* After an amendment, supplement or waiver becomes effective, it will bind every applicable Holder. Any amendment or supplement will become effective in accordance with the terms of the supplemental indenture relating thereto, which will become effective upon the execution thereof by the Trustee.

Section 9.08 *Notation on, or Exchange of, Notes.* If any amendment, supplement or waiver changes the terms of a Note, the Trustee or the Company may require the Holder of such Note to deliver such Note to the Trustee. The Trustee may place an appropriate notation prepared by the Company on such Note about the changed terms and return it to the Holder. Alternatively, if the Company so determines, the Company, in exchange for the Note, will issue and the Trustee will authenticate, in accordance with Section 2.05, a new Note that reflects the changed terms.

Section 9.09 *Trustee to Sign Amendments.* The Trustee shall sign any amendment or supplemental indenture authorized pursuant to this Article 9 if the amendment or supplement does not adversely affect the rights, duties, liabilities or immunities of the Trustee. In executing any amended or supplemental indenture, the Trustee will be entitled to receive, and (subject to Section 7.01 and Section 7.02) will be fully protected in conclusively relying upon, in addition to the documents required by Section 12.04 hereof, an Officers' Certificate and an Opinion of Counsel stating that the execution of such amended or supplemental indenture is authorized or permitted by this Indenture and is valid, binding and enforceable against the Company in accordance with its terms.

**ARTICLE 10**  
**CONVERSIONS**

Section 10.01 *Right To Convert.*

(a) *In General.* Subject to, and upon compliance with, the provisions of this Article 10, at any time prior to the Close of Business on the second (2nd) Business Day immediately preceding the Maturity Date, a Holder may, at its option, convert any Note (or any portion thereof in an Authorized Denomination) into Conversion Consideration, as provided in this Article 10. Notes may not be converted after the Close of Business on the second (2nd) Business Day immediately preceding the Maturity Date.

(b) *Closed Periods.* Notwithstanding anything to the contrary in this Indenture, if a Holder tenders a Repurchase Notice with respect to any Note in accordance with Article 3 hereof, such Note may not be converted except to the extent (i) such Note is not subject to such Repurchase Notice; (ii) such Repurchase Notice is withdrawn in accordance with Article 3 hereof; or (iii) the Company fails to pay the Fundamental Change Repurchase Price for such Note in accordance with Section 3.08 hereof.

Section 10.02 *Conversion Procedures.*

(a) *General.* To exercise its conversion right with respect to a beneficial interest in a Global Note, the owner of such beneficial interest must (i) comply with the Applicable Procedures for converting such beneficial interest; and (ii) pay any amounts due pursuant to Section 10.02(d) or Section 10.02(e).

To exercise its conversion right with respect to a Physical Note, the Holder of such Note must (i) complete and manually sign the conversion notice on the back of the Note, or a facsimile of such conversion notice (such notice, or such facsimile, the “**Conversion Notice**”); (ii) deliver such signed and completed Conversion Notice, which shall be irrevocable, and such Note to the Conversion Agent at its office; (iii) furnish any endorsements and transfer documents that the Company, Conversion Agent, Trustee or Transfer Agent may require; and (iv) pay any amounts due pursuant to Section 10.02(d) or Section 10.02(e).

The first Business Day on which a Holder satisfies the foregoing requirements with respect to a Note and on which conversion of such Note is not otherwise prohibited under this Indenture will be the “**Conversion Date**” for such Note. If a Holder has delivered a Fundamental Change Repurchase Notice with respect to a Note, the Holder may not surrender that Note for conversion until the Holder has withdrawn such Fundamental Change Repurchase Notice in accordance with Section 3.04.

The conversion of any Note will be deemed to occur at the Close of Business on the Conversion Date for such Note, and any converted Note or portion thereof will cease to be outstanding upon conversion.

(b) *Holder of Record.* If a Holder surrenders the entire principal amount of a Note for conversion, such Person will no longer be the Holder of such Note as of the Close of Business on the Conversion Date for such Note.

The person in whose name any shares of Common Stock are issuable upon conversion of any Note will become the holder of record of such shares as of the Close of Business on the Conversion Date for such conversion.

(c) *Conversions in Part.* If a Holder surrenders only a portion of the principal amount of a Physical Note for conversion, promptly after the Conversion Date for such portion, the Company will, in accordance with Section 2.05 hereof, execute and deliver to the Trustee, and the Trustee will, upon receipt of a Company Order, in accordance with Section 2.05 hereof, authenticate and deliver to such Holder a new Physical Note in an Authorized Denomination, having a principal amount equal to the aggregate principal amount of the unconverted portion of the Physical Note surrendered for conversion and bearing each legend, if any, required by Section 2.09 hereof.

Upon the conversion of any beneficial interest in a Global Note, the Conversion Agent will promptly request that the Trustee make a notation on the “Schedule of Increases and Decreases of Global Note” of such Global Note to reduce the principal amount represented by such Global Note by the principal amount of the converted beneficial interest. If all of the beneficial interests in a Global Note are so converted, such Global Note will be deemed surrendered to the Trustee for cancellation, and the Trustee will cause such Global Note to be cancelled in accordance with the Applicable Procedures.

(d) *Reimbursement of Interest upon Conversion.* If a Holder converts a Note after the Close of Business on a Regular Record Date, but prior to the Open of Business on the Interest Payment Date corresponding to such Regular Record Date, then (x) the Holder of such Note at the Close of Business on such Regular Record Date shall be entitled, notwithstanding such conversion, to receive, on the date the Company delivers (or is required to deliver) the Conversion Consideration due in respect of such conversion, the unpaid interest that would have accrued on such Note to, but excluding, such Interest Payment Date (assuming, solely for these purposes, that such Note remained outstanding through such Interest Payment Date); and (y) the Holder of such Note must, upon surrender of such Note for conversion, accompany such Note with an amount of cash equal to the amount of such interest referred to in clause (x) above; *provided, however*, that a Holder need not make such payment (A) for conversions following the Regular Record Date immediately preceding the Maturity Date; (B) if the Company has specified a Fundamental Change Repurchase Date that is after such Regular Record Date and on or prior to the Business Day immediately following such Interest Payment Date; or (C) to the extent of any overdue interest, if any overdue interest exists at the time of conversion with respect to such Note. For the avoidance of doubt, a Holder of a Note at the Close of Business on the Regular Record Date immediately preceding the Maturity Date will be entitled to receive interest that accrues (or would have accrued) on such Note to, but excluding, the Maturity Date notwithstanding any conversion of such Note.

(e) *Taxes and Duties.* If a Holder converts a Note, the Company will pay any documentary, stamp or similar issue or transfer tax due on the issue of any shares of the Common Stock upon the conversion; *provided, however*, that if any tax is due because the converting Holder requested that shares of Common Stock be issued in a name other than its own, such Holder will pay such tax and the Company, until having received a sum sufficient to pay such tax, may refuse to deliver any certificates representing the shares of Common Stock being issued in a name other than that of such Holder.

(f) *Notices.* Whenever a Conversion Date occurs with respect to a Note, the Conversion Agent will, as promptly as possible, and in no event later than the Business Day immediately following such Conversion Date, deliver to the Company and the Trustee notice that a Conversion Date has occurred, which notice will state such Conversion Date, the principal amount of Notes converted on such Conversion Date and the names of the Holders that converted Notes on such Conversion Date.

(g) *Restrictions on Conversion.* Notwithstanding anything to the contrary in this Indenture or the Notes, no Note will be convertible by the Holder thereof, and the Company will not effect any conversion of any Note, in each case to the extent (and only to the extent) that such convertibility or conversion would result in such Holder or any of its Affiliates beneficially owning in excess of 9.99% of the then-outstanding shares of Common Stock. For these purposes, beneficial ownership and all determinations and calculations (including with respect to calculations of percentage ownership) will be determined in accordance with Section 13(d) of the Exchange Act and the rules and regulations promulgated thereunder. For the avoidance of doubt, Notes whose convertibility is restricted pursuant to this Section 10.02(g) will continue to be outstanding, and their convertibility will be reinstated if and when the convertibility and conversion will not violate the limitations set forth in this Section 10.02(g).

Section 10.03 *Settlement Upon Conversion.*

(a) *Conversion Obligation.*

(i) *Conversion Consideration.* Subject to the terms hereof, upon conversion of any Note, the consideration (the “**Conversion Consideration**”) due in respect of each \$1,000 principal amount of a Note to be converted will consist of (I) a whole number of shares of Common Stock equal to the Conversion Rate in effect on the Conversion Date for such conversion (which, if not a whole number, will be rounded down to the nearest whole number); and (II) if such Conversion Rate is not a whole number, cash in lieu of the related fractional share in an amount equal to the product of (x) the Last Reported Sale Price per share of Common Stock on such Conversion Date (or, if such Conversion Date is not a Trading Day, the immediately preceding Trading Day) and (y) the fractional portion of such Conversion Rate.

(ii) *Delivery of Conversion Consideration.* Except as set forth in Section 10.05, the Company will pay or deliver, as the case may be, the Conversion Consideration due upon the conversion of any Note to the Holder thereof on the third (3rd) Business Day immediately following the Conversion Date for such conversion.

(iii) *Conversion of Multiple Notes by a Single Holder.* If a Holder converts more than one Note on a single Conversion Date, the Conversion Consideration due in respect of such conversion will be computed based on the total principal amount of Notes converted on such Conversion Date by such Holder.

(b) *Settlement of Accrued Interest and Deemed Payment of Principal.* If a Holder converts a Note, the Company will not adjust the Conversion Rate to account for any accrued and unpaid interest on the Note, and, except as provided in Section 10.02(d), the Company's delivery of the Conversion Consideration due upon such conversion will be deemed to satisfy and discharge in full the Company's obligation to pay the principal of such Note and accrued and unpaid interest, if any, on, such Note to, but excluding the Conversion Date. As a result, except as provided in Section 10.02(d), any accrued and unpaid interest with respect to a converted Note will be deemed to be paid in full rather than cancelled, extinguished or forfeited.

Section 10.04 *Common Stock Issued Upon Conversion.*

(a) The Company will reserve out of its authorized but unissued shares of Common Stock, and keep available to satisfy conversions of the Notes, a number of shares of Common Stock sufficient to permit the conversion of all then-outstanding Notes, after giving effect to the largest number of Additional Shares that may from time to time be added to the Conversion Rate as provided in Section 10.07.

(b) Any shares of Common Stock delivered upon the conversion of the Notes will be newly issued shares or treasury shares, duly and validly issued, fully paid, nonassessable, free from preemptive rights and free of any lien or adverse claim (except to the extent of any lien or adverse claim created by the action or inaction of the Holder or other Person to whom such shares of Common Stock will be delivered). In addition, the Company will endeavor to comply promptly with all federal and state securities laws regulating the offer and delivery of any shares of Common Stock issuable upon conversion of the Notes. The Company will also use its best efforts to cause any shares of Common Stock issuable upon conversion of a Note to be listed on whatever stock exchange(s) the Common Stock is listed on the date the converting Holder becomes a record holder of such Common Stock.

Section 10.05 *Adjustment of Conversion Rate.* The Company will adjust the Conversion Rate from time to time as described in this Section 10.05, except that the Company will not make an adjustment to the Conversion Rate if each Holder participates (other than in a share split or share combination), at the same time and upon the same terms as holders of the Common Stock, and solely as a result of holding the Notes, in the relevant transaction described in this Section 10.05 without having to convert its Notes and as if it held a number of shares of the Common Stock equal to the product of (i) the Conversion Rate in effect on the applicable record date, Effective Date or expiration date; and (ii) the aggregate principal amount of Notes held by such Holder (expressed in thousands) on such date.

(a) *Stock Dividends and Share Splits.* If the Company exclusively issues to all or substantially all holders of the Common Stock shares of Common Stock as a dividend or distribution on shares of the outstanding Common Stock, or if the Company effects a share split of the Common Stock or a share combination of the Common Stock (excluding an issuance solely pursuant to a Common Stock Change Event, as to which the provisions set forth in Section 10.08(a) hereof will apply), the Conversion Rate will be adjusted based on the following formula:

$$CR_1 = CR_0 \times \frac{OS_1}{OS_0}$$

where:

- $CR_0$  = the Conversion Rate in effect immediately prior to the Open of Business on the Ex-Dividend Date of such dividend or distribution, or immediately prior to the Open of Business on the Effective Date of such share split or share combination, as applicable;
- $CR_1$  = the Conversion Rate in effect immediately after the Open of Business on such Ex-Dividend Date or Effective Date, as applicable;
- $OS_0$  = the number of shares of Common Stock outstanding immediately prior to the Open of Business on such Ex-Dividend Date or Effective Date, as applicable; and
- $OS_1$  = the number of shares of Common Stock outstanding immediately after giving effect to such dividend, distribution, share split or share combination, as applicable.

Such adjustment shall become effective immediately after the Open of Business on such Ex-Dividend Date or Effective Date, as applicable. If any dividend, distribution, share split or share combination of the type described in this Section 10.05(a) is declared, but not so paid or made, the Conversion Rate will be immediately readjusted, effective as of the date the Board of Directors determines not to pay such dividend or distribution or to effect such share split or share combination, to the Conversion Rate that would then be in effect if such dividend, distribution, share split or share combination had not been declared or announced.

(b) *Rights, Options and Warrants.* If the Company issues, to all or substantially all holders of its outstanding Common Stock, rights, options or warrants entitling such holders, for a period of not more than sixty (60) calendar days after the record date of such issuance, to subscribe for, or purchase, shares of Common Stock, at a price per share less than the average of the Last Reported Sale Prices per share of the Common Stock for the 10 consecutive Trading Day period ending on, and including, the Trading Day immediately preceding the date of announcement of such issuance, then, subject to the provisions described below with respect to rights issued pursuant to a stockholder rights plan, the Conversion Rate will be increased based on the following formula:

$$CR_1 = CR_0 \times \frac{OS + X}{OS + Y}$$

where:

- CR<sub>0</sub> = the Conversion Rate in effect immediately prior to the Open of Business on the Ex-Dividend Date for such issuance;
- CR<sub>1</sub> = the Conversion Rate in effect immediately after the Open of Business on such Ex-Dividend Date;
- OS<sub>0</sub> = the number of shares of Common Stock outstanding immediately prior to the Open of Business on such Ex-Dividend Date;
- X = the total number of shares of Common Stock issuable pursuant to such rights, options or warrants; and
- Y = the number of shares of Common Stock equal to the quotient of (i) the aggregate price payable to exercise such rights, options or warrants, over (ii) the average of the Last Reported Sale Prices per share of the Common Stock over the 10 consecutive Trading Day period ending on, and including, the Trading Day immediately preceding the date of announcement of the issuance of such rights, options or warrants.

Such adjustment shall become effective immediately after the Open of Business on such Ex-Dividend Date. To the extent that shares of Common Stock are not delivered after the expiration of such rights, options or warrants, including because the issued rights, options or warrants were not exercised, the Conversion Rate will be readjusted to the Conversion Rate that would then be in effect had the increase with respect to the issuance of such rights, options or warrants been made on the basis of delivery of only the number of shares of Common Stock actually delivered. If such rights, options or warrants are not so issued, the Conversion Rate will be readjusted to the Conversion Rate that would then be in effect if the Ex-Dividend Date for such issuance had not occurred.

For purposes of this Section 10.05(b), in determining whether any rights, options or warrants entitle holders of the Common Stock to subscribe for, or purchase, shares of Common Stock at a price per share less than the average of the Last Reported Sale Prices per share of Common Stock for the 10 consecutive Trading Day period ending on, and including, the Trading Day immediately preceding the date of announcement for an issuance, and in determining the aggregate price payable to exercise such rights, options or warrants, there will be taken into account any consideration received by the Company for such rights, options or warrants and any amount payable on exercise thereof, the value of such consideration, if other than cash, to be determined by the Board of Directors.

(c) *Spin-Offs and Other Distributed Property.*

(i) If the Company distributes shares of its Capital Stock, evidences of its indebtedness or other assets or property of the Company, or rights, options or warrants to acquire Capital Stock of the Company or other securities, to all or substantially all holders of the Common Stock, excluding:



- (A) dividends, distributions, rights, options or warrants for which an adjustment was effected pursuant to Section 10.05(a) hereof or Section 10.05(b) hereof, as applicable;
- (B) dividends or distributions paid exclusively in cash for which an adjustment was effected pursuant to Section 10.05(d) hereof;
- (C) Spin-Offs for which the provisions described in Section 10.05(c)(ii) hereof will apply; and
- (D) an issuance solely pursuant to a Common Stock Change Event, as to which the provisions set forth in Section 10.08(a) hereof will apply,

then the Conversion Rate will be increased based on the following formula:

$$CR_1 = CR_0 \times \frac{SP_0}{SP_0 - FMV}$$

where:

- CR<sub>0</sub> = the Conversion Rate in effect immediately prior to the Open of Business on the Ex-Dividend Date for such distribution;
- CR<sub>1</sub> = the Conversion Rate in effect immediately after the Open of Business on such Ex-Dividend Date;
- SP<sub>0</sub> = the average of the Last Reported Sale Prices per share of the Common Stock over the 10 consecutive Trading Day period ending on, and including, the Trading Day immediately preceding the Ex-Dividend Date for such distribution; and
- FMV = the fair market value (as determined by the Company's Board of Directors) of the shares of Capital Stock, evidences of indebtedness, assets, property, rights, options or warrants distributed with respect to each outstanding share of Common Stock on the Ex-Dividend Date for such distribution.

Such adjustment shall become effective immediately after the Open of Business on such Ex-Dividend Date. Notwithstanding the foregoing, if "FMV" (as defined above) is equal to or greater than the "SP<sub>0</sub>" (as defined above), in lieu of the foregoing increase, each Holder will receive, for each \$1,000 principal amount of Notes held on the record date for the distribution, at the same time and upon the same terms as holders of the Common Stock, the amount and kind of shares of Capital Stock, evidences of indebtedness, assets or property, rights, options or warrants or other securities that such Holder would have received if such Holder had owned a number of shares of Common Stock equal to the Conversion Rate in effect on the record date for such distribution.

If any distribution of the type described in this Section 10.05(c)(i) is not so paid or made, or if any rights, options or warrants are not exercised before their expiration date, the Conversion Rate will be readjusted to be the Conversion Rate that would then be in effect if such distribution had not been declared.

(ii) With respect to an adjustment pursuant to this Section 10.05(c) where there has been a payment of a dividend or other distribution on the Common Stock of shares of Capital Stock of any class or series, or similar equity interest, of or relating to an Affiliate, a Subsidiary or other business unit of the Company, and such Capital Stock or similar equity interest is listed or quoted (or will be listed or quoted upon the consummation of the transaction) on a national securities exchange or a reasonably comparable non-U.S. equivalent (a “**Spin-Off**”), but excluding an issuance solely pursuant to a Common Stock Change Event as to which the provisions described in Section 10.08(a) hereof apply, the Conversion Rate will be increased based on the following formula:

$$CR_1 = CR_0 \times \frac{FMV_0 + MP_0}{MP_0}$$

where:

- CR<sub>0</sub> = the Conversion Rate in effect immediately prior to the Open of Business on the Ex-Dividend Date for such Spin-Off;
- CR<sub>1</sub> = the Conversion Rate in effect immediately after the Open of Business on such Ex-Dividend Date;
- FMV<sub>0</sub> = the average of the Last Reported Sale Prices of the Capital Stock or similar equity interest distributed to holders of the Common Stock applicable to one share of Common Stock (determined for purposes of the definition of Last Reported Sale Price as if such Capital Stock or similar equity interest were the Common Stock) over the first 10 consecutive Trading Day period after, and including, the Ex-Dividend Date of the Spin-Off (the “**Valuation Period**”); and
- MP<sub>0</sub> = the average of the Last Reported Sale Prices per share of the Common Stock over the Valuation Period.

Such adjustment shall become effective immediately after the Open of Business on such Ex-Dividend Date. The adjustment to the Conversion Rate under this Section 10.05(c)(ii) will be calculated as of the Close of Business on the last Trading Day of the Valuation Period but will be given effect as of immediately after the Open of Business on the Ex-Dividend Date of the Spin-Off. Notwithstanding anything to the contrary herein or in the Notes, if necessary, the Company shall delay the settlement of any conversion of Notes where the Conversion Date occurs during the Valuation Period until the third (3rd) Business Day after the last day of the Valuation Period. If any distribution of the type described in this Section 10.05(c)(ii) is declared but not so made, the Conversion Rate shall be immediately readjusted, effective as of the date the Board of Directors determines not to make such distribution, to the Conversion Rate that would then be in effect if such distribution had not been declared.

(d) *Cash Dividends or Distributions.* If any cash dividend or distribution (other than a distribution as to which an adjustment to the Conversion Rate was effected pursuant to Section 10.05(e) hereof) is made to all or substantially all holders of the Common Stock, the Conversion Rate will be increased based on the following formula:

$$CR_1 = CR_0 \times \frac{SP_0}{SP_0 - C}$$

where:

- $CR_0$  = the Conversion Rate in effect immediately prior to the Open of Business on the Ex-Dividend Date for such dividend or distribution;
- $CR_1$  = the Conversion Rate in effect immediately after the Open of Business on the Ex-Dividend Date for such dividend or distribution;
- $SP_0$  = the Last Reported Sale Price per share of the Common Stock on the Trading Day immediately preceding the Ex-Dividend Date for such dividend or distribution; and
- $C$  = the amount in cash per share the Company distributes to holders of Common Stock.

Such adjustment shall become effective immediately after the Open of Business on such Ex-Dividend Date. Notwithstanding the foregoing, if “C” (as defined above) is equal to or greater than “ $SP_0$ ” (as defined above), in lieu of the foregoing increase, each Holder will receive, for each \$1,000 principal amount of Notes held on the record date for such cash dividend or distribution, at the same time and upon the same terms as holders of the Common Stock, the amount of cash that such Holder would have received if such Holder had owned a number of shares of Common Stock equal to the Conversion Rate in effect on such record date. If any dividend or distribution of the type described in this Section 10.05(d) is declared but not so paid or made, the Conversion Rate will be readjusted to the Conversion Rate that would then be in effect if such dividend or distribution had not been declared.

(e) *Tender Offers or Exchange Offers.* If the Company or any Subsidiary makes a payment in respect of a tender offer or exchange offer for the Common Stock, to the extent that the cash and value of any other consideration included in the payment per share of Common Stock exceeds the Last Reported Sale Price per share of the Common Stock on the Trading Day next succeeding the last date (the “**Expiration Date**”) on which tenders or exchanges may be made pursuant to such tender offer or exchange offer (as it may be amended), the Conversion Rate will be increased based on the following formula:

$$CR_1 = CR_0 \times \frac{AC + (SP_1 \times OS_1)}{OS_0 \times SP_1}$$

where:

- CR<sub>0</sub> = the Conversion Rate in effect immediately prior to the Expiration Time (as defined below);
- CR<sub>1</sub> = the Conversion Rate in effect immediately after the Expiration Time;
- AC = the aggregate value of all cash and any other consideration (as determined by the Board of Directors) paid or payable for shares purchased in such tender or exchange offer;
- OS<sub>0</sub> = the number of shares of Common Stock outstanding immediately prior to the time (the “**Expiration Time**”) on the date such tender or exchange offer expires (prior to giving effect to the purchase of all shares accepted for purchase or exchange in such tender or exchange offer);
- OS<sub>1</sub> = the number of shares of Common Stock outstanding immediately after the Expiration Time (after giving effect to the purchase of all shares accepted for purchase or exchange in such tender or exchange offer); and
- SP<sub>1</sub> = the average of the Last Reported Sale Prices per share of the Common Stock over the 10 consecutive Trading Day period (the “**Averaging Period**”) commencing on the Trading Day next succeeding the Expiration Date.

The adjustment to the Conversion Rate pursuant to this Section 10.05(e) will be calculated as of the Close of Business on the last Trading Day of the Averaging Period but will be given effect as of immediately after the Expiration Time. Notwithstanding anything to the contrary herein or in the Notes, if necessary, the Company shall delay the settlement of any conversion of Notes where the Conversion Date occurs during the Averaging Period until the third (3rd) Business Day after the last day of the Averaging Period.

(f) *Successive Adjustments.* After an adjustment to the Conversion Rate under this Article 10, any subsequent event requiring an adjustment under this Article 10 will cause an adjustment to the Conversion Rate as so adjusted, without duplication.

(g) *Limitations Imposed by Stock Market Listing Standards.* The Company will not enter into any transaction, or take any other voluntary action, that would result in an adjustment to the Conversion Rate that would violate the listing standards of any securities exchange on which any securities of the Company may be then listed, without complying, if applicable, with the requirements of such listing standards.

(h) *Special Settlement Provisions.* Notwithstanding anything to the contrary herein, if:

(i) a Note is to be converted and, as of the Conversion Date for such conversion, any transaction or other event that requires an adjustment to the Conversion Rate pursuant to Sections 10.05(a) through (e) has occurred but has not yet resulted in an adjustment to the Conversion Rate;

(ii) the consideration due upon such conversion consists of any shares of Common Stock; and

(iii) such shares of Common Stock are not entitled to participate in such transaction or event because they were not held on the related record date or otherwise,

then, solely for purpose of such conversion, the Company shall, without duplication, give effect to such adjustment on such Conversion Date.

In addition, notwithstanding anything to the contrary herein, if:

(i) a Conversion Rate adjustment for any transaction or other event becomes effective on any Ex-Dividend Date pursuant to Sections 10.05(a) through (e);

(ii) a Note is to be converted;

(iii) the Conversion Date for such conversion occurs on or after such Ex-Dividend Date and on or before the related record date;

(iv) the consideration due upon such conversion includes any whole shares of Common Stock; and

(v) the Holder of such Note would be treated, on such record date, as the record holder of such shares of Common Stock based on a Conversion Rate that is adjusted for such event,

then such Conversion Rate adjustment shall not be given effect for such conversion. Instead, such Holder will be treated as if such Holder were, as of such record date, the record holder of such shares of Common Stock on an unadjusted basis and will participate in such transaction or event.

(i) *Shareholder Rights Plans.* If the Company has a rights plan in effect when a Holder converts a Note, the Company will deliver to such Holder, to the extent such Holder receives any shares of Common Stock upon such conversion of such Note, any rights that, under the rights plan, would be applicable to a share of Common Stock, unless prior to the Conversion Date for such Note, the rights have separated from the Common Stock, in which case, and only in such case, the Conversion Rate will be adjusted pursuant to Section 10.05(c)(i) as if, at the time of such separation, the Company had distributed to all holders of the Common Stock shares of its Capital Stock, evidences of its indebtedness, other assets or property of the Company or rights, options or warrants to acquire its Capital Stock or other securities, subject to readjustment in the event of the expiration, termination or redemption of such rights.

(j) *Other Adjustments.* Whenever any provision of this Indenture requires the calculation of the Last Reported Sale Price or a function thereof over a period of multiple days (including the Stock Price for purposes of a Make-Whole Fundamental Change), the Company will make appropriate adjustments to account for any adjustment to the Conversion Rate that becomes effective, or any event requiring an adjustment to the Conversion Rate where the Ex-Dividend Date, Effective Date or expiration date of the event occurs, at any time during such period.

(k) *Restrictions on Adjustments.* Except as a result of a reverse share split or a share combination subject to Section 10.05(a), and except for readjustments pursuant to the last paragraph of Section 10.05(a), readjustments pursuant to the penultimate paragraph of Section 10.05(b), readjustments pursuant to the last paragraph of Section 10.05(c)(i), readjustments pursuant to the penultimate paragraph of Section 10.05(c)(ii) and readjustments pursuant to Section 10.05(d), in no event will the Conversion Rate be adjusted downward pursuant to Sections 10.05(a), (b), (c), (d) or (e) hereof.

In addition, notwithstanding anything to the contrary elsewhere in this Indenture, the Conversion Rate will not be adjusted:

(i) upon the issuance of any shares of Common Stock pursuant to any present or future plan providing for the reinvestment of dividends or interest payable on the Company's securities and the investment of additional optional amounts in shares of Common Stock under any plan;

(ii) upon the issuance of any shares of Common Stock or options or rights to purchase those shares pursuant to any present or future employee, director or consultant benefit plan or program of, or assumed by, the Company or any of its Subsidiaries;

(iii) upon the issuance of any shares of Common Stock pursuant to any option, warrant, right or exercisable, exchangeable or convertible security not described in the preceding clause and outstanding as of the date of the Issue Date;

(iv) upon the repurchase of any shares of Common Stock pursuant to an open-market share repurchase program or other buy-back transaction that is not a tender offer or exchange offer subject to Section 10.05(e);

(v) for a change in the par value of the Common Stock; or

(vi) for accrued and unpaid interest.

(l) *Miscellaneous.*

(i) *Certain Definitions.*

(II) For purposes of this Section 10.05, (1) the number of shares outstanding at any time will include shares issuable in respect of scrip certificates issued in lieu of fractions of shares of Common Stock; but, (2) so long as the Company does not pay any dividend or make any distribution on shares of Common Stock held in the treasury of the Company, will not include shares of Common Stock held in the treasury of the Company.

(III) For purposes of this Section 10.05, the term “**Effective Date**” will mean the first date on which the Common Stock trades on the applicable exchange or in the applicable market, regular way, reflecting the relevant share split or share combination, as applicable.

(IV) For purposes of this Article 10, the term “**Ex-Dividend Date**” will mean the first date on which the shares of the Common Stock trade on the applicable exchange or in the applicable market, regular way, without the right to receive the issuance, dividend or distribution in question.

(ii) *Notices.* Whenever the Company adjusts (or is required to adjust) the Conversion Rate pursuant to this Section 10.05, the Company will promptly deliver to each Holder a written notice, which notice will include (i) a brief description of the event requiring adjustment to the Conversion Rate pursuant to this Section 10.05; (ii) the effective time of such adjustment; (iii) the Conversion Rate in effect immediately after such adjustment is made; and (iv) a schedule explaining, in reasonable detail, how the Company calculated such adjustment. On the same day the Company delivers such notice to each Holder, the Company will deliver to the Trustee, the Paying Agent and the Conversion Agent an Officers’ Certificate that includes all of the information contained in such notice, which Officers’ Certificate each of the Trustee, the Paying Agent and the Conversion Agent may treat as conclusive evidence that the adjustment specified in such Officers’ Certificate is correct and will be in effect as of the effective time specified in such Officers’ Certificate. The failure to deliver such notice will not affect the legality or validity of any such adjustment.

(iii) All calculations and other determinations in respect of the Conversion Rate will be made by the Company to the nearest 1/10,000th of a share, with 5/100,000ths rounded upward.

Section 10.06 *Voluntary Adjustments.*

(a) *Best Interest Increases.* The Company may, from time to time, to the extent permitted by law and the applicable rules of any exchange on which the Common Stock is listed, increase the Conversion Rate by any amount if (i) the Board of Directors determines that such increase is in the best interest of the Company; (ii) such increase is in effect for a period of at least 20 Business Days; and (iii) during such period, such increase is irrevocable.

(b) *Tax-Related Increases.* To the extent permitted by law and the applicable rules of any exchange on which the Common Stock is listed, the Company may (but is not required to) increase the Conversion Rate if the Board of Directors determines that such increase is advisable to avoid, or diminish, any income tax imposed on holders of the Common Stock or rights to purchase the Common Stock as a result of any dividend or distribution of shares (or rights to acquire shares) or similar event treated as such for U.S. federal income tax purposes.

(c) *Notices.* Whenever the Board of Directors determines that the Company will increase the Conversion Rate pursuant to this Section 10.06, the Company will deliver to the Trustee, the Conversion Agent and each Holder (in compliance with the Applicable Procedures, if applicable) notice of such increase at least fifteen (15) Business Days before such increase will take effect, which notice will state the increase to be made and the period during which such increase will be in effect.

Section 10.07 *Adjustments Upon Certain Fundamental Changes.*

(a) *General.* If a Fundamental Change (determined after giving effect to the penultimate paragraph of the definition thereof, but without regard to the exclusion in clause (b)(ii) of the definition thereof) occurs (a “**Make-Whole Fundamental Change**”), and a Holder converts its Notes “in connection with” such Make-Whole Fundamental Change, the Company will, in the circumstances described in this Section 10.07, increase the Conversion Rate for such Notes by the number of additional shares of Common Stock (the “**Additional Shares**”) set forth in this Section 10.07. For purposes of this Section 10.07, a conversion of Notes will be deemed to be “in connection with” a Make-Whole Fundamental Change if the applicable Conversion Date occurs during the period from, and including, the effective date of the Make-Whole Fundamental Change up to, and including, the Business Day immediately prior to the related Fundamental Change Repurchase Date (or, in the case of a Make-Whole Fundamental Change that would have been a Fundamental Change but for the exclusion in clause (b)(ii) of the definition thereof, the thirty fifth (35th) Trading Day immediately following the effective date of such Make-Whole Fundamental Change):.

As promptly as practicable, but in no event later than the Business Day after the effective date of a Make-Whole Fundamental Change, the Company will notify the Holders, the Trustee and the Conversion Agent of such effective date and issue a press release announcing such effective date.

(b) *Determination of Additional Shares.* The number of Additional Shares, if any, by which the Conversion Rate will be increased if a Holder converts a Note in connection with a Make-Whole Fundamental Change will be determined by reference to the table below, and will be based on the Make-Whole Fundamental Change Effective Date and the Stock Price for such Make-Whole Fundamental Change. For any Make-Whole Fundamental Change, the “**Make-Whole Fundamental Change Effective Date**” will mean the date on which such Make-Whole Fundamental Change occurs or becomes effective.

(c) *Adjustment of Stock Prices and Additional Shares.* The Stock Prices set forth in the first row (*i.e.*, the column headers) of the table below will be adjusted on each date on which the Conversion Rate must be adjusted pursuant to Section 10.05. The adjusted Stock Prices will equal the Stock Prices in effect immediately prior to such adjustment, multiplied by a fraction, (i) the numerator of which is the Conversion Rate in effect immediately prior to the adjustment giving rise to the share price adjustment; and (ii) the denominator of which is the Conversion Rate in effect immediately after the adjustment. The numbers of Additional Shares set forth in the table below will be adjusted in the same manner, at the same time and for the same events for which the Conversion Rate is adjusted pursuant to Section 10.05 hereof.



(d) *Additional Shares Table.* The following table sets forth hypothetical Make-Whole Fundamental Change Effective Dates, Stock Prices and the number of Additional Shares by which the Conversion Rate will be increased per \$1,000 principal amount of Notes for a Holder that converts a Note in connection with a Make-Whole Fundamental Change having such Make-Whole Fundamental Change Effective Date and Stock Price.

| Effective Date | Stock Price |         |         |         |         |         |         |         |         |         |
|----------------|-------------|---------|---------|---------|---------|---------|---------|---------|---------|---------|
|                | \$3.17      | \$3.50  | \$3.88  | \$5.00  | \$6.00  | \$8.00  | \$12.00 | \$16.00 | \$24.00 | \$30.00 |
| July 30, 2015  | 57.9401     | 50.7543 | 44.2036 | 31.3500 | 24.3350 | 15.9788 | 8.1033  | 4.4119  | 1.0613  | 0.0000  |
| July 15, 2016  | 57.9401     | 48.5743 | 42.0258 | 29.4560 | 22.7667 | 14.9413 | 7.6433  | 4.1981  | 1.0217  | 0.0000  |
| July 15, 2017  | 57.9401     | 46.1857 | 39.4871 | 27.0720 | 20.7383 | 13.5750 | 7.0533  | 3.9606  | 1.0129  | 0.0000  |
| July 15, 2018  | 57.9401     | 43.5600 | 36.4381 | 23.9400 | 18.0050 | 11.6775 | 6.1950  | 3.6238  | 1.0975  | 0.0000  |
| July 15, 2019  | 57.9401     | 40.4714 | 32.4124 | 19.4720 | 14.0833 | 8.9475  | 4.8458  | 2.9538  | 1.0896  | 0.0000  |
| July 15, 2020  | 57.9401     | 36.3086 | 26.1057 | 12.4080 | 8.2217  | 5.0950  | 2.8525  | 1.8056  | 0.7650  | 0.0000  |
| July 15, 2021  | 57.9401     | 28.1971 | 0.2165  | 0.0000  | 0.0000  | 0.0000  | 0.0000  | 0.0000  | 0.0000  | 0.0000  |

(e) *Use of Additional Shares Table.* If the Stock Price and/or Make-Whole Fundamental Change Effective Date for a Make-Whole Fundamental Change are not set forth in the table above, then:

(A) if the Stock Price is between two Stock Prices in the table or the Make-Whole Fundamental Change Effective Date is between two Make-Whole Fundamental Change Effective Dates in the table, the number of Additional Shares by which the Conversion Rate will be increased for a Holder that converts a Note in connection with such Make-Whole Fundamental Change will be determined by a straight-line interpolation between the numbers of Additional Shares set forth for the higher and lower Stock Prices listed in the table and the earlier and later Make-Whole Fundamental Change Effective Dates listed in the table, as applicable, based on a 365- or 366-day year, as applicable;

(B) if the Stock Price is greater than \$30.00, subject to adjustment in the same manner as the Stock Prices set forth in the column headings of the table, no Additional Shares will be added to the Conversion Rate; and

(C) if the Stock Price is less than \$3.17 per share, subject to adjustment in the same manner as the Stock Prices set forth in the column headings of the table, no Additional Shares will be added to the Conversion Rate.

Notwithstanding the foregoing, in no event will the Conversion Rate be increased as a result of this Section 10.07 to exceed 315.4564 shares of Common Stock per \$1,000 principal amount of Notes, subject to adjustment in the same manner, at the same time and for the same events for which the Conversion Rate must be adjusted as set forth in Section 10.05 hereof.

(f) *Settlement or Conversion.* If a Holder converts a Note in connection with a Make-Whole Fundamental Change, the Company will settle such conversion by delivering Conversion Consideration in accordance with Section 10.03 hereof; *provided, however,* that notwithstanding anything to the contrary in Section 10.03 hereof, if a Holder converts a Note in connection with a Make-Whole Fundamental Change described in clause (b)(ii) of the definition of Fundamental Change in which the holders of the Common Stock receive only cash in consideration for their shares of Common Stock, the Company will settle such conversion by delivering to such Holder, on the third (3rd) Business Day immediately following the Conversion Date for such Note, an amount of cash, for each \$1,000 principal amount of such Note converted, equal to the product of (i) the Conversion Rate on the Conversion Date applicable to such Note (including any Additional Shares added to such Conversion Rate pursuant to this Section 10.07) and (ii) the Stock Price for such Make-Whole Fundamental Change.

Section 10.08 *Effect of Recapitalization, Reclassification, Consolidation, Merger or Sale.*

(a) *General.* If any of the following events occur:

- (1) any recapitalization, reclassification or change of Common Stock (other than (x) a change only in par value, from par value to no par value or no par value to par value; or (y) changes resulting from a stock split or combination not involving the issuance of any other class or series of securities);
- (2) any consolidation, merger, combination or similar transaction involving the Company;
- (3) any sale, lease or other transfer to a third party of all or substantially all of the consolidated assets of the Company and its Subsidiaries substantially as an entirety; or
- (4) any statutory share exchange,

and, in each case, as a result of which the Common Stock would be converted into, or exchanged for, or represent solely the right to receive, stock (including one or more series of the Common Stock), other securities, other property or assets (including cash or any combination thereof) (any such event, a “**Common Stock Change Event**” and such stock, other securities, other property or assets, the “**Reference Property**,” and the amount and kind of Reference Property that a holder of one share of Common Stock would be entitled to receive on account of such Common Stock Change Event, a “**Reference Property Unit**”), then, notwithstanding anything to the contrary, at the effective time of such transaction, the consideration due upon conversions of any Notes will be determined in the same manner as if each reference to any number of shares of Common Stock in this Article 10 were instead a reference to the same number of Reference Property Units. For these purposes, the Last Reported Sale Price of any Reference Property Unit or portion thereof that does not consist of a class of securities will be the fair value of such Reference Property Unit or portion thereof, as applicable, determined in good faith by the Company (or, in the case of cash denominated in U.S. dollars, the face amount thereof).

If the Reference Property consists of more than a single type of consideration (determined based in part upon any form of stockholder election), then the composition of the Reference Property Unit shall be deemed to be (a) the weighted average, per share of Common Stock, of the types and amounts of consideration received by the holders of Common Stock that affirmatively make such an election; or (b) if no holders of the Common Stock affirmatively make such an election, the types and amounts of consideration actually received, per share of Common Stock, by the holders of the Common Stock. The Company shall notify Holders, the Trustee and the Conversion Agent (if other than the Trustee) of such weighted average (if applicable) as soon as practicable after such determination is made.

At or before the effective date of such Common Stock Change Event, the Company and the resulting, surviving or transferee person (if not the Company) of such Common Stock Change Event (the “**Successor Person**”) will execute and deliver to the Trustee a supplemental indenture giving effect to the above. Such supplemental indenture shall provide (i) to the extent the Reference Property is comprised, in whole or in part, of common equity securities, for anti-dilution and other adjustments that are as nearly equivalent as possible to the adjustments provided for in this Article 10 and (ii) with respect to any Reference Property other than common equity securities and cash, such anti-dilution adjustments (if any) that the Company reasonably considers appropriate in its good faith determination. If the Reference Property in respect of any Common Stock Change Event includes shares of stock, securities or other property or assets of a Person other than the Company or the Successor Person, as the case may be, in such Common Stock Change Event, then such supplemental indenture shall also be executed by such other Person and shall contain such additional provisions to protect the interests of the Holders of the Notes, including the right of Holders to require the Company to repurchase their Notes upon a Fundamental Change pursuant to Article 3, as the Company shall reasonably consider necessary by reason of the foregoing.

None of the foregoing provisions will affect the right of a Holder to convert its Notes as set forth in Section 10.01 and Section 10.02 prior to the effective date of such Common Stock Change Event.

(b) *Notices.*

(i) As soon as practicable upon learning of the anticipated or actual effective date of any Common Stock Change Event, the Company will deliver written notice of such Common Stock Change Event to each Holder, the Trustee and the Conversion Agent. Such Notice will include:

- (A) a brief description of such Common Stock Change Event;
- (B) the Conversion Rate in effect on the date the Company delivers such notice;
- (C) the anticipated effective date for the Common Stock Change Event;
- (D) that, on and after the effective date for the Common Stock Change Event, the Notes will be convertible into Reference Property Units and cash in lieu of fractional Reference Property Units; and
- (E) the composition of the Reference Property Unit for such Common Stock Change Event.

(ii) In connection with executing a supplemental indenture in accordance with Section 10.08(a) hereof, the Company will:

(A) file with the Trustee an Officers' Certificate briefly describing the Common Stock Change Event, the composition of the Reference Property Unit for such Common Stock Change Event, any adjustment to be made with respect thereto and that all conditions precedent under this Indenture to such Common Stock Change Event have been complied with; *provided*, that the failure to deliver such Officers' Certificate shall not affect the validity or legality of such supplemental indenture; and

(B) cause to be sent to each Holder a notice of the execution of such supplemental indenture and the composition of the Reference Property Unit for such Common Stock Change Event; *provided*, that the failure to deliver such notice to any Holder will not affect the validity or legality of such supplemental indenture.

(c) *Successive Common Stock Change Events.* If more than one Common Stock Change Event occurs, this Section 10.08 will apply successively to each Common Stock Change Event.

(d) *Compliance Covenant.* The Company will not become a party to any Common Stock Change Event unless its terms are consistent with this Section 10.08.

Section 10.09 No Responsibility of Trustee or Conversion Agent. The Trustee and the Conversion Agent will not have any duty or responsibility to any Holder to determine whether any facts exist that require an adjustment of the Conversion Rate, or with respect to the nature or extent or calculation of any such adjustment when made, or with respect to the method employed in making the same. Neither the Trustee nor the Conversion Agent will be responsible for any failure of the Company to deliver the Conversion Consideration due upon the surrender of any Notes for the purpose of conversion or to comply with any of the duties, responsibilities or covenants of the Company contained in this Article 10. Without limiting the generality of the foregoing, neither the Trustee nor the Conversion Agent will be under any responsibility to determine the correctness of any provisions contained in any supplemental indenture entered into pursuant to Section 10.08 hereof, including with respect to the calculation of the amount of Conversion Consideration receivable by Holders upon the conversion of their Notes after any Common Stock Change Event, and each, subject to the provisions of Article 7, may accept as conclusive evidence of the correctness of any such provisions, and will be protected in relying upon, the Officers' Certificate (which the Company will be obligated to file with the Trustee promptly following the execution of any such supplemental indenture) with respect thereto. The Conversion Agent (if other than the Company or an Affiliate of the Company) shall have the same protection under this Section 10.09 as the Trustee.

**ARTICLE 11**  
**NO RIGHT OF REDEMPTION AT THE OPTION OF THE COMPANY**

The Notes will not be redeemable prior to the Maturity Date at the Company's election, and no sinking fund will be provided for the Notes.

**ARTICLE 12**  
**MISCELLANEOUS**

Section 12.01 *TIA Controls*. If any provision of this Indenture limits, qualifies or conflicts with another provision that is required to be included in this Indenture by the TIA, then the required provision of the TIA will control.

Section 12.02 *Notices*. Any request, demand, authorization, notice, waiver, consent or communication will be in writing and delivered in Person or mailed by first-class mail, postage prepaid, addressed as follows or transmitted by electronic transmission or other similar means of unsecured electronic methods to the following:

if to the Company:

Bacterin International Holdings, Inc.  
600 Cruiser Lane  
Belgrade, MT 59714  
Facsimile: (406) 388-9724  
Attn: General Counsel

If to the Trustee (including in its capacity as Registrar, Paying Agent or Conversion Agent):

Wilmington Trust, National Association  
Global Corporate Capital Markets  
50 South Sixth Street, Suite 1290  
Minneapolis, MN 55402  
Facsimile: (612) 217-5651  
Attention: Bacterin International Holdings, Inc. Administrator

The Company or the Trustee, by notice given to the other in the manner provided above, may designate additional or different addresses for subsequent notices or communications. Any notice, direction, request or demand hereunder to or upon the Trustee shall be deemed to have been sufficiently given or made, for all purposes, if it is in writing and actually received by the Trustee, addressed as provided above or sent electronically in PDF format.

Any notice or communication given to a Holder will be mailed to the Holder, by first class mail, postage prepaid, at the Holder's address as it appears on the registration books of the Registrar and will be deemed given on the date of such mailing or electronic delivery, as applicable; *provided, however*, that with respect to any Global Note, such notice or communication will be sent to the Holder thereof pursuant to the Applicable Procedures.

Failure to mail or send a notice or communication to a Holder or any defect in it will not affect its sufficiency with respect to other Holders. If a notice or communication is mailed or sent in the manner provided above, it is duly given, whether or not received by the addressee.

If the Company mails or sends a notice or communication to the Holders, it will, at the same time, send a copy to the Trustee and each of the Registrar, Paying Agent and Conversion Agent.

If the Company is required under this Indenture to give a notice to the Holders, in lieu of delivering such notice to the Holders, the Company may deliver such notice to the Trustee and direct the Trustee, at the Company's expense, to have delivered such notice to the Holders on or prior to the date on which the Company would otherwise have been required to deliver such notice to the Holders. In such a case, the Company will also direct the Trustee, at the Company's expense, to send a copy of the notice to each of the Registrar, Paying Agent and Conversion Agent at the same time it sends the notice to the Holders.

Section 12.03 *Communications by Holders with Other Holders.* Holders may communicate pursuant to TIA § 312(b) with other Holders with respect to their rights under this Indenture, the Notes or the Registration Rights Agreement. The Company, the Trustee, the Registrar and all other Persons thereby permitted will have the protection of TIA § 312(c).

Section 12.04 *Certificate and Opinion as to Conditions Precedent.* Upon any request or application by the Company to the Trustee to take any action under this Indenture other than the authentication of the initial Global Note and any Physical Note on the Issue Date, the Company will furnish to the Trustee:

(a) an Officers' Certificate stating that, in the judgment or opinion of the signers, all conditions precedent, if any, provided for in this Indenture relating to the proposed action have been complied with; and

(b) an Opinion of Counsel stating that, in the judgment or opinion of such counsel, all such conditions precedent relating to the proposed action (to the extent of legal conclusions and subject to reasonable assumptions and exclusions) have been complied with.

Section 12.05 *Statements Required in Certificate or Opinion.* Each Officers' Certificate or Opinion of Counsel with respect to compliance with a covenant or condition (except for such Officers' Certificate required to be delivered pursuant to Section 4.05 hereof) provided for in this Indenture will include:

(a) a statement that each Person making such Officers' Certificate or Opinion of Counsel has read such covenant or condition;

(b) a brief statement as to the nature and scope of the examination or investigation upon which the statements, judgments or opinions contained in such Officers' Certificate or Opinion of Counsel are based;

(c) a statement that, in the judgment or opinion of each such Person, such Person has made such examination or investigation as is necessary to enable such Person to express an informed judgment or opinion to whether or not such covenant or condition has been complied with; and

(d) a statement that, in the judgment or opinion of such Person, such covenant or condition has been complied with.

Section 12.06 *Separability Clause.* In case any provision in this Indenture or in the Notes will be invalid, illegal or unenforceable, the validity, legality and enforceability of the remaining provisions will not in any way be affected or impaired thereby.

Section 12.07 *Rules by Trustee.* The Trustee may make reasonable rules for action by, or a meeting of, Holders.

Section 12.08 *Governing Law and Waiver of Jury Trial.* THE INDENTURE AND EACH NOTE WILL BE GOVERNED BY, AND CONSTRUED IN ACCORDANCE WITH, THE LAWS OF THE STATE OF NEW YORK. EACH OF THE COMPANY AND THE TRUSTEE HEREBY IRREVOCABLY WAIVES, TO THE FULLEST EXTENT PERMITTED BY APPLICABLE LAW, ANY AND ALL RIGHT TO TRIAL BY JURY IN ANY LEGAL PROCEEDING ARISING OUT OF OR RELATING TO THIS INDENTURE, THE NOTES OR THE TRANSACTION CONTEMPLATED HEREBY.

Section 12.09 *No Recourse Against Others.* A director, officer, employee or stockholder, as such, of the Company will not have any liability for any obligations of the Company under the Notes or this Indenture or for any claim based on, in respect of or by reason of such obligations or their creation. By accepting a Note, each Holder will waive and release all such liability. The waiver and release will be part of the consideration for the issuance of the Notes.

Section 12.10 *Calculations.* Except as otherwise provided in this Indenture, the Company will be responsible for making all calculations called for under the Notes and this Indenture. These calculations include, but are not limited to, determinations of the Last Reported Sale Price of the Common Stock or any other security, accrued interest (including, for the avoidance of doubt, any Additional Interest, Default Interest or Special Interest) payable on the Notes and the Conversion Rate in effect on any Conversion Date. In no event will the Trustee be under any obligation to make any calculations called for under the Notes or this Indenture.

The Company will make all calculations in good faith and, absent manifest error, its calculations will be final and binding on all Holders. The Company will provide a schedule of its calculations to each of the Trustee and the Conversion Agent, and each of the Trustee and Conversion Agent is entitled to rely conclusively upon the accuracy of the Company's calculations without independent verification. If any Holder requests in writing from the Trustee a copy of such schedule, the Trustee will promptly forward a copy of such schedule to such Holder.

All calculations will be made to the nearest cent or to the nearest 1/10,000th of a share, as the case may be, with 5/100,000ths rounded upward.

Section 12.11 *Successors.* All agreements of the Company, the Trustee, the Registrar, the Paying Agent and the Conversion Agent in this Indenture and the Notes will bind their respective successors.

Section 12.12 *Multiple Originals.* The parties may sign any number of copies of this Indenture. Each signed copy will be an original, but all of them together represent the same agreement. One signed copy is enough to prove this Indenture. The exchange of copies of this Indenture and of signature pages by facsimile or PDF transmission will constitute effective execution and delivery of this Indenture as to the parties hereto and may be used in lieu of the original Indenture for all purposes. Signatures of the parties hereto transmitted by facsimile or PDF will be deemed to be their original signatures for all purposes.

Section 12.13 *Table of Contents; Headings.* The table of contents and headings of the articles and sections of this Indenture have been inserted for convenience of reference only, are not intended to be considered a part hereof, and will not modify or restrict any of the terms or provisions hereof.

Section 12.14 *Force Majeure.* The Trustee, Registrar, Paying Agent and Conversion Agent will not incur any liability for not performing any act or fulfilling any duty, obligation or responsibility hereunder by reason of any occurrence beyond the control of such Person (including, but not limited to, any act or provision of any present or future law or regulation or governmental authority, any act of God or war, civil unrest, local or national disturbance or disaster, any act of terrorism, or the unavailability of the Federal Reserve Bank wire or facsimile or other wire or communication facility).

Section 12.15 *Submission to Jurisdiction.* The Company: (a) agrees that any suit, action or proceeding against it arising out of or relating to this Indenture or the Notes, as the case may be, may be instituted in any U.S. federal court with applicable subject matter jurisdiction sitting in The City of New York; (b) waives, to the fullest extent permitted by applicable law, any objection which it may now or hereafter have to the laying of venue of any such suit, action or proceeding, and any claim that any suit, action or proceeding in such a court has been brought in an inconvenient forum; and (c) submits to the nonexclusive jurisdiction of such courts in any suit, action or proceeding.

Section 12.16 *Legal Holidays.* If the Maturity Date or any Interest Payment Date or Fundamental Change Repurchase Date is not a Business Day (which, solely for the purposes of any payment required to be made on the Notes on any such date will be deemed not to include any day on which the office where the place of payment is authorized or required by law to close), then any action to be taken on such date need not be taken on such date, but may be taken on the immediately following Business Day, and no interest on such payment will accrue as a result of such delay.

Section 12.17 *No Security Interest Created.* Except as provided in Section 7.07 or 9.01(b) hereof, nothing in this Indenture or in the Notes, expressed or implied, will be construed to constitute a security interest under the Uniform Commercial Code or similar legislation, as now or hereafter enacted and in effect, in any jurisdiction.

Section 12.18 *Benefits of Indenture.* Nothing in this Indenture or in the Notes, expressed or implied, will give to any Person, other than the parties hereto, any Paying Agent, Conversion Agent, Registrar, and their successors hereunder, and the Holders any benefit or any legal or equitable right, remedy or claim under this Indenture.



Section 12.19 *Withholding Taxes.* Each Holder of any Note agrees, and each beneficial owner of an interest in any Note, by its acquisition of such interest, is deemed to agree, that if the Company or other applicable withholding agent pays withholding taxes or backup withholding on behalf of such Holder or beneficial owner, as applicable, as a result of an adjustment to the Conversion Rate, then the Company or other applicable withholding agent, as applicable, may, at its option, set off such payments against payments of cash and shares of Common Stock on such Note.

Section 12.20 *U.S.A. Patriot Act.* The parties hereto acknowledge that in accordance with Section 326 of the U.S.A. Patriot Act, the Trustee, like all financial institutions, in order to help fight the funding of terrorism and money laundering, is required to obtain, verify and record information that identifies each person or legal entity that establishes a relationship or opens an account with the Trustee. The parties to this Indenture agree that they will provide the Trustee with such information as it may request in order for the Trustee to satisfy the requirements of the U.S.A. Patriot Act.

Section 12.21 *Change of Company's Legal Name.* The Company intends to change its legal name from "Bacterin International Holdings, Inc." to "Xtant Medical Holdings, Inc." following the execution and delivery of this Indenture. For the avoidance of doubt, immediately following such change, each reference herein to "Bacterin International Holdings, Inc." will be deemed to be a reference "Xtant Medical Holdings, Inc." The Company will provide the Trustee with prompt written notice of such change.

[Remainder of Page Intentionally Left Blank; Signature Page Follows]

IN WITNESS WHEREOF, the undersigned have executed this Indenture as of the day and year first written above.

BACTERIN INTERNATIONAL HOLDINGS, INC.

By: /s/ John P. Gandolfo  
Name: John P. Gandolfo  
Title: CFO

WILMINGTON TRUST, NATIONAL ASSOCIATION, as Trustee

By: /s/ Lynn M. Steiner  
Name: Lynn M. Steiner  
Title: Vice President

[Signature Page to Indenture]

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[FORM OF FACE OF NOTE]

[Include the following legend for Global Notes only (the “**Global Note Legend**”):]

THIS IS A GLOBAL NOTE WITHIN THE MEANING OF THE INDENTURE HEREINAFTER REFERRED TO AND IS REGISTERED IN THE NAME OF THE DEPOSITARY OR A NOMINEE OF THE DEPOSITARY, WHICH MAY BE TREATED BY THE COMPANY, THE TRUSTEE AND ANY AGENT THEREOF AS OWNER AND HOLDER OF THIS NOTE FOR ALL PURPOSES.

UNLESS THIS CERTIFICATE IS PRESENTED BY AN AUTHORIZED REPRESENTATIVE OF THE DEPOSITARY TRUST COMPANY TO THE COMPANY OR ITS AGENT FOR REGISTRATION OF TRANSFER, EXCHANGE OR PAYMENT, AND ANY CERTIFICATE ISSUED IS REGISTERED IN THE NAME OF CEDE & CO. OR IN SUCH OTHER NAME AS IS REQUESTED BY AN AUTHORIZED REPRESENTATIVE OF THE DEPOSITARY TRUST COMPANY (AND ANY PAYMENT HEREON IS MADE TO CEDE & CO. OR TO SUCH OTHER ENTITY AS IS REQUESTED BY AN AUTHORIZED REPRESENTATIVE OF THE DEPOSITARY TRUST COMPANY), ANY TRANSFER, PLEDGE OR OTHER USE HEREOF FOR VALUE OR OTHERWISE BY OR TO ANY PERSON IS WRONGFUL SINCE THE REGISTERED OWNER HEREOF, CEDE & CO., HAS AN INTEREST HEREIN.

TRANSFERS OF THIS GLOBAL NOTE WILL BE LIMITED TO TRANSFERS IN WHOLE, BUT NOT IN PART, TO NOMINEES OF THE DEPOSITARY TRUST COMPANY, OR TO A SUCCESSOR THEREOF OR SUCH SUCCESSOR’S NOMINEE, AND TRANSFERS OF PORTIONS OF THIS GLOBAL NOTE WILL BE LIMITED TO TRANSFERS MADE IN ACCORDANCE WITH THE RESTRICTIONS SET FORTH IN ARTICLE 2 OF THE INDENTURE REFERRED TO ON THE REVERSE HEREOF.

[Include the following legend on all Notes that are Transfer-Restricted Securities (the “**Restricted Note Legend**”):]

THE SALE OF THIS NOTE HAS NOT BEEN REGISTERED UNDER THE U.S. SECURITIES ACT OF 1933, AS AMENDED (THE “SECURITIES ACT”), AND, ACCORDINGLY, THIS NOTE (AND ANY BENEFICIAL INTEREST HEREIN) MAY NOT BE OFFERED, RESOLD OR OTHERWISE TRANSFERRED, EXCEPT:

- (A) TO THE COMPANY OR ANY SUBSIDIARY THEREOF;
- (B) PURSUANT TO A REGISTRATION STATEMENT THAT HAS BECOME EFFECTIVE UNDER THE SECURITIES ACT;
- (C) TO A PERSON THAT YOU REASONABLY BELIEVE TO BE A QUALIFIED INSTITUTIONAL BUYER AND IN COMPLIANCE WITH RULE 144A UNDER THE SECURITIES ACT; OR

(D) UNDER ANY OTHER AVAILABLE EXEMPTION FROM THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT (INCLUDING, IF AVAILABLE, THE EXEMPTION PROVIDED BY RULE 144 UNDER THE SECURITIES ACT).

PRIOR TO ANY TRANSFER PURSUANT TO THE FOREGOING CLAUSE (D), THE COMPANY AND THE TRUSTEE RESERVE THE RIGHT TO REQUIRE THE DELIVERY OF SUCH CERTIFICATIONS, LEGAL OPINIONS OR OTHER INFORMATION AS THE COMPANY MAY REASONABLY REQUIRE AND MAY RELY UPON TO CONFIRM THAT SUCH TRANSFER IS BEING MADE PURSUANT TO AN EXEMPTION FROM, OR IN A TRANSACTION NOT SUBJECT TO, THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT AND APPLICABLE SECURITIES LAWS OF ANY OTHER JURISDICTION. NO REPRESENTATION IS MADE AS TO THE AVAILABILITY OF ANY EXEMPTION FROM THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT.

*[Include the following legend for all Notes (the “Non-Affiliate Legend”):]*

NO AFFILIATE (AS DEFINED IN RULE 144 UNDER THE SECURITIES ACT) OF BACTERIN INTERNATIONAL HOLDINGS, INC. MAY PURCHASE OR OTHERWISE ACQUIRE THIS NOTE OR ANY BENEFICIAL INTEREST HEREIN.

No.: [ ]  
CUSIP: [ ]  
ISIN: [ ]

Principal Amount \$[\_\_\_\_\_] ]  
[as revised by the Schedule of Increases  
and Decreases of Global Note attached hereto]<sup>1</sup>

**Bacterin International Holdings, Inc.**  
**6.00% Convertible Senior Notes due 2021**

Bacterin International Holdings, Inc., a Delaware corporation, promises to pay to [ ],<sup>2</sup> or registered assigns, the principal amount of \$[ ] [(as revised by the Schedule of Increases and Decreases of Global Note attached hereto)]<sup>3</sup> on July 15, 2021.

Interest Payment Dates: [[\_\_\_\_\_] and, thereafter,] January 15 and July 15 of each year[, beginning on [\_\_\_\_]].

Regular Record Dates: January 1 or July 1 of each year [(or [\_\_\_\_], in the case of the interest payment due on [\_\_\_\_])].

Additional provisions of this Note are set forth on the other side of this Note.

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<sup>1</sup> Include for Global Notes only.

<sup>2</sup> Insert Cede & Co. (or any other applicable Depository or nominee thereof) for Global Notes.

<sup>3</sup> Include for Global Notes only.

BACTERIN INTERNATIONAL HOLDINGS, INC.

By:

\_\_\_\_\_  
Name:

Title:

Dated:

TRUSTEE'S CERTIFICATE OF AUTHENTICATION

WILMINGTON TRUST, NATIONAL ASSOCIATION, as Trustee, certifies that this is one of the Notes referred to in the within-mentioned Indenture.

By: \_\_\_\_\_  
Authorized Signatory  
Dated:

[FORM OF REVERSE OF NOTE]

**Bacterin International Holdings, Inc.**  
**6.00% Convertible Senior Notes due 2021**

This Note is one of a duly authorized issue of notes of Bacterin International Holdings, Inc. (the “**Company**”), designated as its 6.00% Convertible Senior Notes due 2021 (the “**Notes**”), all issued or to be issued under and pursuant to an indenture dated as of the Issue Date (the “**Indenture**”), between the Company and Wilmington Trust, National Association, as trustee (the “**Trustee**”), to which Indenture and all indentures supplemental thereto reference is hereby made for a description of the rights, limitations of rights, obligations, duties and immunities thereunder of the Trustee, the Company and the Holders. Capitalized terms used herein and not defined herein have the meanings ascribed to them in the Indenture, and the terms of the Notes include those stated in the Indenture and those incorporated into the Indenture. Notwithstanding anything herein to the contrary, to the extent that any provision of this Note conflicts with the express provisions of the Indenture, the provisions of the Indenture will govern and control.

1. Interest.

This Note will bear interest at a rate equal to 6.00% per annum. Interest on this Note will accrue from, and including, the most recent date to which interest has been paid or provided for, or, if no interest has been paid or provided for, [the Issue Date]. Interest will be payable [in arrears on [\_\_] and, thereafter,] semi-annually [in arrears] on January 15 and July 15 of each year[, beginning on [\_\_]]. Each payment of cash interest on this Note will include interest accrued for the period commencing on and including the immediately preceding Interest Payment Date (or, if none, [the Issue Date]) through, and including, the day before the applicable Interest Payment Date.

Pursuant to Section 4.04 of the Indenture and the Registration Rights Agreement, in certain circumstances, the Company will pay Additional Interest on this Note.

Pursuant to Section 6.04 of the Indenture, in certain circumstances, the Company will pay Special Interest on this Note.

Pursuant to Section 2.04 of the Indenture, in certain circumstances, the Company will pay Default Interest on Defaulted Amounts with respect to this Note.



2. Method of Payment.

The Company will promptly make all payments on this Note on the dates and in the manner provided herein and in the Indenture. The Company will pay, or cause the Paying Agent to pay, the principal of and the Fundamental Change Repurchase Price for any Physical Note by check or wire transfer, in the manner set forth below, to the applicable Holder of such Note at the office of the Paying Agent on the relevant payment date upon surrender thereof to the Paying Agent and, if applicable, satisfaction of any other requirements therefor set forth in Article 3 of the Indenture. The Company will pay, or cause the Paying Agent to pay, interest due, on an Interest Payment Date, on (and, subject to the immediately preceding sentence, the principal of or the Fundamental Change Repurchase Price for) any Physical Note to the applicable Holder of such Note (i) by check mailed to such Holder's registered address; or (ii) if such Holder delivers, not later than the Regular Record Date relating to such Interest Payment Date (or, with respect to the payment of the principal of or the Fundamental Change Repurchase Price for such Note, the date that is fifteen (15) days immediately preceding the Maturity Date or related Fundamental Change Repurchase Date, as applicable), a written request to the Registrar that the Company make such payments by wire transfer to an account of such Holder within the United States, by wire transfer of immediately available funds to such account, which request shall remain in effect until such Holder notifies the Registrar, in writing, to the contrary.

3. Paying Agent, Conversion Agent and Registrar.

Initially, Wilmington Trust, National Association will act as the Trustee, Paying Agent, Conversion Agent and Registrar. The Company may appoint and change any Paying Agent, Conversion Agent or Registrar; *provided*, that the Company will maintain at least one Paying Agent, Conversion Agent and Registrar in the continental United States. The Company or any of its Subsidiaries or any of their Affiliates may act as Paying Agent, Conversion Agent or Registrar.

4. Repurchase By the Company at the Option of the Holder upon a Fundamental Change.

At the option of the Holder, and subject to the terms and conditions of the Indenture, upon the occurrence of a Fundamental Change, each Holder will have the right, at its option, to require the Company to repurchase for cash all of its Notes, or any portion of its Notes having a principal amount equal to \$1,000 or an integral multiple of \$1,000 in excess thereof, at a Fundamental Change Repurchase Price equal to 100% of the principal amount of Notes to be purchased plus accrued and unpaid interest, if any, to but excluding, the Fundamental Change Repurchase Date, unless the Fundamental Change Repurchase Date occurs after a Regular Record Date and on or prior to the Interest Payment Date corresponding to such Regular Record Date, in which case the Fundamental Change Repurchase Price for such Notes will be 100% of the principal amount of such Notes, and accrued and unpaid interest, if any, on such Notes to, but excluding, such Interest Payment Date (assuming, solely for these purposes, that such Notes remained outstanding through such Interest Payment Date) will be payable, on such Fundamental Change Repurchase Date, to the Holder of such Notes as of the Close of Business on such Regular Record Date.

5. No Right of Redemption; No Sinking Fund.

The Notes will not be redeemable prior to the Maturity Date at the Company's election, and no sinking fund will be provided for the Notes.

6. Conversion.

Subject to, and upon compliance with, the provisions of Article 10 of the Indenture, a Holder may, at its option, convert all of its Notes (or any portion thereof in an Authorized Denomination) into Conversion Consideration, as provided in Article 10 of the Indenture. Notes may not be converted after the Close of Business on the second (2nd) Business Day immediately preceding the Maturity Date.

7. Registration Rights.

The Holders are entitled to registration rights as set forth in the Registration Rights Agreement and will be entitled to receive Additional Interest pursuant thereto in certain circumstances.

8. Denominations; Transfer; Exchange.

The Notes are in fully registered form, without coupons, in minimum denominations of \$1,000 of principal amount and in integral multiples of \$1,000 in excess thereof. A Holder may transfer or exchange Notes in accordance with the Indenture. The Registrar may require a Holder, among other things, to furnish appropriate endorsements and transfer documents and to pay any taxes and fees required by law or permitted by the Indenture. The Registrar need not transfer or exchange any Notes in respect of which a Fundamental Change Repurchase Notice has been given and not withdrawn (except, in the case of a Note to be repurchased in part, the portion of the Note not to be repurchased) or in respect of which a Conversion Notice has been given (except, in the case of a Note to be converted in part, the portion of the Note not to be converted).

9. Amendment, Supplement and Waiver.

Subject to certain exceptions, the Indenture permits the Indenture and the Notes to be amended or supplemented with the written consent of the Holders of at least a majority in aggregate principal amount of the then outstanding Notes. In certain circumstances, the Company and the Trustee may also amend or supplement the Indenture or the Notes without the consent of any Holder. Subject to certain exceptions, the Indenture permits the waiver of certain Events of Default or the noncompliance with certain provisions of the Indenture and of the Notes with the written consent of the Holders of at least a majority in aggregate principal amount of the then outstanding Notes.

10. Defaults and Remedies.

Subject to the immediately following paragraph, if an Event of Default specified in the Indenture occurs and is continuing, the Trustee, by delivering a written notice to the Company, or the Holders of at least 25% in aggregate principal amount of the Notes then outstanding, by delivering a written notice to the Company and the Trustee, may declare all the Notes to be due and payable immediately. In addition, certain specified Events of Default will cause the Notes to become immediately due and payable without the Trustee or Holders taking any action.

If the Company so elects, the sole remedy for an Event of Default relating to the Company's failure to comply with the reporting obligations under Section 4.03 of the Indenture will, for the first sixty (60) days after the occurrence of such Event of Default, consist exclusively of the right to receive Special Interest on the principal amount of the Notes then outstanding.

Holders may not enforce the Indenture or the Notes except as provided in the Indenture. The Trustee may refuse to enforce the Indenture or the Notes unless it receives indemnity or security satisfactory to it. Holders of a majority of the principal amount of the then outstanding Notes may direct the Trustee in its exercise of any trust or power, subject to certain limitations set forth in the Indenture. Subject to certain exceptions, the Trustee may withhold from Holders notice of any continuing Event of Default or Default if it determines that withholding notice is in their interest.

11. Persons Deemed Owners.

The Holder of this Note will be treated as the owner of this Note for all purposes.

12. Unclaimed Money or Notes.

The Trustee and the Paying Agent will return to the Company upon written request any money or securities held by them for the payment of any amount with respect to the Notes that remain unclaimed for two years, subject to applicable unclaimed property law. After return to the Company, Holders entitled to the money or securities must look to the Company for payment as general creditors, unless an applicable abandoned property law designates another Person.

13. Trustee Dealings with the Company.

The Trustee, in its individual or any other capacity, may become the owner or pledgee of Notes and may otherwise deal with and collect obligations owed to it by the Company or its Affiliates and may otherwise deal with the Company or its Affiliates with the same rights it would have if it were not the Trustee.

14. Calculations in Respect of Notes.

Except as otherwise provided in the Indenture, the Company will be responsible for making all calculations called for under the Notes and the Indenture. These calculations include, but are not limited to, determinations of the Last Reported Sale Price of the Common Stock or any other security, accrued interest (including, for the avoidance of doubt, Additional Interest, Default Interest and Special Interest) payable on the Notes and the Conversion Rate in effect on any Conversion Date.

The Company will make all these calculations in good faith and, absent manifest error, its calculations will be final and binding on all Holders.

15. No Recourse Against Others.

A director, officer, employee or stockholder, as such, of the Company will not have any liability for any obligations of the Company under the Notes or the Indenture or for any claim based on, in respect of or by reason of such obligations or their creation. By accepting a Note, each Holder waives and releases all such liability. The waiver and release are part of the consideration for the issue of the Notes.

16. Authentication.

This Note will not be valid until an authorized signatory of the Trustee manually signs the Trustee's certificate of authentication on the other side of this Note.

17. Abbreviations.

Customary abbreviations may be used in the name of a Holder or an assignee, such as TEN COM (=tenants in common), TEN ENT (=tenants by the entireties), JT TEN (=joint tenants with right of survivorship and not as tenants in common), CUST (=custodian), and U/G/M/A (=Uniform Gift to Minors Act).

18. GOVERNING LAW.

THE INDENTURE AND THE NOTES WILL BE GOVERNED BY, AND CONSTRUED IN ACCORDANCE WITH, THE LAWS OF THE STATE OF NEW YORK.

19. CUSIP Numbers.

Pursuant to a recommendation promulgated by the Committee on Uniform Note Identification Procedures, the Company has caused CUSIP numbers to be printed on the Notes and the Trustee may use CUSIP numbers in any notices as a convenience to Holders. No representation is made as to the accuracy of such numbers either as printed on the Notes or as contained in any notice, and reliance may be placed only on the other identification numbers placed thereon.

The Company will furnish to any Holder, upon written request and without charge, a copy of the Indenture which has in it the text of this Note. Requests may be made to:

Bacterin International Holdings, Inc.  
600 Cruiser Lane  
Belgrade, MT 59714  
Attn: General Counsel

**CONVERSION NOTICE**

BACTERIN INTERNATIONAL HOLDINGS, INC.  
6.00% CONVERTIBLE SENIOR NOTES DUE 2021

To convert this Note, check the box

To convert the entire principal amount of this Note, check the box

To convert only a portion of the principal amount of this Note, check the box  and here specify the principal amount to be converted, which principal amount must equal \$1,000 or an integral multiple of \$1,000 in excess thereof:

\$ \_\_\_\_\_

Signature Guaranteed

\_\_\_\_\_  
Participant in a Recognized Signature  
Guarantee Medallion Program

By: \_\_\_\_\_  
Authorized Signatory

**FUNDAMENTAL CHANGE REPURCHASE NOTICE**

Wilmington Trust, National Association  
Global Corporate Capital Markets  
50 South Sixth Street, Suite 1290  
Minneapolis, MN 55402  
Attention: Bacterin International Holdings, Inc. Account Manager

Bacterin International Holdings, Inc.  
600 Cruiser Lane  
Belgrade, MT 59714  
Attention: General Counsel

The undersigned registered owner of this Note hereby acknowledges receipt of a notice from Bacterin International Holdings, Inc. (the “**Company**”) as to the occurrence of a Fundamental Change with respect to the Company and specifying the Fundamental Change Repurchase Date and requests and instructs the Company to pay to the Holder hereof in accordance with the applicable provisions of the Indenture referred to in this Note (1) the entire principal amount of this Note, or the portion thereof (that is equal to \$1,000 principal amount or an integral multiple of \$1,000 in excess thereof) below designated; and (2) if such Fundamental Change Repurchase Date does not occur during the period after a Regular Record Date and on or prior to the corresponding Interest Payment Date, accrued and unpaid interest, if any, thereon to, but excluding, such Fundamental Change Repurchase Date.

Principal amount to be repaid (if less than all): \$\_\_\_\_\_,000

Signature Guaranteed

\_\_\_\_\_  
Participant in a Recognized Signature

Guarantee Medallion Program

By: \_\_\_\_\_  
Authorized Signatory

[Include for Global Note]

**SCHEDULE OF INCREASES AND DECREASES OF GLOBAL NOTE**

Initial Principal Amount of Global Note: \$[                      ]

| <b>Date</b> | <b>Amount of Increase<br/>in Principal<br/>Amount of Global<br/>Note</b> | <b>Amount of<br/>Decrease in<br/>Principal Amount<br/>of Global Note</b> | <b>Principal Amount<br/>of Global Note<br/>After Increase or<br/>Decrease</b> | <b>Notation by<br/>Registrar or Note<br/>Custodian</b> |
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**[FORM OF RESTRICTED STOCK LEGEND]**

THE SALE OF THIS SECURITY HAS NOT BEEN REGISTERED UNDER THE U.S. SECURITIES ACT OF 1933, AS AMENDED (THE "SECURITIES ACT") OR ANY STATE SECURITIES LAWS, AND, ACCORDINGLY, THIS SECURITY (AND ANY BENEFICIAL INTEREST HEREIN) MAY NOT BE OFFERED, RESOLD OR OTHERWISE TRANSFERRED, EXCEPT:

- (A) TO THE COMPANY OR ANY SUBSIDIARY THEREOF;
- (B) PURSUANT TO A REGISTRATION STATEMENT THAT HAS BECOME EFFECTIVE UNDER THE SECURITIES ACT;
- (C) TO A PERSON THAT YOU REASONABLY BELIEVE TO BE A QUALIFIED INSTITUTIONAL BUYER AND IN COMPLIANCE WITH RULE 144A UNDER THE SECURITIES ACT; OR
- (D) UNDER ANY OTHER AVAILABLE EXEMPTION FROM THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT (INCLUDING, IF AVAILABLE, THE EXEMPTION PROVIDED BY RULE 144 UNDER THE SECURITIES ACT).

PRIOR TO ANY TRANSFER PURSUANT TO THE FOREGOING CLAUSE (D), THE COMPANY AND THE TRANSFER AGENT RESERVE THE RIGHT TO REQUIRE THE DELIVERY OF SUCH CERTIFICATIONS, LEGAL OPINIONS OR OTHER INFORMATION AS THEY MAY REASONABLY REQUIRE AND MAY RELY UPON TO CONFIRM THAT SUCH TRANSFER IS BEING MADE PURSUANT TO AN EXEMPTION FROM, OR IN A TRANSACTION NOT SUBJECT TO, THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT AND APPLICABLE SECURITIES LAWS OF ANY OTHER JURISDICTION. NO REPRESENTATION IS MADE AS TO THE AVAILABILITY OF ANY EXEMPTION FROM THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT.



**FORM OF CERTIFICATE OF TRANSFER**

Bacterin International Holdings, Inc.  
600 Cruiser Lane  
Belgrade, MT 59714  
Attention: General Counsel

Wilmington Trust, National Association  
50 South Sixth Street  
Suite 1290  
Minneapolis, MN 55402  
Attention: Bacterin International Holdings, Inc. Account Manager

Re: 6.00% Convertible Senior Notes due 2021

Reference is hereby made to that certain Indenture (the “**Indenture**”), dated as of July 31, 2015, between Bacterin International Holdings, Inc., a Delaware corporation (“**Company**”), and Wilmington Trust, National Association, a national banking association, as trustee. Capitalized terms used but not defined herein have the respective meanings given to them in the Indenture.

The undersigned (the “**Transferor**”) owns and proposes to transfer (the “**Transfer**”) the following principal amount of the Transferor’s [beneficial interests in the Global Note][Physical Note] identified in Annex A hereto:

\$ \_\_\_\_\_

to:

\_\_\_\_\_ (the “**Transferee**”), as further specified in Annex A hereto. In connection with the Transfer, the Transferor hereby certifies that:

1.  Such Transfer is being made to the Company or a Subsidiary of the Company.
2.  Such Transfer is being made pursuant to, and in accordance with, a registration statement that is effective under the Securities Act at the time of the Transfer.
3.  Such Transfer is being made pursuant to, and in accordance with, Rule 144A under the Securities Act of 1933, as amended (the “Securities Act”), and, accordingly, the Transferor hereby further certifies that such beneficial interest is being transferred to a Person that the Transferor reasonably believes is purchasing such beneficial interest for its own account, or for one or more accounts with respect to which such Person exercises sole investment discretion, and such Person and each such account is a “qualified institutional buyer” within the meaning of Rule 144A in a transaction meeting the requirements of Rule 144A.

4.  Such Transfer is being made pursuant to, and in accordance with, any other available exemption from the registration requirements of the Securities Act (including, if available, the exemption provided by Rule 144 under the Securities Act).

Dated: \_\_\_\_\_

\_\_\_\_\_  
Name of Transferor

By: \_\_\_\_\_  
Name:  
Title:

Signature Guaranteed

\_\_\_\_\_  
Participant in a Recognized Signature

Guarantee Medallion Program

By: \_\_\_\_\_  
Authorized Signatory

ANNEX A TO CERTIFICATE OF TRANSFER

1. The Transferor owns and proposes to transfer the following (check one):

- a.  a beneficial interest in a Rule 144A Global Note (CUSIP # \_\_\_\_\_); or
- b.  a Rule 144A Physical Note (CUSIP # \_\_\_\_\_); or
- c.  a beneficial interest in an Institutional Accredited Investor Global Note (CUSIP # \_\_\_\_\_); or
- d.  an Institutional Accredited Investor Physical Note (CUSIP # \_\_\_\_\_).

2. After the Transfer, the Transferee will hold: the following:

- a.  a beneficial interest in a Rule 144A Global Note (CUSIP # \_\_\_\_\_); or
- b.  a Rule 144A Physical Note (CUSIP # \_\_\_\_\_); or
- c.  a beneficial interest in an Institutional Accredited Investor Global Note (CUSIP # \_\_\_\_\_); or
- d.  an Institutional Accredited Investor Physical Note (CUSIP # \_\_\_\_\_); or
- e.  a beneficial interest in an “unrestricted” Global Note (CUSIP # \_\_\_\_\_).
- f.  an “unrestricted” Physical Note (CUSIP # \_\_\_\_\_).

## FORM OF CERTIFICATE FROM TRANSFEREE

Bacterin International Holdings, Inc.  
600 Cruiser Lane  
Belgrade, MT 59714  
Attention: General Counsel

Wilmington Trust, National Association  
50 South Sixth Street  
Suite 1290  
Minneapolis, MN 55402  
Attention: Bacterin International Holdings, Inc. Account Manager

Re: 6.00% Convertible Senior Notes due 2021

Reference is hereby made to that certain Indenture (the “**Indenture**”), dated as of July 31, 2015, between Bacterin International Holdings, Inc., a Delaware corporation (“**Company**”), and Wilmington Trust, National Association, a national banking association, as trustee. Capitalized terms used but not defined herein have the respective meanings given to them in the Indenture.

The undersigned (the “**Transferee**”) hereby certifies, in connection with its proposed acquisition of:

\$ \_\_\_\_\_ aggregate principal amount of Notes hereby certifies as follows:

1. The Transferee is acquiring the notes for the Transferee’s own account or for an account with respect to which the Transferee exercises sole investment discretion, and the Transferee and such account are: (check one)
  - a.  a “qualified institutional buyer” (as defined under Rule 144A under the Securities Act); or
  - b.  an institutional “accredited investor” (as defined under Rule 501(a)(1), (2), (3) or (7) of Regulation D under the Securities Act).
2. The Transferee acknowledges that the offer and sale of such Notes (and any shares of Common Stock issuable upon conversion thereof) have not been registered under the Securities Act or the securities laws of any other jurisdiction and that such Notes (and any such shares) may not be offered, sold, pledged or otherwise transferred except as set forth below.

3. The Transferee will not resell or otherwise transfer any of such Notes (or any shares of Common Stock issuable upon conversion of such Notes), except:
  - a. to the Company or one of its Subsidiaries;
  - b. under, and in accordance with, a registration statement that is effective under the Securities Act at the time of such transfer;
  - c. to a Person that the Transferee reasonably believes to be a “qualified institutional buyer” in compliance with Rule 144A under the Securities Act (if available); or
  - d. under any other available exemption from the registration requirements of the Securities Act (including, if available, the exemption provided by Rule 144 under the Securities Act).
4. With respect to any transfer made pursuant to paragraph 3(d) above, the Transferee will deliver to the Company and the Trustee (with respect to a transfer of such Notes) or the transfer agent (with respect to a transfer of any shares of Common Stock issued upon the conversion of such Notes) such certificates, legal opinions and other information as the Company or they may reasonably require and may rely upon to confirm that the transfer by the Transferee complies with the foregoing restrictions. The Transferee will, and each subsequent holder is required to, notify anyone who purchases such Notes or any such shares from it of the above resale restrictions.
5. The Transferee is not an “affiliate” (within the meaning of Rule 144 under the Securities Act) of Bacterin International Holdings, Inc. and the Transferee understands that such Notes will bear a legend substantially to the following effect:

NO AFFILIATE (AS DEFINED IN RULE 144 UNDER THE SECURITIES ACT) OF THE COMPANY MAY PURCHASE OR OTHERWISE ACQUIRE THIS NOTE OR ANY BENEFICIAL INTEREST HEREIN.

Dated: \_\_\_\_\_

\_\_\_\_\_  
Name of Transferee

By: \_\_\_\_\_  
Name:  
Title:

## REGISTRATION RIGHTS AGREEMENT

July 31, 2015

Leerink Partners LLC  
One Federal Street, 37th Floor  
Boston, Massachusetts 02110

OrbiMed Royalty Opportunities II, LP  
c/o OrbiMed Advisors LLC  
601 Lexington Ave., 54 th Floor  
New York, NY 10022

ROS Acquisition Offshore LP  
c/o OrbiMed Advisors LLC  
601 Lexington Ave., 54 th Floor  
New York, NY 10022

Ladies and Gentlemen:

Bacterin International Holdings, Inc., a Delaware corporation (the “**Company**”), proposes to issue and sell to Leerink Partners LLC, OrbiMed Royalty Opportunities II, LP and ROS Acquisition Offshore LP (the “**Initial Purchasers**”) its 6.00% Convertible Senior Notes due 2021 (the “**Notes**”), upon the terms set forth in the Purchase Agreement between the Company and Leerink Partners LLC, dated July 27, 2015, and the Securities Purchase Agreement among the Company, OrbiMed Royalty Opportunities II, LP and ROS Acquisition Offshore LP, dated July 27, 2015 (such purchase agreement and securities purchase agreement, the “**Purchase Agreements**”). Upon a conversion of Notes at the option of the holder thereof, the Company will be required to deliver shares of common stock of the Company, \$0.000001 par value per share (the “**Common Stock**”). To induce the Initial Purchasers to enter into the Purchase Agreements and to satisfy the Company’s obligations thereunder, the holders of the Notes will have the benefit of this registration rights agreement (this “**Agreement**”) pursuant to which the Company agrees with the Initial Purchasers for the benefit of the Initial Purchasers and for the benefit of the holders (the “**Holder**s”) from time to time of the Registrable Securities (as defined below), as follows:

1. *Definitions.* As used in this Agreement, the following capitalized defined terms shall have the following meanings:

“**Additional Interest**” has the meaning set forth in Section 7 hereof.

“**Affiliate**” has the meaning set forth in Rule 405 under the Securities Act.

“**Broker-Dealer**” means any broker or dealer registered as such under the Exchange Act.

“**Business Day**” has the meaning set forth in the Indenture.

“**Close of Business**” has the meaning set forth in the Indenture.

“**Closing Date**” means the date hereof.

“**Company**” has the meaning set forth in the preamble hereto.

“**Commission**” means the Securities and Exchange Commission.

“**Common Stock**” has the meaning set forth in the preamble hereto.

“**Control**” has the meaning set forth in Rule 405 under the Securities Act, and the terms “controlling” and “controlled” shall have meanings correlative thereto.

“**Conversion Date**” has the meaning set forth in the Indenture.

“**Deferral Period**” has the meaning indicated in Section 3(i) hereof.

“**Depository**” has the meaning set forth in the Indenture.

“**Exchange Act**” means the Securities Exchange Act of 1934, as amended, and the rules and regulations of the Commission promulgated thereunder.

“**Final Memorandum**” means the offering memorandum, dated July 27, 2015, relating to the Notes, including any and all annexes thereto and any information incorporated by reference therein as of such date.

“**FINRA Rules**” means the Conduct Rules and the By-Laws of the Financial Industry Regulatory Authority, Inc.

“**Holder**” has the meaning set forth in the preamble hereto.

“**Indenture**” means the Indenture relating to the Notes, dated as of July 31, 2015, between the Company and Wilmington Trust, National Association, as trustee, as the same may be amended from time to time in accordance with the terms thereof.

“**Initial Purchasers**” has the meaning set forth in the preamble hereto.

“**Losses**” has the meaning set forth in Section 5(d) hereof.

“**Majority Holders**” means, on any date, Holders of Registrable Securities that represent a majority of the shares of Common Stock that underlie (or were issued upon conversion of) the Notes and whose offer and sale is registered under the Shelf Registration Statement.

“**Managing Underwriters**” means the investment bank(s) and manager(s) that administer an underwritten offering, if any, conducted pursuant to Section 6 hereof.

“**Maturity Date**” has the meaning set forth in the Indenture.

“**Notes**” has the meaning set forth in the preamble hereto.

“**Notice and Questionnaire**” means a written notice delivered to the Company substantially in the form attached as Annex A to the Final Memorandum.

“**Notice Holder**” means, on any date, any Holder that has delivered a completed Notice and Questionnaire to the Company on or before such date.

“**Prospectus**” means a prospectus included in the Shelf Registration Statement (including, without limitation, a prospectus that discloses information previously omitted from a prospectus filed as part of an effective registration statement in reliance upon Rule 430A or Rule 430B under the Securities Act), as amended or supplemented by any prospectus supplement, with respect to the terms of the offering of any portion of the Notes and the shares of Common Stock covered by the Shelf Registration Statement, and all amendments and supplements thereto, including any and all exhibits thereto and any information incorporated by reference therein.

“**Purchase Agreement**” has the meaning set forth in the preamble hereto.

“**Registrable Securities**” means the Notes initially sold to the Initial Purchasers pursuant to the Purchase Agreements and the shares of Common Stock issuable upon conversion of such Notes, and any securities into or for which such Notes or shares have been converted or exchanged, and any security issued with respect thereto upon any stock dividend, split or similar event; *provided, however*, that each such security will cease to constitute Registrable Securities upon the earliest to occur of (i) such security being sold pursuant to a registration statement that is effective under the Securities Act; and (ii) such security ceasing to be outstanding.

“**Registration Default**” has the meaning set forth in Section 7 hereof.

“**Securities Act**” means the Securities Act of 1933, as amended, and the rules and regulations of the Commission promulgated thereunder.

“**Shelf Registration Period**” has the meaning set forth in Section 2(b) hereof.

“**Shelf Registration Statement**” means a “shelf” registration statement of the Company prepared pursuant to Section 2 hereof that covers the resale, from time to time pursuant to Rule 415 under the Securities Act (or any successor thereto), of some or all of the Registrable Securities on an appropriate form under the Securities Act, including all post-effective and other amendments and supplements to such registration statement, the related Prospectus, all exhibits thereto and all material incorporated by reference therein.

“**Trading Day**” has the meaning set forth in the Indenture.

“**Underwriter**” means any underwriter of Registrable Securities for an offering thereof under the Shelf Registration Statement.



2. *Shelf Registration.* (a) The Company will file with the Commission a Shelf Registration Statement (which, initially, will be on Form S-1 and, as soon as the Company is eligible, will be on Form S-3) providing for the registration of the offer and sale, from time to time on a continuous or delayed basis, of the Registrable Securities by the Holders in accordance with the methods of distribution elected by such Holders, pursuant to Rule 415 under the Securities Act (or any successor thereto) and will use its best efforts to cause such Shelf Registration Statement to become effective under the Securities Act no later than the one hundred and eightieth (180th) day after the Closing Date.

(b) The Company will use its best efforts to keep the Shelf Registration Statement continuously effective, supplemented and amended as required by the Securities Act, in order to permit the related Prospectus to be usable by Holders for a period (the “**Shelf Registration Period**”) from the date the Shelf Registration Statement becomes effective to, and including, the earlier of (i) the sixtieth (60th) Trading Day immediately following the Maturity Date (subject to extension for any suspension of the effectiveness of the Shelf Registration Statement during such sixty (60) Trading Days immediately following the Maturity Date); and (ii) the date upon which no Registrable Securities are outstanding and constitute “restricted securities” (as defined in Rule 144 under the Securities Act).

(c) The Company will cause the Shelf Registration Statement and the related Prospectus and any amendment or supplement thereto, as of the effective date of the Shelf Registration Statement or such amendment or supplement, (i) to comply in all material respects with the applicable requirements of the Securities Act; and (ii) not to contain any untrue statement of a material fact or omit to state a material fact required to be stated therein or necessary in order to make the statements therein (in the case of the Prospectus, in the light of the circumstances under which they were made) not misleading.

(d) Subject to applicable law, the Company will provide written notice to the Holders of the anticipated effective date of the Shelf Registration Statement at least ten (10) Business Days before such anticipated effective date. Each Holder, in order to be named in the Shelf Registration Statement at the time of its initial effectiveness, will be required to deliver a Notice and Questionnaire and such other information as the Company may reasonably request in writing, if any, to the Company on or before the fifth (5th) day before the anticipated effective date of the Shelf Registration Statement as provided in the notice. Subject to Section 3(i), from and after the effective date of the Shelf Registration Statement, the Company will, as promptly as is practicable after the date a Holder’s Notice and Questionnaire is delivered, but in no event after the tenth (10th) day after such date, (i) file with the Commission an amendment to the Shelf Registration Statement or prepare and, if permitted or required by applicable law, file a supplement to the Prospectus or an amendment or supplement to any document incorporated therein by reference or file any other required document so that such Holder delivering such Notice and Questionnaire is named as a selling securityholder in the Shelf Registration Statement and the related Prospectus, and so that such Holder is permitted to deliver such Prospectus to purchasers of Registrable Securities in accordance with applicable law (except that the Company will not be required to file more than one supplement or post-effective amendment in any thirty (30) day period in accordance with this Section 2(d)(i) and, in the case of a post-effective amendment to the Shelf Registration Statement, the Company will use its best efforts to cause such post-effective amendment to become effective under the Securities Act as promptly as is practicable; (ii) provide such Holder, upon request, copies of any documents filed pursuant to Section 2(d)(i) hereof; and (iii) notify such Holder as promptly as practicable after the effectiveness under the Securities Act of any post-effective amendment filed pursuant to Section 2(d)(i) hereof; *provided, however*, that if such Notice and Questionnaire is delivered during a Deferral Period, then the Company will so inform the Holder delivering such Notice and Questionnaire and will take the actions set forth in clauses (i), (ii) and (iii) above upon expiration of the Deferral Period in accordance with Section 3(i) hereof. Notwithstanding anything to the contrary herein, the Company need not name any Holder that is not a Notice Holder as a selling securityholder in the Shelf Registration Statement or Prospectus; *provided, however*, that any Holder that becomes a Notice Holder pursuant to this Section 2(d) (whether or not such Holder was a Notice Holder at the effective date of the Shelf Registration Statement) will be named as a selling securityholder in the Shelf Registration Statement or Prospectus in accordance with this Section 2(d).

3. *Registration Procedures.* The following provisions will apply in connection with the Shelf Registration Statement.

(a) The Company will:

(i) furnish to the Initial Purchasers and to counsel for the Notice Holders, not less than five (5) Business Days before the filing thereof with the Commission, a copy of the Shelf Registration Statement and each amendment thereto and each amendment or supplement, if any, to the Prospectus (other than amendments and supplements that do nothing more than name Notice Holders and provide information with respect thereto and other than filings by the Company under the Exchange Act) and will use its best efforts to reflect in each such document, when so filed with the Commission, such comments as the Initial Purchasers reasonably propose within three (3) Business Days of the delivery of such copies to the Initial Purchasers; and

(ii) include information regarding the Notice Holders and the methods of distribution they have elected for their Registrable Securities provided to the Company in Notices and Questionnaires as necessary to permit such distribution by the methods specified therein.

(b) The Company will ensure that:

(i) the Shelf Registration Statement and any amendment thereto, and any Prospectus and any amendment or supplement thereto, comply in all material respects with the Securities Act; and

(ii) the Shelf Registration Statement and any amendment thereto do not, when each becomes effective, contain an untrue statement of a material fact or omit to state a material fact required to be stated therein or necessary to make the statements therein not misleading.

(c) The Company will advise the Initial Purchasers, the Notice Holders and any Underwriter that has provided in writing to the Company a telephone or email or other address for notices, and confirm such advice in writing, if requested (which notice pursuant to clauses (ii) to (v), inclusive, below will be accompanied by an instruction to suspend the use of the Prospectus until the Company has remedied the basis for such suspension):

(i) when the Shelf Registration Statement and any amendment thereto have been filed with the Commission and when the Shelf Registration Statement or any post-effective amendment thereto has become effective;

(ii) of any request by the Commission for any amendment or supplement to the Shelf Registration Statement or the Prospectus or for additional information;

(iii) of the issuance by the Commission of any stop order suspending the effectiveness of the Shelf Registration Statement or the institution or threatening of any proceeding for that purpose;

(iv) of the receipt by the Company of any notification with respect to the suspension of the qualification of the Common Stock included therein for sale in any jurisdiction or the institution or threatening of any proceeding for such purpose; and

(v) of the happening of any event that requires any change in the Shelf Registration Statement or the Prospectus so that they do not contain any untrue statement of a material fact and do not omit to state a material fact required to be stated therein or necessary to make the statements therein (in the case of the Prospectus, in the light of the circumstances under which they were made) not misleading.

(d) The Company will use its best efforts to prevent the issuance of any order suspending the effectiveness of the Shelf Registration Statement or the qualification of the securities therein for sale in any jurisdiction and, if issued, to obtain as soon as practicable the withdrawal thereof.

(e) Upon request, the Company will furnish, in electronic or physical form, to each Notice Holder, without charge, one copy of the Shelf Registration Statement and any post-effective amendment thereto, including all material incorporated therein by reference, and, if a Notice Holder so requests in writing, all exhibits thereto (including exhibits incorporated by reference therein).

(f) During the Shelf Registration Period, the Company will promptly deliver to each Initial Purchaser, each Notice Holder, and any sales or placement agents or underwriters acting on their behalf, without charge, as many copies of the Prospectus (including the preliminary Prospectus, if any) relating to the Shelf Registration Statement and any amendment or supplement thereto as such person may reasonably request. Subject to the restrictions set forth in this Agreement, the Company consents to the use of the Prospectus or any amendment or supplement thereto by each of the foregoing in connection with the offering and sale of the Registrable Securities.

(g) Before any offering of Registrable Securities pursuant to the Shelf Registration Statement, the Company will arrange for the qualification of the Registrable Securities for sale under the laws of such U.S. jurisdictions as any Notice reasonably requests and will maintain such qualification in effect so long as required; *provided, however*, that in no event will the Company be obligated by this Agreement to qualify to do business or as a dealer of securities in any jurisdiction where it is not then so qualified or to take any action that would subject it to taxation or service of process in suits in any jurisdiction where it is not then so subject. If, at any time during the Shelf Registration Period, the Registrable Securities are not “covered securities” within the meaning of Section 18 of the Securities Act, then the Company will arrange for such qualification (subject to the proviso of the immediately preceding paragraph) in each U.S. jurisdiction of residence of each Notice Holder.

(h) Upon the occurrence of any event contemplated by subsections (c)(ii) to (v), inclusive, above, the Company will promptly (or within the time period provided for by Section 3(i) hereof, if applicable) prepare a post-effective amendment to the Shelf Registration Statement or an amendment or supplement to the Prospectus or file any other required document so that the Shelf Registration Statement and the Prospectus will not include an untrue statement of a material fact or omit to state any material fact required to be stated therein or necessary to make the statements therein (in the case of the Prospectus, in the light of the circumstances under which they were made) not misleading.

(i) Upon the occurrence or existence of any pending corporate development, public filings with the Commission or any other material event that, in the reasonable judgment of the Company, makes it appropriate to suspend the availability of the Shelf Registration Statement and the Prospectus, the Company will give notice (without notice of the nature or details of such events) to the Notice Holders that the availability of the Shelf Registration Statement is suspended and, upon receipt of any such notice, each Notice Holder agrees: (i) not to sell any Registrable Securities pursuant to the Shelf Registration Statement until such Notice Holder receives copies of the supplemented or amended Prospectus provided for in Section 3(i) hereof, or until it is advised in writing by the Company that the Prospectus may be used; and (ii) to hold such notice in confidence. Except in the case of a suspension of the availability of the Shelf Registration Statement and the Prospectus solely as the result of filing a post-effective amendment or supplement to the Prospectus to add additional selling securityholders therein, the period during which the availability of the Shelf Registration Statement and any Prospectus is suspended (the “**Deferral Period**”) will not exceed an aggregate of (A) thirty (30) days (or, if the Shelf Registration Statement is on Form S-1 (or any successor thereto), sixty (60) days) in any calendar quarter; or (B) sixty (60) days (or, if the shelf registration statement is on Form S-1 (or any successor thereto), ninety (90) days) in any calendar year.

(j) The Company will comply with all applicable rules and regulations of the Commission and will make generally available to its securityholders an earnings statement (which need not be audited) satisfying the provisions of Section 11(a) of the Securities Act as soon as practicable after the effective date of the Shelf Registration Statement and in any event no later than forty five (45) days after the end of the twelve (12) month period (or ninety (90) days, if such period is a fiscal year) beginning with the first month of the Company’s first fiscal quarter commencing after the effective date of the Shelf Registration Statement.

(k) The Company may require each Holder of Registrable Securities to be sold pursuant to the Shelf Registration Statement to furnish to the Company such information regarding the Holder and the distribution of such Registrable Securities as the Company may from time to time reasonably require for inclusion in the Shelf Registration Statement in order to comply with the Securities Act. The Company may exclude from the Shelf Registration Statement the Registrable Securities of any Holder that unreasonably fails to furnish such information within a reasonable time after receiving a request from the Company for such information.

(l) Subject to Section 6 hereof, the Company will enter into customary agreements (including, if requested by the Majority Holders, an underwriting agreement in customary form that, for the avoidance of doubt, will provide for customary representations and warranties, legal opinions, comfort letters and other documents and certifications) and take all other necessary actions in order to expedite or facilitate the registration or the disposition of the Registrable Securities, and in connection therewith, if an underwriting agreement is entered into, cause the same to contain customary indemnification provisions and procedures.

(m) Subject to Section 6 hereof, for persons who are or may be “underwriters” with respect to the Registrable Securities within the meaning of the Securities Act and who make appropriate requests for information to be used solely for the purpose of taking reasonable steps to establish a due diligence or similar defense in connection with the proposed sale of such Registrable Securities pursuant to the Shelf Registration, the Company will:

(i) make reasonably available during business hours for inspection by the Holders, any Underwriter participating in any disposition pursuant to the Shelf Registration Statement and any attorney, accountant or other agent retained by the Holders or any such Underwriter all relevant financial and other records and pertinent corporate documents of the Company and its subsidiaries; and

(ii) cause the Company’s officers, directors, employees, accountants and auditors to supply all relevant information reasonably requested by the Holders or any such Underwriter, attorney, accountant or agent in connection with the Shelf Registration Statement as is customary for similar due diligence examinations.

(n) In the event that any Broker-Dealer underwrites any Registrable Securities or participates as a member of an underwriting syndicate or selling group or “participates in an offering” (within the meaning of the FINRA Rules) thereof, whether as a Holder or as an underwriter, placement, sales agent or broker or dealer in respect thereof, or otherwise, the Company will, upon the reasonable request of such Broker-Dealer, comply with any reasonable request of such Broker-Dealer in complying with the FINRA Rules.

(o) The Company will use its best efforts to take all other steps necessary to effect the registration of the offer and sale of the Registrable Securities covered by the Shelf Registration Statement.

4. *Registration Expenses.* The Company will bear all expenses incurred in connection with the performance of its obligations under Sections 2 and 3 hereof. The Company will reimburse the Initial Purchasers and the Holders for the reasonable fees and disbursements of one firm or counsel (which will initially be Latham & Watkins LLP, but that may be another nationally recognized law firm experienced in securities matters designated by the Majority Holders) to act as counsel for the Holders in connection therewith, which fees and disbursements will not exceed \$15,000 in the aggregate.

5. *Indemnification and Contribution.* (a) The Company agrees to indemnify and hold harmless each Holder, the directors, officers, employees, Affiliates and agents of each Holder and each person who controls any Holder within the meaning of the Securities Act or the Exchange Act against any and all losses, claims, damages or liabilities, joint or several, to which they or any of them may become subject under the Securities Act, the Exchange Act or other federal or state statutory law or regulation, at common law or otherwise, insofar as such losses, claims, damages or liabilities (or actions in respect thereof) arise out of or are based upon any untrue statement or alleged untrue statement of a material fact contained in the Shelf Registration Statement as originally filed or in any amendment thereof, or in any preliminary Prospectus or the Prospectus, or in any amendment thereof or supplement thereto, or caused by the omission or alleged omission to state therein a material fact required to be stated therein or necessary to make the statements therein (in the case of any preliminary Prospectus or the Prospectus, in the light of the circumstances under which they were made) not misleading, and agrees to reimburse each such indemnified party, as incurred, for any legal or other expenses reasonably incurred by it in connection with investigating or defending any such loss, claim, damage, liability or action; *provided, however*, that the Company will not be liable in any such case to the extent that any such loss, claim, damage or liability arises out of or is based upon any such untrue statement or alleged untrue statement or omission or alleged omission made therein in reliance upon and in conformity with written information furnished to the Company by or on behalf of the party claiming indemnification specifically for inclusion therein.

The Company also agrees to provide customary indemnities to, and to contribute as provided in Section 5(d) hereof to Losses of, any underwriters of the Registrable Securities, their officers, directors and employees and each Person who controls such underwriters (within the meaning of the Securities Act or the Exchange Act) to the same extent as provided herein with respect to the Holders.

(b) Each Holder of securities covered by the Shelf Registration Statement (including each Initial Purchaser that is a Holder, in such capacity) severally and not jointly agrees to indemnify and hold harmless the Company, each of the Company's directors, each of the Company's officers who sign the Shelf Registration Statement and each person who controls the Company within the meaning of the Securities Act or the Exchange Act, to the same extent as the foregoing indemnity from the Company to each such Holder, but only with reference to written information relating to such Holder furnished to the Company by or on behalf of such Holder specifically for inclusion in the documents referred to in the foregoing indemnity. This indemnity agreement will be acknowledged by each Notice Holder that is not an Initial Purchaser in such Notice Holder's Notice and Questionnaire and will be in addition to any liability that any such Notice Holder may otherwise have.

(c) Promptly after receipt by an indemnified party under this Section 5 or notice of the commencement of any action, such indemnified party will, if a claim in respect thereof is to be made against the indemnifying party under this Section 5, notify the indemnifying party in writing of the commencement thereof, but the failure so to notify the indemnifying party (i) will not relieve it from liability under paragraph (a) or (b), as applicable, above unless and to the extent it has been materially prejudiced through the forfeiture by the indemnifying party of substantial rights and defenses; and (ii) will not, in any event, relieve the indemnifying party from any obligations to any indemnified party other than the indemnification obligation provided in paragraph (a) or (b), as applicable, above. If any action is brought against an indemnified party and it has notified the indemnifying party thereof, the indemnifying party will be entitled to appoint counsel (including local counsel) of the indemnifying party's choice at the indemnifying party's expense to represent the indemnified party in any action for which indemnification is sought (in which case, the indemnifying party will not thereafter be responsible for the fees and expenses of any separate counsel, other than local counsel if not appointed by the indemnifying party, retained by the indemnified party or parties, except as set forth below); *provided, however*, that such counsel will be reasonably satisfactory to the indemnified party. Notwithstanding the indemnifying party's election to appoint counsel (including local counsel) to represent the indemnified party in an action, the indemnified party will have the right to employ separate counsel (including local counsel), and the indemnifying party will bear the reasonable fees, costs and expenses of such separate counsel if (i) the use of counsel chosen by the indemnifying party to represent the indemnified party would present such counsel with a conflict of interest; (ii) the actual or potential defendants in, or targets of, any such action include both the indemnified party and the indemnifying party and the indemnified party has reasonably concluded that there may be legal defenses available to it and/or other indemnified parties that are different from or additional to those available to the indemnifying party; (iii) the indemnifying party has not employed counsel reasonably satisfactory to the indemnified party to represent the indemnified party within a reasonable time after notice of the institution of such action; or (iv) the indemnifying party has authorized the indemnified party to employ separate counsel at the expense of the indemnifying party. The indemnifying party will not, in connection with any proceeding or related proceeding in the same jurisdiction, be liable for the fees and expenses of more than one (1) separate law firm (in addition to any local counsel) for all indemnified persons. An indemnifying party will not, without the prior written consent of the indemnified parties, settle or compromise or consent to the entry of any judgment with respect to any pending or threatened claim, action, suit or proceeding in respect of which indemnification or contribution may be sought hereunder (whether or not the indemnified parties are actual or potential parties to such claim or action) unless such settlement, compromise or consent includes an unconditional release of each indemnified party from all liability arising out of such claim, action, suit or proceeding and does not include an admission of fault, culpability or a failure to act, by or on behalf of any such indemnified party.

(d) In the event that the indemnity provided in paragraph (a) or (b) of this Section 5 is unavailable to or insufficient to hold harmless an indemnified party for any reason, then each applicable indemnifying party will have a several, and not joint, obligation to contribute to the aggregate losses, claims, damages and liabilities (including legal or other expenses reasonably incurred in connection with investigating or defending such losses, claims, damages, liabilities or actions) (collectively “**Losses**”) to which such indemnified party may be subject in such proportion as is appropriate to reflect the relative benefits received by such indemnifying party, on the one hand, and such indemnified party, on the other hand, from the offering of the Registrable Securities and the Shelf Registration Statement that resulted in such Losses; *provided, however*, that in no case will Leerink Partners LLC be responsible, in the aggregate, for any amount in excess of the purchase discount or commission applicable to the Notes that it purchased from the Company, as set forth in the applicable Purchase Agreement, nor will any underwriter be responsible for any amount in excess of the underwriting discount or commission applicable to the securities purchased by such underwriter under the Shelf Registration Statement that resulted in such Losses. If the allocation provided by the immediately preceding sentence is unavailable for any reason, then the indemnifying party and the indemnified party will contribute in such proportion as is appropriate to reflect not only such relative benefits but also the relative fault of such indemnifying party, on the one hand, and such indemnified party, on the other hand, in connection with the statements or omissions, or alleged statements or omissions, that resulted in such Losses as well as any other relevant equitable considerations. Benefits received by the Company will be deemed to be equal to the total net proceeds from the offering of the Notes (before deducting expenses) as set forth in the Final Memorandum. Benefits received by Leerink Partners LLC will be deemed to be equal to the total purchase discounts or commissions applicable to the Notes that it purchased from the Company, as set forth in the applicable Purchase Agreement, and benefits received by any other Holder will be deemed to be equal to the value of having the offer and sale of such Holder’s Registrable Securities registered under the Securities Act pursuant to the Shelf Registration Statement and hereunder. Benefits received by any underwriter will be deemed to be equal to the total underwriting discounts and commissions, as set forth on the cover page of the Prospectus relating to the Shelf Registration Statement that resulted in such Losses. Relative fault will be determined by reference to, among other things, whether any untrue or any alleged untrue statement of a material fact or omission or alleged omission to state a material fact relates to information provided by the indemnifying party, on the one hand, or by the indemnified party, on the other hand, the intent of the parties and their relative knowledge, access to information and opportunity to correct or prevent such untrue statement or omission or alleged untrue statement or omission. The parties agree that it would not be just and equitable if contribution were determined by pro rata allocation (even if the Holders were treated as one entity for such purpose) or any other method of allocation which does not take account of the equitable considerations referred to above. Notwithstanding anything to the contrary in this Section 5(d), no person guilty of fraudulent misrepresentation (within the meaning of Section 11(f) of the Securities Act) will be entitled to contribution from any person who was not guilty of such fraudulent misrepresentation. For purposes of this Section 5, each person who controls a Holder within the meaning of the Securities Act or the Exchange Act and each director, officer, employee, Affiliate and agent of such Holder will have the same rights to contribution as such Holder, and each person who controls the Company within the meaning of the Securities Act or the Exchange Act, each officer of the Company who signed the Shelf Registration Statement and each director of the Company will have the same rights to contribution as the Company, subject in each case to the applicable terms and conditions of this Section 5(d).

(e) The provisions of this Section 5 will remain in full force and effect, regardless of any investigation made by or on behalf of any Initial Purchaser or Holder or the Company or any of the indemnified persons referred to in this Section 5, and will survive the sale by a Holder of securities covered by the Shelf Registration Statement.

6. *Underwritten Registrations.* (a) Notwithstanding anything to the contrary herein, in no event will the method of distribution of Registrable Securities take the form of an underwritten offering without the prior written consent of the Company. Consent may be conditioned on waivers of any of the obligations in Section 3, 4 or 5 hereof.



(b) If any Registrable Securities are to be sold in an underwritten offering, the Managing Underwriters will be selected by the Company, subject to the prior written consent of the Majority Holders, which consent will not be unreasonably withheld.

(c) No person may participate in any underwritten offering pursuant to the Shelf Registration Statement unless such person: (i) agrees to sell such person's Registrable Securities on the basis reasonably provided in any underwriting arrangements approved by the persons entitled hereunder to approve such arrangements; and (ii) completes and executes all questionnaires, powers of attorney, indemnities, underwriting agreements and other documents reasonably required under the terms of such underwriting arrangements.

7. *Registration Defaults.* If any of the following events shall occur (each, a "**Registration Default**"), then the Company will pay additional interest on the Notes ("**Additional Interest**") as follows:

(a) if the Shelf Registration Statement has not been filed with the Commission and has not become effective on or before the one hundred and eightieth (180th) day after the Closing Date, then, commencing on the one hundred and eighty first (181st) day after the Closing Date, Additional Interest will accrue on the aggregate outstanding principal amount of the Notes at a rate of 0.25% per annum for the first 90 days beginning on, and including, such one hundred and eighty first (181st) day and 0.50% per annum thereafter;

(b) if the Shelf Registration Statement has become effective but ceases to be effective or usable for the offer and sale of the Registrable Securities (other than in connection with (i) a Deferral Period; or (ii) as a result filing a post-effective amendment solely to add additional selling securityholders) at any time during the Shelf Registration Period and the Company does not cure the lapse of effectiveness or usability within ten (10) Business Days (or, if a Deferral Period is then in effect, within ten (10) Business Days after the expiration of such Deferral Period) (or, in the case of filing a post-effective amendment solely to add additional selling securityholders, within ten (10) Business Days after the expiration of the ten (10) day period referred to in Section 2(d), subject to the proviso therein), then Additional Interest will accrue on the aggregate outstanding principal amount of the Notes at a rate of 0.25% per annum for the first ninety (90) days beginning on, and including, the day following such tenth (10th) Business Day and 0.50% per annum thereafter;

(c) if the Company, through its omission, fails to name as a selling securityholder any Holder that had complied timely with its obligations hereunder in a manner to entitle such Holder to be so named in (i) the Shelf Registration Statement at the time it first became effective; or (ii) any Prospectus at the time it is filed with the Commission (or, if later, the effective date of the Shelf Registration Statement), then Additional Interest will accrue on the aggregate outstanding principal amount of the Notes held by such Holder at a rate of 0.25% per annum for the first ninety (90) days beginning on, and including, the day following the effective date of such Shelf Registration Statement or the filing of such Prospectus, as applicable, and 0.50% per annum thereafter; and

(d) if the aggregate duration of Deferral Periods in any period exceeds the number of days permitted in respect of such period pursuant to Section 3(i) hereof, then, commencing on the day the aggregate duration of Deferral Periods in such period exceeds the number of days permitted in respect of such period, Additional Interest will accrue on the aggregate outstanding principal amount of the Notes at a rate of 0.25% per annum for the first ninety (90) days beginning on, and including, and including such date, and 0.50% per annum thereafter;

*provided, however*, that (1) upon the filing and effectiveness of the Shelf Registration Statement (in the case of paragraph (a) above), (2) upon such time as the applicable Shelf Registration Statement becomes effective and usable for resales (in the case of paragraph (b) above), (3) upon such time as such Holder is permitted to sell its Registrable Securities pursuant to any Shelf Registration Statement and Prospectus in accordance with applicable law (in the case of paragraph (c) above), (4) upon the termination of the applicable Deferral Period (in the case of paragraph (d) above), or (5) in any case, upon the expiration of the Shelf Registration Period, Additional Interest will cease to accrue on account of the applicable Registration Default (it being understood that nothing in this sentence will prevent Additional Interest from accruing as a result of any other Registration Default during the Shelf Registration Period).

Any Additional Interest due pursuant to this Section 7 will be payable in cash in the same manner and on the same dates as the stated interest payable on the Notes. If any Note ceases to be outstanding during any period for which Additional Interest is accruing, the Company will prorate the Additional Interest payable with respect to such Note.

Additional Interest will not accrue on the Notes at a rate that exceeds 0.50% per annum in the aggregate and will not be payable under more than one clause above for any given period of time, except that if Additional Interest would be payable because of more than one Registration Default, but at a rate of 0.25% per annum under one Registration Default and at a rate of 0.50% per annum under the other, then the Additional Interest rate will be the higher rate of 0.50% per annum.

Notwithstanding anything to the contrary in this Agreement, in no event will Additional Interest accrue on the shares of Common Stock issued upon conversion of Notes. However, if there exists a Registration Default with respect to the Registrable Securities on the Maturity Date, then, in addition to any Additional Interest otherwise payable, the Company will make a cash payment to each "Holder" (as defined in the Indenture) of any outstanding Note as of the Close of Business on the Business Day immediately before the Maturity Date in an amount equal to five percent (5%) of the principal amount of such Note. For purposes of the preceding sentence, Notes that have been converted with a Conversion Date that is on or after January 15, 2021 and on or before the second (2nd) Business Day immediately preceding the Maturity Date will be considered to be outstanding. Accordingly, and for the avoidance of doubt, if a Registration Default exists on the Maturity Date, the payment described in the preceding two sentences will be payable on all Notes outstanding as of the Close of Business on the Business Day immediately preceding the Maturity Date and on all Notes converted with a conversion date that is on or after January 15, 2021 and on or before the second (2nd) Business Day immediately preceding the Maturity Date.

8. *No Inconsistent Agreements.* The Company has not entered into, and agrees not to enter into, any agreement with respect to its securities that is inconsistent with the registration rights granted to the Holders herein.

9. *Rule 144A and Rule 144.* So long as any Registrable Securities remain outstanding, the Company will file the reports required to be filed by it under Rule 144A(d)(4) under the Securities Act and the reports required to be filed by it under the Exchange Act in a timely manner and, if at any time the Company is not required to file such reports, it will, upon the written request of any Holder of Registrable Securities, make publicly available other information so long as necessary to permit sales of such Holder's Registrable Securities pursuant to Rules 144 and 144A of the Securities Act. The Company covenants that it will take such further action as any Holder of Registrable Securities may reasonably request, all to the extent required from time to time to enable such Holder to sell Registrable Securities without registration under the Securities Act pursuant to Rule 144 or Rule 144A (including, without limitation, satisfying the requirements of Rule 144A(d)(4)). Upon the written request of any Holder of Registrable Securities, the Company will deliver to such Holder a written statement as to whether it has complied with such requirements. Notwithstanding anything to the contrary in this Section 9, nothing in this Section 9 will be deemed to require the Company to register any of its securities pursuant to the Exchange Act.

10. *Amendments and Waivers.* The provisions of this Agreement may not be amended, qualified, modified or supplemented, and waivers or consents to departures from the provisions hereof may not be given, unless the Company has obtained the written consent of the Holders of a majority of the Registrable Securities (determined on an as-converted basis); *provided, however*, that, with respect to any matter that directly or indirectly affects the rights of Leerink Partners LLC hereunder, the Company will obtain the written consent of Leerink Partners LLC with respect to such amendment, qualification, modification, supplement, waiver or consent; *provided, further*, that no amendment, qualification, modification, supplement, waiver or consent with respect to Section 7 hereof will be effective as against any Holder unless consented to in writing by such Holder; *provided, further*, that this Section 10 may not be amended, qualified, modified or supplemented, and waivers of or consents to departures from Section 10 may not be given, unless the Company has obtained the written consent of each Initial Purchaser and each Holder.

11. *Notices.* All notices and other communications provided for or permitted hereunder will be made in writing by hand-delivery, first-class mail, telex, telecopier, email or air courier guaranteeing overnight delivery:

(a) if to a Holder, at the most current address given by such holder to the Company in accordance with the provisions of the Notice and Questionnaire; *provided, however*, that notices and other communications to Holders of Notes held in global form may be provided through the applicable procedures of the Depository.

(b) if to any Initial Purchaser, initially at the address thereof set forth above; and

(c) if to the Company, initially at its address set forth in the Purchase Agreements.

All such notices and communications shall be deemed to have been duly given when received.

The Initial Purchasers or the Company, by notice to the other parties, may designate additional or different addresses for subsequent notices or communications.

Notwithstanding the foregoing, notices given to Holders holding Notes in book-entry form may be given through the facilities of the Depository.

12. *Remedies.* Each Holder, in addition to being entitled to exercise all rights provided to it herein or in the applicable Purchase Agreement or granted by law, including recovery of liquidated or other damages, will be entitled to specific performance of its rights under this Agreement. The Company agrees that monetary damages would not be adequate compensation for any loss incurred by reason of a breach by it of the provisions of this Agreement and hereby agrees to waive in any action for specific performance the defense that a remedy at law would be adequate.

13. *Successors.* This Agreement will inure to the benefit of and be binding upon the parties hereto, their respective successors and assigns, including, without the need for an express assignment or any consent by the Company thereto, subsequent Holders, and the indemnified persons referred to in Section 5 hereof. The Company hereby agrees to extend the benefits of this Agreement to any Holder, and any such Holder may specifically enforce the provisions of this Agreement as if an original party hereto.

14. *Counterparts.* This Agreement may be signed in one or more counterparts, each of which shall constitute an original and all of which together shall constitute one and the same agreement.

15. *Headings.* The section headings used herein are for convenience only and shall not affect the construction or interpretation hereof.

16. *Applicable Law.* THIS AGREEMENT WILL BE GOVERNED BY, AND CONSTRUED IN ACCORDANCE WITH, THE LAWS OF THE STATE OF NEW YORK. EACH OF THE PARTIES HERETO HEREBY IRREVOCABLY WAIVES, TO THE FULLEST EXTENT PERMITTED BY APPLICABLE LAW, ANY AND ALL RIGHT TO TRIAL BY JURY IN ANY LEGAL PROCEEDING ARISING OUT OF OR RELATING TO THIS AGREEMENT THE TRANSACTION CONTEMPLATED HEREBY.

17. *Severability.* In the event that any one or more of the provisions contained herein, or the application thereof in any circumstances, is held invalid, illegal or unenforceable in any respect for any reason, the validity, legality and enforceability of any such provision in every other respect and of the remaining provisions hereof will not be in any way impaired or affected thereby, it being intended that all of the rights and privileges of the parties will be enforceable to the fullest extent permitted by law.

18. *Common Stock Held by the Company, Etc.* Whenever the consent or approval of Holders of a specified percentage of securities is required hereunder, securities held by the Company or its Affiliates (other than subsequent Holders thereof if such subsequent Holders are deemed to be Affiliates solely by reason of their holdings of such securities) will not be counted in determining whether such consent or approval was given by the Holders of such required percentage.

Very truly yours,

BACTERIN INTERNATIONAL HOLDINGS, INC.

By: /s/ John P. Gandolfo

Name: John P. Gandolfo

Title: CFO

[Signature Page to Registration Rights Agreement]

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The foregoing Agreement is hereby confirmed and accepted as of the date first above written.

LEERINK PARTNERS LLC

By: /s/ John I. Fitzgerald, Esq.  
Name: John I. Fitzgerald  
Title: Managing Director

[Signature Page to Registration Rights Agreement]

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ORBIMED ROYALTY OPPORTUNITIES II, LP

By: /s/ Samuel Isaly  
Name: Samuel Isaly  
Title: Managing Member of Orbimed Advisors LLC, its investment  
manager

[Signature Page to Registration Rights Agreement]

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ROS ACQUISITION OFFSHORE LP

By: /s/ Samuel Isaly  
Name: Samuel Isaly  
Title: Managing Member of Orbimed Advisors LLC, its investment  
manager

[Signature Page to Registration Rights Agreement]

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## EMPLOYMENT AGREEMENT

This Employment Agreement (“Agreement”) is effective as of July 31, 2015 (“Effective Date”), by and between X-spine Systems, Inc. and/or successor thereof, an Ohio corporation (the “Company”), and David Kirschman, an Individual (“Employee”).

In consideration of the mutual promises, covenants and agreements contained in this Agreement, and other good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, the parties agree as follows:

### 1. EMPLOYMENT AND DUTIES.

A. Job Title and Responsibilities. The Company hereby employs Employee, and Employee hereby agrees to be employed, as Executive VP and Chief Scientific Officer of Bacterin International, Inc., and President of the Company, reporting to the Chief Executive Officer of Bacterin International, Inc. Employee’s title and responsibilities may change during the course of Employee’s employment with the Company, but the terms of this Agreement shall remain in full force and effect regardless of any change in Employee’s title or responsibilities.

B. Full-Time Best Efforts. Employee agrees to devote all necessary professional time and attention to the business of the Company (and its subsidiaries, affiliates, or related entities) required to fulfill the performance of Employee’s obligations under this Agreement, and will at all times faithfully, industriously and to the best of Employee’s ability, experience and talent, perform all of Employee’s obligations hereunder. Employee shall not, at any time during Employee’s employment by the Company, directly or indirectly, act as a partner, officer, director, consultant, employee, or provide services in any other capacity to any other business enterprise that conflicts with the Company’s business or Employee’s duty of loyalty to the Company. Without limiting the generality of the foregoing, Employee has disclosed that he currently serves on the board of directors of Aerobiotix, Inc. Employee shall seek the written consent of the Company prior to accepting any further outside board positions or prior to materially expanding his role on the current boards on which he serves. Employee will be limited to no more than two external Board positions, inclusive of Aerobiotix, Inc.

C. Duty of Loyalty. Employee acknowledges that during Employee’s employment with the Company, Employee has participated in and will participate in relationships with existing and prospective clients, customers, partners, suppliers, service providers and vendors of the Company that are essential elements of the Company’s goodwill. The parties acknowledge that Employee owes the Company a fiduciary duty to conduct all affairs of the Company in accordance with all applicable laws and the highest standards of good faith, trust, confidence and candor, and to endeavor, to the best of Employee’s ability, to promote the best interests of the Company.

D. Conflict of Interest. Employee agrees that while employed by the Company, and except with the advance written consent of a duly authorized officer of the Company, Employee will not enter into, on behalf of the Company, or cause the Company or any of its affiliates to enter into, directly or indirectly, any transactions with any business organization in which Employee or any member of Employee’s immediate family may be interested as a shareholder, partner, member, trustee, director, officer, employee, consultant, lender or guarantor or otherwise; provided, however, that nothing in this Agreement shall restrict transactions between the Company and any company whose stock is listed on a national securities exchange or actively traded in the over-the-counter market and over which Employee does not have the ability to control or significantly influence policy decisions.

Confidential:

Please initial each page: \_\_\_\_\_

**2. COMPENSATION.**

A. Base Pay. The Company agrees to pay Employee gross annual compensation of \$500,000, less usual and customary withholdings, which shall be payable in arrears in accordance with the Company’s customary payroll practices.

B. Bonus and Incentive Compensation. Employee shall also be eligible for bonus and incentive based compensation approved by the Compensation Committee of the Board of Directors of Bacterin International Holdings, Inc. (“BONE”), from time to time. The target bonus compensation will be 50% of base pay. Such bonus and incentive compensation shall be paid in accordance with the bonus and incentive compensation plan documents adopted by the Company, or in the absence of such plan documents, no later than 2-1/2 months following the year in which the bonus or incentive compensation vests.

C. Stock Award. Subject to the approval of the Compensation Committee of BONE’s Board of Directors, the Company will cause BONE to grant Employee 40,000 shares of restricted BONE common stock (the “Grant”). The Grant will vest as follows: (i) 20%, or 8,000 underlying shares, will vest on the first anniversary of the date of the Grant, and (ii) the remaining 80% will vest in 35 equal monthly installments of 914 underlying shares, beginning one month after the first anniversary of the date of the Grant. Employee must remain employed by the Company for vesting to occur. Upon a Change in Control as defined in BONE’s Amended and Restated Equity Incentive Plan, the entire Grant shall immediately be 100% vested.

D. Benefits. During Employee’s employment, Employee will be eligible to participate in the Company’s benefit programs, as summarized and as governed by any plan documents concerning such benefits. Employee will be eligible for four weeks of paid vacation per year, subject to the Company’s carryover policy.

**3. PROPRIETARY INFORMATION.**

A. Employee understands that during Employee’s employment relationship with the Company, the Company intends to provide Employee with information, including Proprietary Information (as defined herein), without which Employee would not be able to perform Employee’s duties to the Company. Employee agrees, at all times during the term of Employee’s employment relationship and thereafter, to hold in strictest confidence, and not to use or disclose, except for the benefit of the Company to the extent necessary to perform Employee’s obligations to the Company, any Proprietary Information that Employee obtains, accesses or creates during the term of the relationship, whether or not during working hours, until such Proprietary Information becomes publicly and widely known and made generally available through no wrongful act of Employee or of others under confidentiality obligations as to the information involved. Employee understands that “Proprietary Information” means information and physical material not generally known or available outside the Company and information and physical material entrusted to the Company by third parties under an obligation of non-disclosure or non-use or both. “Proprietary Information” includes, without limitation, inventions, technical data, trade secrets, marketing ideas or plans, research, product or service ideas or plans, business strategies, investments, investment opportunities, potential investments, market studies, industry studies, historical financial data, financial information and results, budgets, identity of customers, forecasts (financial or otherwise), possible or pending transactions, customer lists and domain names, price lists, and pricing methodologies.

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B. At all times, both during Employee's employment and after its termination, Employee will keep and hold all such Proprietary Information in strict confidence and trust. Employee will not use or disclose any Proprietary Information without the prior written consent of the Company, except as may be necessary to perform Employee's duties as an employee of the Company for the benefit of the Company. Employee may disclose information that Employee is required to disclose by valid order of a government agency or court of competent jurisdiction, provided that Employee will:

- (i) notify the Company in writing immediately upon learning that such an order may be sought or issued,
- (ii) cooperate with the Company as reasonably requested if the Company seeks to contest such order or to place protective restrictions on the disclosure pursuant to such order, and
- (iii) comply with any protective restrictions in such order, and disclose only the information specified in the order.

C. Upon termination of employment with the Company, Employee will promptly deliver to the Company all documents and materials of any nature pertaining to Employee's work with the Company.

D. Employee agrees not to infringe the copyright of the Company, its customers or third parties (including, without limitation, Employee's previous employer, customers, etc.) by unauthorized or unlawful copying, modifying or distributing of copyrighted material, including plans, drawings, reports, financial analyses, market studies, computer software and the like.

#### 4. COVENANT NOT TO COMPETE.

A. Noncompetition Covenant. Employee agrees that during the Restricted Period (as defined below), without the prior written consent of the Company, Employee shall not, directly or indirectly within the Territory (as defined below): (i) personally, by agency, as an employee, independent contractor, consultant, officer, director, manager, agent, associate, investor (other than as a passive investor holding less than five percent of the outstanding equity of an entity), or by any other artifice or device, engage in any Competitive Business (as defined below), (ii) assist others, including but not limited to employees of the Company, to engage in any Competitive Business, or (iii) own, purchase, finance, organize or take preparatory steps to own, purchase, finance, or organize a Competitive Business.

B. Definitions.

1. "Competitive Business" means (i) any person, entity or organization which is engaged in or about to become engaged in research on, consulting regarding, or development, production, marketing or selling of any product, process, technology, device, invention or service which resembles, competes with or is intended to resemble or compete with a product, process, technology, device, invention or service of the Company; or (ii) any other line of business that was conducted by the Company or that Employee knows or reasonably should know the Company or any affiliate, successor or related entity, at any time during the term of Employee's employment with the Company, is actively preparing to pursue.

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2. "Territory" means all regions where the Company conducts business or is contemplating doing so.

3. "Restricted Period" means the period of Employee's employment with the Company and for a period of six months following the termination of Employee's employment; provided that if such termination is of a type that results in severance under Paragraph 12B (or would result in severance if Employee had been employed for 12 full months), the Restricted Period after termination shall be the period of severance, if any, following such termination.

4. In order for the Noncompetition Covenant under Paragraph 4(b) to be valid and enforceable, Company must pay Employee 75% of base pay under Paragraph 2(a) for the duration of the Restricted Period. The Company, at its sole discretion and upon notice to Employee, may elect to waive all or a portion of the Restricted Period and thereby reduce base pay due on a pro rata basis.

**5. NON-SOLICITATION AND NON-INTERFERENCE COVENANTS.**

A. Nonsolicitation of Employees and Others. During the Restricted Period, (a) Employee shall not, directly or indirectly, solicit, recruit, or induce, or attempt to solicit, recruit or induce any employee, consultant, independent contractor, vendor, supplier, or agent to terminate or otherwise adversely affect his or her employment or other business relationship (or prospective employment or business relationship) with the Company, and (b) Employee shall not, directly or indirectly, solicit, recruit, or induce, or attempt to solicit, recruit or induce any employee to work for Employee or any other person or entity, other than the Company or its affiliates or related entities.

B. Nonsolicitation of Customers. During the Restricted Period, Employee shall not, directly or indirectly, solicit, recruit, or induce any Customer (as defined below) for the purpose of (i) providing any goods or services related to a Competitive Business, or (ii) interfering with or otherwise adversely affecting the contracts or relationships, or prospective contracts or relationships, between the Company (including any related or affiliated entities) and such Customers. "Customer" means a person or entity with which Employee had contact or about whom Employee gained information while an Employee of the Company, and to which the Company was selling or providing products or services, was in active negotiations for the sale of its products or services, or was otherwise doing business as of the date of the cessation of Employee's employment with the Company or for whom the Company had otherwise done business within the 12 month period immediately preceding the cessation of Employee's employment with the Company.

**6. ACKNOWLEDGEMENTS.** Employee acknowledges and agrees that:

A. The geographic and duration restrictions contained in Paragraphs 4 and 5 of this Agreement are fair, reasonable, and necessary to protect the Company's legitimate business interests and trade secrets, given the geographic scope of the Company's business operations, the competitive nature of the Company's business, and the nature of Employee's position with the Company;

B. Employee's employment creates a relationship of confidence and trust between Employee and the Company with respect to the Proprietary Information, and Employee will have access to Proprietary Information (including but not limited to trade secrets) that would be valuable or useful to the Company's competitors;

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C. The Company's Proprietary Information is a valuable asset of the Company, and any violation of the restrictions set forth in this Agreement would cause substantial injury to the Company;

D. The restrictions contained in this Agreement will not unreasonably impair or infringe upon Employee's right to work or earn a living after Employee's employment with the Company ends; and

E. This Agreement is a contract for the protection of trade secrets under applicable law and is intended to protect the Proprietary Information (including trade secrets) identified above.

7. **"BLUE PENCIL" AND SEVERABILITY PROVISION.** If a court of competent jurisdiction declares any provision of this Agreement invalid, void, voidable, or unenforceable, the court shall reform such provision(s) to render the provision(s) enforceable, but only to the extent absolutely necessary to render the provision(s) enforceable and only in view of the parties' express desire that the Company be protected to the greatest possible extent under applicable law from improper competition and the misuse or disclosure of trade secrets and Proprietary Information. To the extent such a provision (or portion thereof) may not be reformed so as to make it enforceable, it may be severed and the remaining provisions shall remain fully enforceable.

**8. INVENTIONS.**

A. Inventions Retained and Licensed. Attached as Exhibit A is a list describing all inventions and information created, discovered or developed by Employee, whether or not patentable or registrable under patent, copyright or similar statutes, made or conceived or reduced to practice or learned by Employee, either alone or with others before Employee's employment with the Company ("Prior Inventions"), which belong in whole or in part to Employee, and which are not being assigned by Employee to the Company. Employee represents that Exhibit A is complete and contains no confidential or proprietary information belonging to a person or entity other than Employee. Employee acknowledges and agrees that Employee has no rights in any Inventions (as that term is defined below) other than the Prior Inventions listed on Exhibit A. If there is nothing identified on Exhibit A, Employee represents that there are no Prior Inventions as of the time of signing this Agreement. Employee shall not incorporate, or permit to be incorporated, any Prior Invention owned by Employee or in which he/she has an interest in a Company product, process or machine without the Company's prior written consent. Notwithstanding the foregoing, if, in the course of Employee's employment with the Company, Employee directly or indirectly incorporates into a Company product, process or machine a Prior Invention owned by Employee or in which Employee has an interest, the Company is hereby granted and shall have a non-exclusive, royalty-free, irrevocable, perpetual, world-wide license to make, have made, modify, use, create derivative works from and sell such Prior Invention as part of or in connection with such product, process or machine.

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B. Assignment Of Inventions. Employee shall promptly make full, written disclosure to the Company, will hold in trust for the sole right and benefit of the Company, and hereby irrevocably transfers and assigns, and agrees to transfer and assign, to the Company, or its designee, all his/her right, title and interest in and to any and all inventions, original works of authorship, developments, concepts, improvements, designs, discoveries, ideas, trademarks (and all associated goodwill), mask works, or trade secrets, whether or not they may be patented or registered under copyright or similar laws, which Employee may solely or jointly conceive or develop or reduce to practice, or cause to be conceived or developed or reduced to practice, during Employee's employment by the Company (the "Inventions"). Employee further acknowledges that all original works of authorship which are made by Employee (solely or jointly with others) within the scope of and during the period of his/her employment with the Company and which may be protected by copyright are "Works Made For Hire" as that term is defined by the United States Copyright Act. Employee understands and agrees that the decision whether to commercialize or market any Invention developed by Employee solely or jointly with others is within the Company's sole discretion and the Company's sole benefit and that no royalty will be due to Employee as a result of the Company's efforts to commercialize or market any such invention.

Employee recognizes that Inventions relating to his or her activities while working for the Company and conceived or made by Employee, whether alone or with others, within one year after cessation of Employee's employment, may have been conceived in significant part while employed by the Company. Accordingly, Employee acknowledges and agrees that such Inventions shall be presumed to have been conceived during Employee's employment with the Company and are to be, and hereby are, assigned to the Company unless and until Employee has established the contrary.

C. Maintenance of Records. Employee agrees to keep and maintain adequate and current written records of all Inventions made by Employee (solely or jointly with others) during his/her employment with the Company. The records will be in the form of notes, sketches, drawings and any other format that may be specified by the Company. The records will be available to and remain the sole property of the Company at all times.

D. Patent, Trademark and Copyright Registrations. Employee agrees to assist the Company, or its designee, at the Company's expense, in every proper way to secure the Company's rights in the Inventions and any copyrights, patents, trademarks, service marks, mask works, or any other intellectual property rights in any and all countries relating thereto, including, but not limited to, the disclosure to the Company of all pertinent information and data with respect thereto, the execution of all applications, specifications, oaths, assignments and all other instruments the Company reasonably deems necessary in order to apply for and obtain such rights and in order to assign and convey to the Company, its successors, assigns, and nominees the sole and exclusive rights, title, and interest in and to such inventions, and any copyrights, patents, trademarks, service marks, mask works, or any other intellectual property rights relating thereto. Employee further agrees that his/her obligation to execute or cause to be executed, when it is in his/her power to do so, any such instrument or paper shall continue after termination or expiration of this Agreement or the cessation of his/her employment with the Company. If the Company is unable because of Employee's mental or physical incapacity or for any other reason, after reasonably diligent efforts, to secure Employee's signature to apply for or to pursue any application for any United States or foreign patents, trademarks or copyright registrations covering inventions or original works of authorship assigned to the Company as above, then Employee hereby irrevocably designates and appoints the Company and its duly authorized officers and agents as Employee's agent and attorney-in-fact to act for and in his/her behalf and stead to execute and file any such applications and to do all other lawfully permitted acts to further the prosecution and issuance of letters patent, trademarks or copyright registrations thereon with the same legal force and effect as if executed by Employee; this power of attorney shall be a durable power of attorney which shall come into existence upon Employee's mental or physical incapacity.

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**9. SURVIVAL AND REMEDIES.** Employee's obligations of nondisclosure, nonsolicitation, noninterference, and noncompetition under this Agreement shall survive the cessation of Employee's employment with the Company and shall remain enforceable. In addition, Employee acknowledges that upon a breach or threatened breach of any obligation of nondisclosure, nonsolicitation, noninterference, or noncompetition of this Agreement, the Company may suffer irreparable harm and damage for which money alone cannot fully compensate the Company. Employee therefore agrees that upon such breach or threat of imminent breach of any such obligation, the Company shall be entitled to seek a temporary restraining order, preliminary injunction, permanent injunction or other injunctive relief, without posting any bond or other security, barring Employee from violating any such provision. This Paragraph shall not be construed as an election of any remedy, or as a waiver of any right available to the Company under this Agreement or the law, including the right to seek damages from Employee for a breach of any provision of this Agreement and the right to require Employee to account for and pay over to the Company all profits or other benefits derived or received by Employee as the result of such a breach, nor shall this Paragraph be construed to limit the rights or remedies available under state law for any violation of any provision of this Agreement.

**10. RETURN OF COMPANY PROPERTY.** All devices, records, reports, data, notes, compilations, lists, proposals, correspondence, specifications, equipment, drawings, blueprints, manuals, DayTimers, planners, calendars, schedules, discs, data tapes, financial plans and information, or other recorded matter, whether in hard copy, magnetic media or otherwise (including all copies or reproductions made or maintained, whether on the Company's premises or otherwise), pertaining to Employee's work for the Company, or relating to the Company or the Company's Proprietary Information, whether created or developed by Employee alone or jointly during his/her employment with the Company, are the exclusive property of the Company. Employee shall surrender the same (as well as any other property of the Company) to the Company upon its request or promptly upon the cessation of employment. Upon cessation of Employee's employment, Employee agrees to sign and deliver the "Termination Certificate" attached as Exhibit B, which shall detail all Company property that is surrendered upon cessation of employment.

**11. NO CONFLICTING AGREEMENTS OR IMPROPER USE OF THIRD-PARTY INFORMATION.** During her/his employment with the Company, Employee shall not improperly use or disclose any proprietary information or trade secrets of any former employer or other person or entity, and Employee shall not bring on to the premises of the Company any unpublished document or proprietary information belonging to any such former employer, person or entity, unless consented to in writing by the former employer, person or entity. Employee represents that he/she has not improperly used or disclosed any proprietary information or trade secrets of any other person or entity during the application process or while employed or affiliated with the Company. Employee also acknowledges and agrees that he/she is not subject to any contract, agreement, or understanding that would prevent Employee from performing his/her duties for the Company or otherwise complying with this Agreement. To the extent Employee violates this provision, or his/her employment with the Company constitutes a breach or threatened breach of any contract, agreement, or obligation to any third party, Employee shall indemnify and hold the Company harmless from all damages, expenses, costs (including reasonable attorneys' fees) and liabilities incurred in connection with, or resulting from, any such violation or threatened violation.

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**12. TERMINATION.**

A. By Either Party. Either party may terminate this Agreement at any time with or without notice, and with or without cause. Except as provided in this Paragraph 12, upon termination of employment, Employee shall only be entitled to Employee's accrued but unpaid base salary and other benefits earned under any Company-provided plans, policies and arrangements for the period preceding the effective date of the termination of employment.

B. Termination Without Cause or Resignation for Good Reason. If the Company terminates Employee's employment without Cause (defined below) or Employee resigns for Good Reason (defined below), Employee shall be entitled to receive continuing bi-weekly payments of severance pay at a rate equal to Employee's Base Salary, as then in effect, for six months from the date of termination of employment, less all required tax withholdings and other applicable deductions, payable in accordance with the Company's standard payroll procedures, commencing on the effective date of a separation agreement with a complete release of claims against the Company; provided that (1) the first payment shall include any amounts that would have been paid to Employee if payment had commenced on the date of separation from service; (2) Employee shall not be required to execute a release of any claims arising from the Company's failure to comply with its obligations under Paragraph 12A above; and (3) notwithstanding the preceding provisions of this Paragraph 12B, no severance shall be due or payable unless and until Employee has been employed with the Company for at least 12 full months. Notwithstanding the foregoing, any payments due under this Paragraph 12B shall commence within 60 days of Employee's termination of employment, provided that if such 60-day period spans two calendar years, payments shall commence in the latter calendar year.

C. Termination Upon a Change of Control. If the Company or any successor in interest to the Company terminates Employee's employment in connection with or within 12 months after a Change of Control (defined below), Employee shall be entitled to receive continuing bi-weekly payments of severance pay at a rate equal to Employee's Base Salary, as then in effect, for twelve months from the date of termination of employment, less all required tax withholdings and other applicable deductions, payable in accordance with the Company's standard payroll procedures, commencing on the effective date of a separation agreement with a complete release of claims against the Company; provided that the first payment shall include any amounts that would have been paid to Employee if payment had commenced on the date of separation from service; and further provided that Employee shall not be required to execute a release of any claims arising from the Company's failure to comply with its obligations under Paragraph 12A above. The payments described in this Paragraph 12C are in lieu of, and not in addition to, the payments described in paragraph 12B, it being understood by Employee that he shall be paid only one severance. Notwithstanding the previous provisions of this Paragraph 12C, any payments due under this Paragraph 12C shall commence within 60 days of Employee's termination of employment, provided that if such 60-day period spans two calendar years, payments shall commence in the latter calendar year.

D. Termination for Cause, Death or Disability, or Resignation Without Good Reason. If Employee's employment with the Company terminates voluntarily by Employee without Good Reason, for Cause by the Company or due to Employee's death or disability, then payments of compensation by the Company to Employee hereunder will terminate immediately (except as to amounts already earned).

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E. Definitions.

(1) “Cause.” For all purposes under this Agreement, “Cause” is defined as (i) gross negligence or willful misconduct in the performance of Employee’s duties and responsibilities to the Company; (ii) commission of any act of fraud, theft, embezzlement, financial dishonesty or any other willful misconduct that has caused or is reasonably expected to result in injury to the Company; (iii) conviction of, or pleading guilty or *nolo contendere* to, any felony or a lesser crime involving dishonesty or moral turpitude; or (iv) material breach by Employee of any of obligations under any written agreement or covenant with the Company, including the policies adopted from time to time by the Company applicable to all employees.

(2) “Good Reason.” For all purposes under this Agreement, “Good Reason” is defined as Employee’s resignation within 30 days following the expiration of any Company cure period (discussed below) following the occurrence of one or more of the following, without Employee’s express written consent: (i) a material reduction of Employee’s duties, authority or responsibilities, relative to Employee’s duties, authority or responsibilities in effect immediately prior to such reduction; (ii) a material reduction in Employee’s base compensation; or (iii) a material breach by the Company under any written agreement or covenant with Employee. Employee will not resign for Good Reason without first providing the Company with written notice within 30 days of the event that Employee believes constitutes “Good Reason” specifically identifying the acts or omissions constituting the grounds for Good Reason and a reasonable cure period of not less than 30 days following the date of such notice during which such condition shall not have been cured.

(3) “Change of Control.” For all purposes under this Agreement, “Change of Control” of the Company is defined as:

(a) a sale, transfer or disposition of all or substantially all of the Company’s assets other than to (i) a corporation or other entity of which at least a majority of its combined voting power is owned directly or indirectly by the Company, (ii) a corporation or other entity owned directly or indirectly by the holders of capital stock of the Company in substantially the same proportions as their ownership of Company common stock.

(b) any merger, consolidation or other business combination transaction of the Company with or into another corporation, entity or person, other than a transaction with or into an Excluded Entity, being another corporation, entity or person in which the holders of at least a majority of the shares of voting capital stock of the Company outstanding immediately prior to such transaction continue to hold (either by such shares remaining outstanding in the continuing entity or by their being converted into shares of voting capital stock of the surviving entity) a majority of the total voting power represented by the shares of voting capital stock of the Company (or the surviving entity) outstanding immediately after such transaction; or

(c) any acquisition of at least a majority of the shares of voting capital stock of the Company by any corporation, entity or person or group of corporations, entities or persons acting in concert, other than an Excluded Entity.

For the avoidance of doubt, a liquidation, dissolution or winding up of the Company or change in the state of the Company’s incorporation shall not constitute a Change of Control event for purposes of this Agreement.

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F. Exclusive Remedy. In the event of a termination of Employee's employment with the Company, the provisions of this Paragraph 12 are intended to be and are exclusive and in lieu of any other rights or remedies to which Employee or the Company may otherwise be entitled.

**13. GENERAL PROVISIONS.**

A. Governing Law; Consent To Personal Jurisdiction. The laws of the State of Colorado govern this Agreement without regard to conflict of laws principles. Employee and the Company each hereby consents to the personal jurisdiction of the state courts located in the City and County of Dayton, Montgomery, State of Ohio, and the federal district court sitting in the City and County of Cincinnati, Hamilton, State of Ohio, if that court otherwise possesses jurisdiction over the matter, for any legal proceeding concerning Employee's employment or termination of employment, or arising from or related to this Agreement or any other agreement executed between Employee and the Company. Should an action be brought to enforce the terms of this Agreement, the prevailing party shall be entitled to recover reasonable attorneys' fees and costs incurred in prosecuting the action.

B. Entire Agreement. This Agreement sets forth this entire Agreement between the Company (and any of its related or affiliated entities, officers, agents, owners or representatives) and Employee relating to the subject matter herein, and supersedes any and all prior discussions and agreements, whether written or oral, on the subject matter hereof. To the extent that this Agreement may conflict with the terms of another written agreement between Employee and the Company, the terms of this Agreement will control.

C. Modification. No modification of or amendment to this Agreement will be effective unless in writing and signed by Employee and an authorized representative of the Company.

D. Waiver. The Company's failure to enforce any provision of this Agreement shall not act as a waiver of its ability to enforce that provision or any other provision. The Company's failure to enforce any breach of this Agreement shall not act as a waiver of that breach or any future breach. No waiver of any of the Company's rights under this Agreement will be effective unless in writing. Any such written waiver shall not be deemed a continuing waiver unless specifically stated, and shall operate only as to the specific term or condition waived and shall not constitute a waiver of such term or condition for the future or as to any act other than that specifically waived.

E. Successors and Assigns. This Agreement shall be assignable to, and shall inure to the benefit of, the Company's successors and assigns. Employee shall not have the right to assign his/her rights or obligations under this Agreement.

F. Construction. The language used in this Agreement will be deemed to be language chosen by Employee and the Company to express their mutual intent, and no rules of strict construction will be applied against either party.

G. Counterparts. This Agreement may be executed in any number of counterparts, each of which shall be enforceable, and all of which together shall constitute one agreement. Signatures of the parties that are transmitted in person or by facsimile or e-mail shall be accepted as originals.

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H. Further Assurances. Employee agrees to execute any proper oath or verify any document required to carry out the terms of this Agreement.

I. Title and Headings. The titles, captions and headings of this Agreement are included for ease of reference only and will be disregarded in interpreting or construing this Agreement.

J. Notices. All notices and communications that are required or permitted to be given under this Agreement shall be in writing and shall be sufficient in all respects if given and delivered in person, by electronic mail, by facsimile, by overnight courier, or by certified mail, postage prepaid, return receipt requested, to the receiving party at such party's address shown in the signature blocks below or to such other address as such party may have given to the other by notice pursuant to this Paragraph. Notice shall be deemed given (i) on the date of delivery in the case of personal delivery, electronic mail or facsimile, or (ii) on the delivery or refusal date as specified on the return receipt in the case of certified mail or on the tracking report in the case of overnight courier.

K. 409A. The amounts payable under this Agreement are intended to be exempt from the requirements of Section 409A of the Internal Revenue Code of 1986, as amended ("Section 409A"). To the extent that any such payments are determined to be subject to Section 409A, (i) the terms of this Agreement shall be interpreted to avoid incurring any penalties under Section 409A, (ii) any payments due upon a termination of employment shall only be payable if the termination constitutes a "separation from service" within the meaning of Section 409A, (iii) any right to a series of installment payments is to be treated as a right to a series of separate payments, and (iv) any payments due to a "specified employee" of a publicly-traded company upon a separation from service shall be delayed until the first day of the seventh month following such separation from service. Notwithstanding the foregoing, in no event shall the Company be responsible for any taxes or penalties due under Section 409A.

**14. EMPLOYEE'S ACKNOWLEDGMENTS.** Employee acknowledges that he/she is executing this Agreement voluntarily and without duress or undue influence by the Company or anyone else and that Employee has carefully read this Agreement and fully understands the terms, consequences, and binding effect of this Agreement.

*[Signature Page Follows]*

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IN WITNESS WHEREOF, and intending to be legally bound, the parties have executed this Agreement as of the date first written above.

EMPLOYEE

X-SPINE SYSTEMS, INC.

Print Name: David Kirschman

Print Name: Daniel Goldberger

Signature: /s/ David Kirschman

Signature: /s/ Daniel Goldberger

Address: 5101 Garden Spa Ct.

Title: CEO

Phone: 937-416-9626

Email: DK@X-Spine.com

*[Signature Page to Employment Agreement]*

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**EXHIBIT A**  
**LIST OF PRIOR INVENTIONS AND ORIGINAL WORKS OF AUTHORSHIP**

**IS A LIST ATTACHED? (PLEASE CHECK):** \_\_\_\_ **YES** \_\_\_\_ **NO**

**NOTE:** The following is a list of all Prior Inventions made, conceived, developed or reduced to practice by Employee prior to his/her employment with the Company. IF NO SUCH LIST IS ATTACHED, THAT MEANS EMPLOYEE IS NOT ASSERTING THE EXISTENCE OF ANY PRIOR INVENTIONS.

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**EXHIBIT B**

**TERMINATION CERTIFICATE**

I hereby represent and certify that I have in all material respects complied with my obligations to the Company under the Employment Agreement between the Company and me to which the form of this Certificate is attached as Exhibit B.

I also represent that on or before my last day, I have specifically returned the following items:

- Computer/laptop
- Keys/access cards
- Company credit card
- Other equipment (please list) \_\_\_\_\_  
\_\_\_\_\_

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**BACTERIN CLOSES PURCHASE OF THE OUTSTANDING COMMON STOCK OF X-SPINE SYSTEMS, INC.**

*Combines Bacterin's strength in orthobiologics with X-spine's expertise in hardware offering complementary product lines focused on orthopedic and spine surgical procedures.*

BELGRADE, Mont., July 31, 2015 (GLOBE NEWSWIRE) -- Bacterin International Holdings, Inc. (OTCQX:BONE), a leader in the development of revolutionary bone graft material, announced today that it has closed its purchase of the outstanding shares of privately held X-spine Systems, Inc., a global medical device manufacturer of leading products for spinal surgery, headquartered in Miamisburg, Ohio, in exchange for approximately 4.24 million shares of Bacterin common stock and approximately \$60 million in cash, subject to customary working capital adjustments, and including the extinguishment of approximately \$13 million of X-spine debt. The transaction positions the combined company as a comprehensive supplier for spine surgery procedures that offers both hardware and biologics through a more substantial national distribution footprint.

X-spine has numerous products for the treatment of spinal disease, with an emphasis on less-invasive treatments for the degenerative spine, X-spine's state-of-the-art spinal implants and instrumentation are highly complementary to Bacterin's leading orthobiologics portfolio. The great majority of spinal procedures using X-spine's product portfolio could use an orthobiologic that Bacterin currently offers.

**Transaction Details**

The transaction was funded by an amended and restated \$42 million senior secured debt facility with OrbiMed and an offering of \$65 million aggregate principal amount of convertible senior notes.

William Blair & Company, L.L.C. served as financial advisor to Bacterin in conjunction with the transaction.

**New Company Name and Additions to Management Team**

Following the completion of the transaction, Bacterin International Holdings, Inc. will change its name to Xtant Medical Holdings, Inc. Dr. David Kirschman, formerly X-spine CEO, has joined the management team to serve as Executive Vice President and Chief Scientific Officer of Bacterin. He is also President of X-spine Systems, which is now a Bacterin subsidiary. Dr. Kirschman was also appointed to the Bacterin Board of Directors.

**About Bacterin International Holdings, Inc.**

Bacterin International Holdings, Inc. (OTCQX:BONE) develops, manufactures and markets biologics products to domestic and international markets. Bacterin's proprietary methods optimize the growth factors in human allografts to promote bone growth, subchondral repair and dermal growth. These products are used in a variety of applications including enhancing fusion in spine surgery, relief of back pain, promotion of bone growth in foot and ankle surgery, promotion of cranial healing following neurosurgery and subchondral repair in knee and other joint surgeries.

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Following the transaction, X-spine has become a wholly owned subsidiary of Bacterin. X-spine is a medical device manufacturer that provides class-leading products for the treatment of spinal disease. With an emphasis on less-invasive treatments for the degenerative spine, X-spine offers state-of-the art spinal implants and instrumentation to an expanding global market.

For further information, please visit [www.bacterin.com](http://www.bacterin.com).

#### **Important Cautionary Notes Regarding Forward-looking Statements**

This press release contains certain disclosures that may be deemed forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995 that are subject to significant risks and uncertainties. Forward-looking statements include statements that are predictive in nature, that depend upon or refer to future events or conditions, or that include words such as “continue,” “efforts,” “expects,” “anticipates,” “intends,” “plans,” “believes,” “estimates,” “projects,” “forecasts,” “strategy,” “will,” “goal,” “target,” “prospects,” “potential,” “optimistic,” “confident,” “likely,” “probable” or similar expressions or the negative thereof. Statements of historical fact also may be deemed to be forward-looking statements. You are cautioned not to place undue reliance on forward-looking statements, which speak only as of the date on which they are made. Forward-looking statements reflect management’s current estimates, projections, expectations and beliefs, and are subject to risks and uncertainties outside of our control that may cause actual results to differ materially from what is indicated in those forward-looking statements. We assume no duty to update the forward-looking statements, except as required by law.

These statements by their nature involve risks and uncertainties, and actual results may differ materially depending on a variety of important factors, including, among others, the occurrence of the risks described in the “Risk Factors” section included as an exhibit to our Current Report on Form 8-K filed with the U.S. Securities and Exchange Commission on July 28, 2015. In addition to those factors, the following factors, among others, could cause our actual results to differ materially from forward-looking or actual performance: difficulty integrating our business and X-spine’s businesses or realizing the projected benefits of the transaction; and diversion of management time on transaction and integration related issues.

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**Bacterin International Holdings Closes Offering of  
\$65 Million of 6.00% Convertible Senior Notes**

BELGRADE, Mont.—(BUSINESS WIRE) — July 31, 2015 — Bacterin International Holdings, Inc. (OTCQX: BONE), a leader in the development of revolutionary bone graft material, has announced the closing of its previously announced offering of \$65 million aggregate principal amount of convertible senior unsecured notes due 2021 (the “Notes”). The Notes were offered and sold to “qualified institutional buyers” (as defined in Rule 144A under the Securities Act of 1933, as amended). Bacterin has granted the investment banking firm serving as initial purchaser a 30-day option to purchase up to an additional \$9.75 million aggregate principal amount of Notes.

The Notes are the unsecured, unsubordinated obligations of the company, and bear interest at a rate of 6.00% per year. Following the first interest payment date, which will be on April 15, 2016, interest on the Notes will be payable semiannually in arrears on January 15 and July 15 of each year. At any time prior to the close of business on the second business day immediately preceding the maturity date, holders of the Notes may convert their Notes into shares of Bacterin common stock (together with cash in lieu of fractional shares) at an initial conversion rate of 257.5163 shares per \$1,000 principal amount of Notes (which represents an initial conversion price of approximately \$3.88 per share).

Bacterin estimates that the net proceeds of the offering will be approximately \$62.8 million (or approximately \$72.2 million if the initial purchaser’s option to purchase additional Notes is exercised in full), after deducting the initial purchaser’s discounts and commissions and estimated offering expenses payable by Bacterin. Bacterin used a portion of the net proceeds of the offering to fund the cash portion of the purchase price for its acquisition of X-spine Systems, Inc., announced previously, and intends to use the remaining proceeds for general corporate purposes.

This announcement is neither an offer to sell nor a solicitation of an offer to buy any of these securities and shall not constitute an offer, solicitation or sale in any jurisdiction in which such offer, solicitation or sale is unlawful. Any offer of the securities will be made only by means of a private offering memorandum. The offer and sale of the Notes and the shares of common stock issuable upon conversion of the Notes have not been registered under the Securities Act or any state securities laws, and, unless so registered, the Notes and the shares issuable upon conversion of the Notes may not be offered or sold in the United States or to U.S. persons except pursuant to an exemption from the registration requirements of the Securities Act and applicable state laws.

**About Bacterin International Holdings**

Bacterin International Holdings, Inc. (OTCQX: BONE) develops, manufactures and markets biologics products to domestic and international markets. Bacterin’s proprietary methods optimize the growth factors in human allografts to promote bone growth, subchondral repair and dermal growth. These products are used in a variety of applications including enhancing fusion in spine surgery, relief of back pain, promotion of bone growth in foot and ankle surgery, promotion of cranial healing following neurosurgery and subchondral repair in knee and other joint surgeries.

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### **Important Cautions Regarding Forward-looking Statements**

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