

INSMED INC
Form 424B5
July 15, 2013

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Filed Pursuant to Rule 424(b)(5)
Registration File No. 333-188851

The information in this preliminary prospectus supplement and the accompanying prospectus is not complete and may be changed. A registration statement relating to the securities offered hereby has become effective under the Securities Act of 1933, as amended. This preliminary prospectus supplement together with the accompanying prospectus is not an offer to sell the securities and it is not soliciting an offer to buy the securities in any jurisdiction where the offer or sale is not permitted.

Subject to completion, dated July 15, 2013

Preliminary prospectus supplement
(To prospectus dated June 5, 2013)

\$60,000,000

Common Stock

We are offering up to \$60,000,000 of shares of our common stock.

Our common stock is listed on The NASDAQ Capital Market under the symbol "INSM." The last reported sale price of our common stock on The NASDAQ Capital Market on July 12, 2013 was \$10.81 per share.

Investing in our common stock involves a high degree of risk. See "Risk Factors" beginning on page S-5 of this prospectus supplement.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus supplement or the accompanying prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

	Per Share	Total
Public offering price	\$	\$
Underwriting discounts and commissions	\$	\$
Proceeds, before expenses, to us	\$	\$

The underwriters also may purchase up to an additional \$9,000,000 of shares of our common stock at the public offering price, less the underwriting discounts and commissions payable by us, to cover over-allotments, if any, within 30 days from the date of this prospectus

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supplement. If the underwriters exercise this option in full, the total underwriting discounts and commissions will be \$ _____ and our total proceeds, after underwriting discounts and commissions but before expenses, will be \$ _____.

The underwriters are offering the common stock as set forth under "Underwriting." Delivery of the shares will be made on or about _____, 2013.

Sole Book-Running Manager

Leerink Swann

Co-Managers

Lazard Capital Markets

Prospectus Supplement dated _____, 2013

Canaccord Genuity

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ABOUT THIS PROSPECTUS SUPPLEMENT

This prospectus supplement and the accompanying prospectus relate to a registration statement that we filed with the Securities and Exchange Commission, or SEC, using a shelf registration process. Both this prospectus supplement and the accompanying prospectus include or incorporate by reference important information about us, our common stock and other information you should know before investing in our common stock. You should read both this prospectus supplement and the accompanying prospectus as well as the additional information described under "Where You Can Find More Information" in the accompanying prospectus before making an investment decision.

We have not authorized any dealer, agent or other person to give any information or to make any representation other than those contained or incorporated by reference in this prospectus supplement and the accompanying prospectus and any related free writing prospectus we may authorize to be delivered to you. You must not rely upon any information or representation not contained or incorporated by reference in this prospectus supplement or the accompanying prospectus or in any related free writing prospectus authorized by us. This prospectus supplement and the accompanying prospectus do not constitute an offer to sell or the solicitation of an offer to buy any securities other than the common stock offered hereby, nor do this prospectus supplement and the accompanying prospectus constitute an offer to sell or the solicitation of an offer to buy securities, in any jurisdiction to any person to whom it is unlawful to make such offer or solicitation in such jurisdiction. You should not assume that the information contained in this prospectus supplement and the accompanying prospectus is accurate on any date subsequent to the date set forth on the front of the document or that any information we have incorporated by reference is correct on any date subsequent to the date of the document incorporated by reference, even though this prospectus supplement and any accompanying prospectus is delivered or securities are sold on a later date.

This prospectus supplement may add to, update or change the information in the accompanying prospectus and the documents incorporated by reference herein. If information in this prospectus supplement is inconsistent with information in the accompanying prospectus or any document incorporated by reference, this prospectus supplement will apply and will supersede that information in the accompanying prospectus or in the document incorporated by reference.

Unless otherwise indicated or unless the context requires otherwise, all references in this prospectus supplement to "Insmmed," "we," "us" and "our" refer to Insmmed, Inc. and its subsidiaries. ARIKACE is a registered trademark of Insmmed. All other trademarks, trade names or service marks are the property of their respective owners.

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PROSPECTUS SUPPLEMENT SUMMARY

This summary highlights selected information included or incorporated by reference in this prospectus supplement and the accompanying prospectus and does not contain all of the information that may be important to you. You should carefully review this entire prospectus supplement and the accompanying prospectus, including the risk factors and financial statements included and incorporated by reference in this prospectus supplement and the accompanying prospectus, before making an investment decision to purchase our common stock.

Our Company

We are a biopharmaceutical company focused on developing and commercializing inhaled therapies for patients battling serious lung diseases that are often life threatening. Our lead product candidate, ARIKACE®, or liposomal amikacin for inhalation, is an inhaled antibiotic treatment that delivers a proven and potent anti-infective directly to the site of serious lung infections intended to improve the efficacy, safety and convenience of this therapeutic approach for patients.

We recently completed a phase 3 clinical trial in Europe and Canada of ARIKACE in cystic fibrosis (CF) patients who have lung infections caused by *Pseudomonas aeruginosa* (*Pseudomonas*). See "Recent Developments" below. We also are conducting a phase 2 clinical trial in the United States and Canada of ARIKACE in patients who have lung infections caused by non-tuberculous mycobacteria (NTM).

Our primary development focus is to obtain regulatory approval for ARIKACE in these two initial indications and to prepare for commercialization in Europe and Canada and then in the United States. We also intend to continue to develop ARIKACE for additional indications beyond *Pseudomonas* in CF and NTM, such as non-CF bronchiectasis.

ARIKACE is considered a new molecular entity (NME) by the United States Food and Drug Administration (FDA) primarily due to its proprietary liposomal technology. The key active ingredient in ARIKACE is amikacin, an FDA-approved antibiotic with proven efficacy in the treatment of a broad range of gram-negative infections, including *Pseudomonas* and NTM. ARIKACE is in the aminoglycoside class of antibiotics. ARIKACE is differentiated from other inhaled antibiotics used to treat serious lung infections by our proprietary advanced liposomal technology, which is designed specifically to enhance the delivery profile, safety and efficacy of pharmaceuticals delivered to the lung via inhalation. We believe ARIKACE provides potential improvements over existing treatments for *Pseudomonas* in CF and NTM.

If approved for CF patients with *Pseudomonas* lung infections, we expect ARIKACE would be the first inhaled antibiotic to be approved for once-daily administration in this indication. If approved for NTM patients, we expect ARIKACE would be the first and only approved treatment for the treatment of NTM lung infections. ARIKACE has been granted orphan drug designation for CF patients who have *Pseudomonas* lung infections in both the European Union (EU) and the US and for NTM lung infections in the US. We are currently seeking orphan drug designation for NTM lung infections in Europe.

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Recent developments

Phase 3 Clinical Trial in Europe and Canada of ARIKACE to Treat Pseudomonas in CF Patients

On July 1, 2013 we announced that that our Phase 3 study of once-daily ARIKACE to treat Pseudomonas in CF patients conducted at 75 sites in Europe and Canada met its primary endpoint of non-inferiority compared with twice daily TOBI® (tobramycin inhalation solution) for relative change in forced expiratory volume in one second (FEV₁), measured at the end of the third treatment cycle (24 weeks) as compared to baseline. The study was designed to demonstrate non-inferiority to TOBI at a 5% non-inferiority margin with 80% power agreed upon by the Company and the European Medicines Agency (EMA).

Secondary endpoints measured were relative changes in FEV₁ at other time points, time to and number of pulmonary exacerbations, time to antibiotic rescue treatment, change in density of Pa in sputum, respiratory hospitalizations and changes in Patient Reported Outcomes assessing Quality of Life. Overall, secondary endpoints showed comparability of once-daily ARIKACE compared with twice-daily TOBI consistent with the primary endpoint of the study.

The Phase 3 trial was an open-label, multi-center, randomized study designed to assess the comparative safety and efficacy of ARIKACE and TOBI in CF patients with Pa. A total of 302 adult and pediatric CF patients with chronic Pa were randomized to receive 28 days of ARIKACE treatment delivered once-daily via an investigational eFlow® Nebulizer System, or TOBI delivered twice daily via the PARI LC Plus® Nebulizer System over a 24-week treatment period.

Eligible patients from this Phase 3 trial were given the option to participate in a two-year, open-label safety study. Approximately, 75% of eligible patients have consented to participate in this study. We expect to use data from this study as part of the regulatory submissions to the European and Canadian authorities. We expect to complete our regulatory filings with the EMA and Health Canada in the first half of 2014.

QIDP and Fast Track Designation of ARIKACE for NTM Indications

On July 1, 2013 we also announced that that the FDA designated ARIKACE as a Qualified Infectious Disease Product (QIDP) for the treatment of NTM lung infections. Additionally, the FDA granted Fast Track designation to ARIKACE for the treatment of NTM.

The QIDP designation for ARIKACE will enable us to benefit from certain incentives for the development of new antibiotics, including potentially more frequent and ongoing dialogue with FDA, priority review, and, if ARIKACE is ultimately approved by the FDA, a five-year extension of Hatch-Waxman exclusivity. These incentives are provided under the Generating Antibiotic Incentives Now Act (GAIN Act), which was signed into law in July 2012 as part of the FDA Safety and Innovation Act, the fifth authorization of the Prescription Drug User Fee Act.

The Fast Track designation is intended to expedite the review of new drugs that have the potential to serve unmet medical needs in serious or life-threatening conditions. Under this designation we will have the opportunity to submit completed sections of any future NTM New Drug Application (NDA) for rolling review by FDA, rather than waiting until every section of the application is complete before the entire application can be reviewed. FDA's review clock for the NDA will begin once the final section is submitted.

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Pursuant to QIDP status, we expect to continue our dialogue with the FDA regarding the regulatory pathway for registration and approval of ARIKACE to treat NTM. We expect to complete the Phase 2 data review and related dialogue with the FDA by the end of the first quarter of 2014.

Corporate information

Insmed was incorporated in the Commonwealth of Virginia on November 29, 1999. Our principal executive offices are located at 9 Deer Park Drive, Suite C, Monmouth Junction, New Jersey 08852 and our phone number is (732) 997-4600. Our Internet address is www.insmed.com. The information on our web site is not incorporated by reference into this prospectus supplement or the accompanying prospectus and should not be considered to be part of this prospectus supplement or the accompanying prospectus.

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THE OFFERING

Common stock offered by us shares.

Common stock to be outstanding after this offering shares.

Use of proceeds We intend to use the net proceeds from this offering to fund further clinical development of ARIKACE for Pseudomonas in CF and for NTM, to fund our efforts to obtain regulatory approvals and commercialize ARIKACE for Pseudomonas in CF and for NTM, to invest in increased third-party manufacturing capacity in anticipation of possible commercial launch of ARIKACE in Europe and the United States, and the balance to fund working capital, capital expenditures, general research and development, and other general corporate purposes, which may include the acquisition or in-license of additional compounds, product candidates, technology or businesses.

Risk Factors An investment in our common stock involves a high degree of risk. See "Risk Factors" beginning on page S-5 of this prospectus supplement, as well as the sections entitled "Risk Factors" contained in the accompanying prospectus and in our Annual Report on Form 10-K for the year ended December 31, 2012 incorporated by reference in this prospectus supplement and the accompanying prospectus, before deciding to invest in shares of our common stock.

Over-allotment option We have granted the underwriters have an option for a period of 30 days from the date of this prospectus supplement to purchase up to \$9,000,000 of additional shares of our common stock to cover over-allotments.

NASDAQ Capital Market symbol INSM.

The number of shares of our common stock to be outstanding after this offering is based on 32,033,960 actual shares of our common stock outstanding as of July 12, 2013, including 1,765,271 shares retained by us as security for potential indemnification payments.

The number of shares of our common stock to be outstanding after this offering excludes:

2,347,919 shares of our common stock issuable upon the exercise of stock options outstanding as of March 31, 2013 at a weighted average price of \$4.74 per share;

200,452 shares of our common stock issuable pursuant to unvested restricted stock units outstanding as of March 31, 2013 at a weighted average price of \$7.26; and

warrants outstanding at March 31, 2013 to acquire up to 329,932 shares of our common stock at an exercise price of \$2.94 per share, all of which warrants were exercised on May 1, 2013, as a result of which we issued 223,431 shares of common stock.

Unless otherwise stated, all information in this prospectus supplement assumes no exercise by the underwriters of their over-allotment option.

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RISK FACTORS

An investment in our common stock involves significant risks. Before making an investment in our common stock, you should carefully read all of the information contained in this prospectus supplement, the accompanying prospectus and in the documents incorporated by reference herein. For a discussion of risk factors that you should carefully consider before deciding to purchase any of our common stock, please review the risk factors Item 1A. Risk Factors in our Annual Report on Form 10-K for the year ended December 31, 2012 as well as the additional risk factors disclosed below. In addition, please read "About This Prospectus Supplement" and "Forward-Looking Statements" in this prospectus supplement, where we describe additional uncertainties associated with our business and the forward-looking statements included or incorporated by reference in this prospectus supplement and the accompanying prospectus. Please note that additional risks not currently known to us or that we currently deem immaterial also may adversely affect our business, operations results of operations, financial condition and prospects.

Additional risks related to our business.

If the results of our phase 3 clinical trial are not sufficient for approval of ARIKACE, our business could be materially adversely affected.

On July 1, 2013 we announced that that our Phase 3 clinical trial of once-daily ARIKACE to treat Pseudomonas in CF patients in Europe and Canada met its primary endpoint of non-inferiority compared with twice daily TOBI® (tobramycin inhalation solution) for relative change in forced expiratory volume in one second (FEV1), measured at the end of the third treatment cycle (24 weeks) as compared to baseline. Based on the results of this clinical trial, we intend to seek regulatory approval for ARIKACE in this indication in Europe and Canada. We cannot assure you that the European Medicines Agency (EMA) or Health Canada will approve ARIKACE for commercialization. We are conducting a two-year extension study with patients from the Phase 3 study, and we expect to use data from this study as part of the regulatory submissions to the European and Canadian authorities. If the EMA and Health Canada do not approve ARIKACE for commercialization, or if the EMA and Health Canada requires us to conduct additional phase 3 clinical trials of ARIKACE in order to gain approval, commercialization of ARIKACE would be prevented or delayed, we may incur significant additional development costs and our business could be materially adversely affected.

Additional risks related to this offering and our common stock.

The market price of our stock has been and may continue to be highly volatile.

Our common stock is listed on the NASDAQ Capital Market under the ticker symbol INSM. The market price of our stock has been and may continue to be highly volatile, and could be subject to wide fluctuations in price in response to various factors, many of which are beyond our control. These factors may include:

Results of our clinical studies and preclinical studies;

Subsequent analyses of clinical trial or study data that leads to different (including less favorable) interpretations of trial or study results or that identifies additional implications of or concerns regarding a trial or study;

Delays in timing of regulatory filings and delays with respect to our ability to obtain regulatory approvals, or our inability to obtain regulatory approvals;

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Negative developments relating to our scaling up in anticipation of commercial launch of our products;

Negative regulatory actions affecting us;

An inability to obtain adequate reimbursement for our products, or reimbursement changes adversely affecting us;

Announcements by our competitors of new products or product candidates;

An inability of our products to gain commercial acceptance;

Developments related to our patents or other proprietary rights or those of our competitors;

Other competitive developments;

Reports issued by and changes in the position of securities analysts with respect to our stock or changes in stock ownership by investors;

Operating results below the expectations of securities analysts and investors;

Strategic business decisions and transactions involving us or our competitors;

Changes in government regulation;

Our listing status on the Nasdaq Capital Market; and

The need or perceived need for us to raise additional capital.

The stock market has from time to time experienced extreme price and volume fluctuations, and market prices for emerging biotechnology and pharmaceutical companies like us in particular can experience significant price and volume fluctuations. These fluctuations may adversely affect the market price of our common stock, and may not necessarily be related to our operating performance.

When the market price of a stock has been volatile, shareholders may be more likely to institute securities and derivative class action litigation against the issuer of such stock. We have been subject to securities litigation in the past. If any of our shareholders were to institute a lawsuit against us, we could incur substantial costs defending the lawsuit. Any lawsuit could divert the time and attention of our management.

We may allocate the net proceeds from this offering in ways that you and other shareholders may not approve.

We currently intend to use the net proceeds from this offering to fund further clinical development of ARIKACE for Pseudomonas in CF and for NTM, to fund our efforts to obtain regulatory approvals and commercialize ARIKACE for Pseudomonas in CF and for NTM, to invest in increased third-party manufacturing capacity in anticipation of potential commercial launch of ARIKACE in Europe and the United States and the balance to fund working capital, capital expenditures, general research and development, and other general corporate purposes, which may include the acquisition or in-license of additional compounds, product candidates, technology or businesses. This expected use of the net proceeds from this offering represents our intentions based upon our current plans and business conditions. The amounts and timing of our

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actual expenditures may vary significantly depending on numerous factors, including the progress of our development efforts, the status of and results from clinical trials, as well as any strategic transactions that we may enter into with third parties for our product candidates, and any unforeseen cash needs. Because of the number and variability of factors that will determine our use of the proceeds from this offering, their ultimate use may vary substantially from their currently intended use. As a result, our management will retain broad discretion over the allocation of the net proceeds from this offering and could spend the

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proceeds in ways that do not necessarily improve our financial condition or operating results or enhance the value of our common stock. See "Use of proceeds."

If you purchase our common stock in this offering, you will incur immediate and substantial dilution in the book value of your shares.

The public offering price of our common stock is higher than the net tangible book value per share of our common stock. Therefore, if you purchase shares of our common stock in this offering, you will pay a price per share that substantially exceeds our net tangible book value per share after this offering. To the extent shares are issued under outstanding options or restricted stock units, you will incur further dilution. See "Dilution" for a more detailed description of the dilution to new investors in the offering.

A significant portion of our total outstanding shares may be sold into the market at any time, which could cause the market price of our common stock to drop significantly, even if our business is doing well.

Upon the completion of this offering, shares of our common stock beneficially owned by our executive officers and directors will be subject to lock-up agreements with the underwriters that prohibit, subject to certain exceptions, the disposal or pledge of, or the hedging against, any of their common stock or securities convertible into or exchangeable for shares of common stock for a period of 90 days after the date of this prospectus supplement. However, all of the shares sold in this offering and the remaining shares of our common stock outstanding prior to this offering will not be subject to lock-up agreements with the underwriters and, except to the extent such shares are held by our affiliates, will be freely tradable without restriction. In addition, certain holders of our outstanding common stock have registration rights pursuant to which we may be required to register such shares for resale under the Securities Act of 1933. Sales of a substantial number of shares of our common stock in the public market could occur at any time. These sales, or the perception in the market that the holders of a large number of shares intend to sell shares, could reduce the market price of our common stock.

We may continue to need substantial additional funding. If we are unable to raise capital when needed, we would be forced to delay, reduce or eliminate our product development programs or commercialization efforts.

We expect our expenses to increase in connection with our ongoing activities, particularly as we continue the clinical development of and seek marketing approval for our product candidates, and scale up our operations in anticipation of product commercialization. In addition, if we obtain marketing approval for any of our product candidates, we expect to incur significant additional commercialization expenses related to product sales, marketing, manufacturing and distribution. Accordingly, we may need to obtain substantial additional capital. If we are unable to raise capital when needed or on attractive terms, we may be forced to delay, reduce or eliminate product development programs or commercialization efforts.

We have not paid cash dividends on our common stock, and we have no plans to pay cash dividends on our common stock in the foreseeable future.

We have never declared or paid any cash dividend on our common stock and do not currently intend to do so for the foreseeable future. We currently anticipate that we will retain any future earnings for the development, operation and expansion of our business and do not anticipate declaring or paying any cash dividends for the foreseeable future. Therefore, the success of an investment in shares of our common stock will depend upon any future appreciation in their value. There is no

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guarantee that shares of our common stock will appreciate in value or even maintain the price at which our shareholders have purchased their shares.

Certain provisions of Virginia law and our Articles of Incorporation and Bylaws could hamper a third party's acquisition of, or discourage a third party from attempting to acquire, control of us, which could decrease the market price of our common stock.

Certain provisions of Virginia law, the state in which we are incorporated, and our Articles of Incorporation and Bylaws could hamper a third party's acquisition of, or discourage a third party from attempting to acquire, control of us or limit the price that investors might be willing to pay for shares of our common stock. These provisions include:

A provision allowing us to issue preferred stock with rights senior to those of the common stock without any further vote or action by the holders of the common stock. The issuance of preferred stock could decrease the amount of earnings and assets available for distribution to the holders of common stock or could adversely affect the rights and powers, including voting rights, of the holders of the common stock. In certain circumstances, such issuance could have the effect of decreasing the market price of the common stock;

The existence of a staggered board of directors in which there are three classes of directors serving staggered three-year terms, thus expanding the time required to change the composition of a majority of directors and perhaps discouraging someone from making an acquisition proposal for us;

The requirement that shareholders provide advance notice when nominating director candidates to serve on our Board of Directors;

The inability of shareholders to act by written consent unless such written consent is unanimous;

The inability of shareholders to convene a shareholders' meeting without the chairman of the board, the president or a majority of the board of directors first calling the meeting; and

The application of Virginia law prohibiting us from entering into certain business combination transactions with the beneficial owner of 10% or more of our outstanding voting stock, unless certain criteria are met.

In addition, we previously had a "poison pill" shareholder rights plan, which expired in May 2011. Under Virginia law, our Board of Directors may implement a new shareholders rights plan without shareholder approval. Our Board of Directors may elect to do so in the future, even in the absence of specific circumstances or takeover proposals, to facilitate its future ability to quickly and effectively protect shareholder value. See "Certain Anti-Takeover and Indemnification Provisions of Our Articles of Incorporation and Bylaws and Virginia Law" in the accompanying prospectus.

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FORWARD-LOOKING STATEMENTS

This prospectus supplement, the accompanying prospectus and the other documents that are incorporated herein by reference contain forward-looking statements that involve substantial risks and uncertainties. All statements, other than statements of historical facts, including statements regarding our strategy, operations, financial results and condition, prospects, plans and objectives, are forward-looking statements. The words "anticipate," "believe," "estimate," "expect," "intend," "may," "plan," "predict," "project," "target," "potential," "will," "would," "could," "should," "continue," and similar expressions are intended to identify forward-looking statements, although not all forward-looking statements contain these identifying words. We may not actually achieve the results, plans, intentions or expectations indicated by our forward-looking statements, and you should not place undue reliance on our forward-looking statements. By their nature, forward-looking statements involve risks and uncertainties because they relate to events and depend on circumstances that may or may not occur in the future. These risks and uncertainties include, but are not limited to, those described in the "Risk Factors" section of this prospectus supplement and the accompanying prospectus. In addition, you should consider the information included under "Risk Factors" in our Annual Report on Form 10-K for the year ended December 31, 2012, incorporated by reference in this prospectus supplement.

Unless required by law, we do not undertake and we specifically disclaim any obligation to revise or update any forward-looking statements to reflect events or circumstances after the date of such statements or to reflect the occurrence of events, whether or not anticipated. We caution readers not to place undue reliance on any forward-looking statements, which speak only as of the date they are made.

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USE OF PROCEEDS

We estimate that the net proceeds we will receive from this offering will be approximately \$ million, after deducting the estimated underwriting discounts and commissions and estimated offering expenses payable by us. If the underwriters exercise their over-allotment option in full, we estimate that the net proceeds from this offering will be approximately \$ million.

We currently estimate that we will use the net proceeds from this offering as follows:

to fund further clinical development of ARIKACE for Pseudomonas in CF and for NTM;

to fund our efforts to obtain regulatory approvals and commercialize ARIKACE for Pseudomonas in CF and for NTM;

to invest in increased third-party manufacturing capacity in anticipation of potential commercial launch of ARIKACE in Europe and the United States; and

the balance to fund working capital, capital expenditures, general research and development, and other general corporate purposes, which may include the acquisition or in-license of additional compounds, product candidates, technology or businesses.

This expected use of the net proceeds from this offering represents our intentions based upon our current plans and business conditions. The amounts and timing of our actual expenditures may vary significantly depending on numerous factors, including the progress of our development efforts, the status of and results from clinical trials, as well as any strategic transactions that we may enter into with third parties for our product candidates, and any unforeseen cash needs. As a result, our management will retain broad discretion over the allocation of the net proceeds from this offering. We have no current understandings, agreements or commitments for any material acquisitions or licenses of any compounds, product candidates, technology or businesses.

Pending our use of the net proceeds from this offering, we intend to invest the net proceeds in a variety of capital preservation investments, including short-term, investment grade, interest bearing instruments and U.S. government securities.

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If you invest in our common stock in this offering, your ownership interest will be diluted immediately to the extent of the difference between the public offering price per share of our common stock and the pro forma net tangible book value per share of our common stock after this offering.

Our historical net tangible book value as of March 31, 2013 was \$49.4 million, or \$1.57 per share of our common stock, based upon 31,571,926 shares outstanding on March 31, 2013. Net tangible book value per share is equal to our total tangible assets, less our total liabilities, divided by the total number of shares outstanding as of March 31, 2013. After reflecting the sale of 5,550,416 shares of our common stock offered by us at the assumed public offering price of \$10.81 per share, less the estimated underwriting discounts and offering expenses, our as-adjusted net tangible book value would have been approximately \$105.3 million, or approximately \$2.84 per share of common stock based upon 37,122,342 shares outstanding. This represents an immediate increase in net tangible book value of \$1.27 per share to our existing shareholders and an immediate dilution in net tangible book value of \$7.97 per share to new investors. The following table illustrates this calculation on a per share basis:

Assumed public offering price per share		\$	10.81
Net tangible book value per share as of March 31, 2013	\$	1.57	
Increase in net tangible book value per share attributable to new investors	\$	1.27	
Pro forma net tangible book value per share after this offering		\$	2.84
Dilution per share to new investors		\$	7.97

The number of shares of our common stock to be outstanding excludes:

2,347,919 shares of our common stock issuable upon the exercise of stock options outstanding as of March 31, 2013 at a weighted average price of \$4.74 per share;

200,452 shares of our common stock issuable pursuant to unvested restricted stock units outstanding as of March 31, 2013 at a weighted average price of \$7.26; and

warrants outstanding at March 31, 2013 to acquire up to 329,932 shares of our common stock at an exercise price of \$2.94 per share, all of which warrants were exercised on May 1, 2013, as a result of which we issued 223,431 shares of common stock.

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Subject to the terms and conditions set forth in the underwriting agreement, dated July , 2013, between us, and Leerink Swann LLC, as the representative of the underwriters named below and the sole book-running manager of this offering, we have agreed to sell to the underwriters, and each of the underwriters has agreed, severally and not jointly, to purchase from us, the respective number of shares of common stock shown opposite its name below:

Underwriter	<u>Number of Shares</u>
Leerink Swann LLC	
Lazard Capital Markets LLC	
Canaccord Genuity Inc.	
Total	

Option to Purchase Additional Shares

We have granted to the underwriters an option, exercisable for 30 days from the date of this prospectus, to purchase, from time to time, in whole or in part, up to an aggregate of \$9,000,000 of shares of our common stock from us to cover over-allotments, if any, at the public offering price set forth on the cover page of this prospectus, less underwriting discounts and commissions. If the underwriters exercise this option, each underwriter will be obligated, subject to specified conditions, to purchase a number of additional shares proportionate to that underwriter's initial purchase commitment as indicated in the table above.

The underwriters have advised us that, following the completion of this offering, they currently intend to make a market in the common stock as permitted by applicable laws and regulations. However, the underwriters are not obligated to do so, and the underwriters may discontinue any market-making activities at any time without notice in their sole discretion. Accordingly, no assurance can be given as to the liquidity of the trading market for the common stock, that you will be able to sell any of the common stock held by you at a particular time or that the prices that you receive when you sell will be favorable.

The underwriters are offering the shares of common stock subject to their acceptance of the shares of common stock from us and subject to prior sale. The underwriters reserve the right to withdraw, cancel or modify offers to the public and to reject orders in whole or in part.

Commission and Expenses

The underwriters have advised us that they propose to offer the shares of common stock to the public at the initial public offering price set forth on the cover page of this prospectus and to certain dealers, which may include the underwriters, at that price less a concession not in excess of \$ per share of common stock. After the offering, the initial public offering price and concession may be reduced by the representative. No such reduction will change the amount of proceeds to be received by us as set forth on the cover page of this prospectus.

The following table shows the public offering price, the underwriting discounts and commissions that we are to pay the underwriters and the proceeds, before expenses, to us in connection with this offering. Such amounts are shown assuming both no exercise and full exercise of the underwriters' option to purchase additional shares.

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	Per Share		Total	
	Without Option to Purchase Additional Shares	With Option to Purchase Additional Shares	Without Option to Purchase Additional Shares	With Option to Purchase Additional Shares
Public offering price	\$	\$	\$	\$
Underwriting discounts and commissions paid by us	\$	\$	\$	\$
Proceeds to us, before expenses	\$	\$	\$	\$

We estimate expenses payable by us in connection with this offering, other than the underwriting discounts and commissions referred to above, will be approximately \$500,000.

No Sales of Similar Securities

We and each of our executive officers, directors and certain shareholders have agreed that, subject to certain exceptions, without the prior written consent of Leerink Swann LLC, we and such executive officers and directors will not, during the period ending 90 days after the date of this prospectus supplement:

offer, sell, contract to sell, sell any option or contract to purchase, purchase any option or contract to sell, grant any option, right or warrant to purchase, lend, or otherwise transfer or dispose of, directly or indirectly, any shares of common stock or securities convertible into or exercisable or exchangeable for common stock; or

enter into any swap or other arrangement that transfers to another, in whole or in part, any of the economic consequences of ownership of the common stock;

whether any such transaction described above is to be settled by delivery of common stock or such other securities, in cash or otherwise.

In addition, during such 90-day restricted period, we have agreed not to file a registration statement (other than registration statements on Form S-8) with the Securities and Exchange Commission relating to the common stock.

The lock-up restrictions described in the immediately preceding paragraph do not apply to:

with respect to us:

the shares of our common stock to be sold in this offering;

the issuance of shares of common stock upon the exercise of outstanding stock options or warrants or grants of stock options or other stock-based awards under our equity plans, or

with respect to our directors, executive officers and certain shareholders:

transfers of shares of common stock or any security convertible into common stock as a bona fide gift or by will, other testamentary document or intestate succession;

distributions of shares of common stock to limited partners, members, shareholders or wholly-owned subsidiaries of the director, officer or shareholder;

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transfers of shares of common stock or any security convertible into common stock pursuant to any order or settlement agreement not involving any public sale of shares of common stock or other securities and approved by any court of competent jurisdiction;

transfers of shares of common stock or any security convertible into common stock to any trust for the direct or indirect benefit of the director, officer or shareholder or the immediate family of such person;

transfers of shares of common stock or any security convertible into common stock to any corporation, partnership, limited liability company or similar entity of which all of the beneficial ownership interests are held by the director, officer or shareholder or the immediate family of such person;

the establishment of a new trading plan pursuant to Rule 10b5-1 under the Exchange Act providing for dispositions or sales of common stock, provided that such plan does not permit dispositions or sales of shares of common stock or any security convertible into common stock during the 90-day restricted period and no public announcement or filing under the Exchange Act regarding the establishment of such plan shall be voluntarily made during the 90-day restricted period;

the exercise of options to purchase common stock outstanding as of the date hereof or granted under equity incentive plans in effect as of the date of this prospectus supplement, provided that the underlying common stock continues to be subject to the same restrictions described above;

transfers of shares of common stock or any security convertible into common stock pursuant to a bona fide third party tender offer, merger, consolidation or other similar transaction made to holders of the common stock involving a change of control, provided that in the event that the tender offer, merger, consolidation or other such transaction is not completed, the directors, officers and certain shareholders remain subject to the restrictions described above;

the repurchase or forfeiture of securities by us in connection with termination of the director or officer's employment; or

the settlement of restricted stock, restricted stock units or options on a "net" basis or any other withholding of shares of common stock upon vesting and/or settlement of restricted stock, restricted stock units and/or options provided that (x) underlying common stock continues to be subject to the same restrictions described above and (y) the Company becomes the owner of the shares of common stock surrendered in the net exercise;

provided that in the case of any transfer or distribution described above in the first, second, third, fourth and fifth bullets, each donee, transferee or distributee agrees in writing to the same restrictions set forth above.

The directors, executive officers and certain shareholders have agreed that they shall provide Leerink two days' advance notice of any of the foregoing transfers, distributions, establishment of a plan, exercises, repurchases, forfeitures, settlements or withholdings, as applicable.

In addition, our directors, executive officers and certain shareholders have agreed that, without the prior written consent of Leerink Swann, they will not, during the 90-day restricted period, make any demand for or exercise any right with respect to, the registration of any shares of our common stock or any security convertible into or exercisable or exchangeable for our common stock.

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There are no existing agreements between the underwriters and any of our shareholders who will execute a lock-up agreement providing consent to the sale of shares prior to the expiration of the lock-up period.

Stabilization

The underwriters have advised us that they, pursuant to Regulation M under the Securities Exchange Act of 1934, as amended, certain persons participating in the offering may engage in short sale transactions, stabilizing transactions, syndicate covering transactions or the imposition of penalty bids in connection with this offering. These activities may have the effect of stabilizing or maintaining the market price of the common stock at a level above that which might otherwise prevail in the open market. Establishing short sales positions may involve either "covered" short sales or "naked" short sales.

"Covered" short sales are sales made in an amount not greater than the underwriters' option to purchase additional shares of our common stock in this offering. The underwriters may close out any covered short position by either exercising their option to purchase additional shares of our common stock or purchasing shares of our common stock in the open market. In determining the source of shares to close out the covered short position, the underwriters will consider, among other things, the price of shares available for purchase in the open market as compared to the price at which they may purchase shares through the option to purchase additional shares.

"Naked" short sales are sales in excess of the option to purchase additional shares of our common stock. The underwriters must close out any naked short position by purchasing shares in the open market. A naked short position is more likely to be created if the underwriters are concerned that there may be downward pressure on the price of the shares of our common stock in the open market after pricing that could adversely affect investors who purchase in this offering.

A stabilizing bid is a bid for the purchase of shares of common stock on behalf of the underwriters for the purpose of fixing or maintaining the price of the common stock. A syndicate covering transaction is the bid for or the purchase of shares of common stock on behalf of the underwriters to reduce a short position incurred by the underwriters in connection with the offering. Similar to other purchase transactions, the underwriter's purchases to cover the syndicate short sales may have the effect of raising or maintaining the market price of our common stock or preventing or retarding a decline in the market price of our common stock. As a result, the price of our common stock may be higher than the price that might otherwise exist in the open market. A penalty bid is an arrangement permitting the underwriters to reclaim the selling concession otherwise accruing to a syndicate member in connection with the offering if the common stock originally sold by such syndicate member are purchased in a syndicate covering transaction and therefore have not been effectively placed by such syndicate member.

Neither we nor any of the underwriters make any representation or prediction as to the direction or magnitude of any effect that the transactions described above may have on the price of our common stock. The underwriters are not obligated to engage in these activities and, if commenced, any of the activities may be discontinued at any time.

The underwriters may also engage in passive market making transactions in our common stock on The NASDAQ Capital Market in accordance with Rule 103 of Regulation M during a period before the commencement of offers or sales of shares of our common stock in this offering and extending through the completion of distribution. A passive market maker must display its bid at a price not in excess of the highest independent bid of that security. However, if all independent bids are lowered

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below the passive market maker's bid, that bid must then be lowered when specified purchase limits are exceeded.

Electronic Distribution

A prospectus in electronic format may be made available by e-mail or on the web sites or through online services maintained by one or more of the underwriters or their affiliates. In those cases, prospective investors may view offering terms online and may be allowed to place orders online. The underwriters may agree with us to allocate a specific number of common stock for sale to online brokerage account holders. Any such allocation for online distributions will be made by the underwriters on the same basis as other allocations. Other than the prospectus in electronic format, the information on the underwriters' web sites and any information contained in any other web site maintained by any of the underwriters is not part of this prospectus, has not been approved and/or endorsed by us or the underwriters and should not be relied upon by investors.

Other Activities and Relationships

The underwriters and certain of their affiliates are full service financial institutions engaged in various activities, which may include securities trading, commercial and investment banking, financial advisory, investment management, investment research, principal investment, hedging, financing and brokerage activities. The underwriters and certain of their affiliates have, from time to time, performed, and may in the future perform, various commercial and investment banking and financial advisory services for us and our affiliates, for which they received or will receive customary fees and expenses.

In the ordinary course of their various business activities, the underwriters and certain of its affiliates may make or hold a broad array of investments and actively trade debt and equity securities (or related derivative securities) and financial instruments (including bank loans) for their own account and for the accounts of their customers, and such investment and securities activities may involve securities and/or instruments issued by us and our affiliates. If the underwriters or their respective affiliates have a lending relationship with us, they routinely hedge their credit exposure to us consistent with their customary risk management policies. The underwriters and their respective affiliates may hedge such exposure by entering into transactions which consist of either the purchase of credit default swaps or the creation of short positions in our securities or the securities of our affiliates, including potentially the common stock offered hereby. Any such short positions could adversely affect future trading prices of the common stock offered hereby. The underwriters and certain of their respective affiliates may also communicate independent investment recommendations, market color or trading ideas and/or publish or express independent research views in respect of such securities or instruments and may at any time hold, or recommend to clients that they acquire, long and/or short positions in such securities and instruments.

Lazard Frères & Co. LLC referred this transaction to Lazard Capital Markets LLC and will receive a referral fee from Lazard Capital Markets LLC in connection therewith.

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**MATERIAL UNITED STATES FEDERAL INCOME AND ESTATE TAX CONSIDERATIONS
FOR NON-U.S. HOLDERS OF SHARES OF OUR COMMON STOCK**

The following is a summary of certain material United States federal income and estate tax considerations relating to the purchase, ownership, and disposition of shares of our common stock by a non-U.S. holder (as defined below) that acquires our common stock in this offering and holds it as a capital asset within the meaning of Section 1221 of the Internal Revenue Code of 1986, as amended (the "Code"). For purposes of this summary, a "non-U.S. holder" is a beneficial owner of our common stock that, for United States federal income tax purposes, is an individual, corporation, estate or trust other than:

an individual who is a citizen or resident of the United States;

a corporation, or any other organization taxable as a corporation for United States federal income tax purposes, that is created or organized under the laws of the United States, any state thereof, or the District of Columbia;

an estate the income of which is subject to United States federal income taxation regardless of its source; or

a trust if (1) a court within the United States is able to exercise primary supervision over the trust's administration and one or more United States persons (as defined in the Code) have the authority to control all substantial decisions of that trust, or (2) the trust has in effect a valid election under the applicable Treasury regulations to be treated as a United States person.

A modified definition of "non-U.S. holder" applies for United States federal estate tax purposes (as discussed below).

This summary is based upon the Code, Treasury regulations promulgated or proposed thereunder, judicial decisions, rulings, and administrative interpretations thereof, all as of the date hereof and all of which are subject to change, possibly with retroactive effect. The foregoing are subject to differing interpretations which could affect the tax consequences described herein. This summary does not purport to be a complete analysis of all the potential tax considerations relevant to non-U.S. holders of our common stock. In addition, this summary does not address all aspects of United States federal income and estate taxation that may be applicable to non-U.S. holders in light of their particular circumstances or status, nor does it address specific tax considerations that may be relevant to particular persons (including, for example, financial institutions, broker-dealers, insurance companies, partnerships or other pass-through entities, certain United States expatriates, tax-exempt organizations, pension plans, "controlled foreign corporations," "passive foreign investment companies," persons in special situations, such as those who have elected to mark securities to market, or who hold shares of our common stock as part of a straddle, hedge or other integrated investment and holders subject to the alternative minimum tax or the unearned income Medicare contribution tax). In addition, except as explicitly addressed herein with respect to estate tax, this summary does not address certain estate and any gift tax considerations or considerations under the tax laws of any state, local or non-United States jurisdiction.

If a partnership (including any entity or arrangement treated as a partnership for United States federal income tax purposes) owns our common stock, the tax treatment of a person treated as a partner in the partnership for United States federal income tax purposes generally will depend upon the status of the partner and the activities of the partnership. Partnerships and other entities that are treated as partnerships for United States federal income tax purposes and persons holding our common

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stock through a partnership or other entity treated as a partnership for United States federal income tax purposes should consult their tax advisors.

There can be no assurance that the Internal Revenue Service ("IRS") will not challenge one or more of the tax consequences described herein, and we have not obtained, nor do we intend to obtain, a ruling from the IRS or an opinion of counsel with respect to the United States federal income or estate tax consequences to a non-U.S. holder of the purchase, ownership or disposition of our common stock.

THIS SUMMARY IS FOR GENERAL INFORMATION ONLY AND IS NOT INTENDED TO BE TAX ADVICE. YOU ARE URGED TO CONSULT YOUR TAX ADVISOR REGARDING THE UNITED STATES FEDERAL INCOME AND ESTATE TAXATION, STATE, LOCAL, AND NON-UNITED STATES TAXATION AND OTHER TAX CONSEQUENCES OF THE PURCHASE, OWNERSHIP, AND DISPOSITION OF OUR COMMON STOCK, INCLUDING THE CONSEQUENCES UNDER ANY APPLICABLE TAX TREATY.

Distributions on Shares of our Common Stock

As discussed above, we do not currently expect to pay dividends. In the event we do make a distribution of cash or property with respect to our common stock, any such distributions generally will constitute dividends for United States federal income tax purposes to the extent of our current or accumulated earnings and profits, as determined under United States federal income tax principles, and will be subject to withholding as described in the next paragraph below. If a distribution exceeds our current and accumulated earnings and profits, the excess will be treated as a tax-free return of the non-U.S. holder's investment, up to such holder's adjusted tax basis in shares of our common stock. Any remaining excess will be treated as capital gain, subject to the tax treatment described below in "Gain on Sale, Exchange or Other Taxable Disposition of Our Common Stock." Any distribution described in this paragraph would also be subject to the discussion below in "Additional Withholding and Reporting Requirements."

Any dividends paid to a non-U.S. holder with respect to shares of our common stock generally will be subject to withholding of United States federal tax at a 30% rate unless such non-U.S. holder provides us or our agent, as the case may be, with the appropriate IRS Form W-8 prior to the payment of dividends, such as:

IRS Form W-8BEN (or successor form) certifying, under penalties of perjury, that such non-U.S. holder is entitled to a reduction in withholding under an applicable income tax treaty, or

IRS Form W-8ECI (or successor form) certifying, under penalties of perjury that a dividend paid on our common stock is not subject to withholding tax because it is effectively connected with the conduct of a trade or business in the United States of the non-U.S. holder (and, if required by an applicable income tax treaty, is attributable to a permanent establishment or fixed base maintained in the U.S.), in which case such dividend generally will be subject to graduated United States federal income tax rates on a net income basis as described below.

The certification requirement described above also may require a non-U.S. holder that provides an IRS form or that claims treaty benefits to provide its United States taxpayer identification number.

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Each non-U.S. holder is urged to consult its own tax advisor about the specific methods for satisfying these requirements. A claim for exemption will not be valid if the person receiving the applicable form has actual knowledge or reason to know that the statements on the form are false.

If dividends are "effectively connected" with the conduct of a trade or business in the United States of a non-U.S. holder (and, if required by an applicable income tax treaty, are attributable to a permanent establishment or fixed base maintained by such non-U.S. holder in the United States), the non-U.S. holder, although exempt from the withholding tax described above (provided that the certifications described above are satisfied), will generally be subject to United States federal income tax on such dividends on a net income basis in the same manner as if it were a resident of the United States. In addition, if the non-U.S. holder is taxable as a corporation for United States federal income tax purposes, such holder may, under certain circumstances, be subject to an additional "branch profits tax" equal to 30% (unless reduced by an applicable income tax treaty) of its effectively connected earnings and profits for the taxable year.

If a non-U.S. holder is eligible for a reduced rate of United States federal withholding tax pursuant to an applicable income tax treaty, such holder may obtain a refund or credit of any amounts withheld in excess of that rate by timely filing an appropriate refund claim with the IRS.

Gain on Sale, Exchange or Other Taxable Disposition of Shares of our Common Stock

Subject to the discussion below under "Additional Withholding and Reporting Requirements" and "Information Reporting and Backup Withholding," a non-U.S. holder generally will not be subject to United States federal income tax or withholding tax on gain realized upon a sale, exchange or other taxable disposition of shares of our common stock (including a redemption, but only if the redemption would be treated as a sale or exchange rather than a distribution for United States federal income tax purposes) unless:

- (1) the gain is "effectively connected" with the conduct of a trade or business of the non-U.S. holder in the United States (and, if required by an applicable income tax treaty, the gain is attributable to a permanent establishment or fixed base maintained in the United States);
- (2) the non-U.S. holder is an individual who is present in the United States for 183 or more days in the taxable year of the disposition and meets certain other conditions; or
- (3) we are or have been a "United States real property holding corporation" ("USRPHC") for United States federal income tax purposes at any time within the shorter of the five-year period preceding the disposition and the non-U.S. holder's holding period for our common stock (the "relevant period").

If the first exception applies, the non-U.S. holder generally will be subject to United States federal income tax on a net income basis with respect to such gain in the same manner as if such holder were a resident of the United States. In addition, if the non-U.S. holder is a corporation for United States federal income tax purposes, such gains may, under certain circumstances, also be subject to an additional "branch profits tax" at a 30% rate (or at a lower rate under an applicable income tax treaty).

If the second exception applies, the non-U.S. holder generally will be subject to United States federal income tax at a rate of 30% (unless an applicable income tax treaty provides otherwise) on the

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amount by which such non-U.S. holder's capital gains allocable to United States sources exceed capital losses allocable to United States sources during the taxable year of the disposition.

With respect to the third exception above, although there can be no assurances, we believe we currently are not, and we do not anticipate becoming, a USRPHC for United States federal income tax purposes. Generally, a corporation is a USRPHC only if the fair market value of its United States real property interests (as defined in the Code) equals or exceeds 50% of the sum of the fair market value of its worldwide real property interests plus its other assets used or held for use in a trade or business. Even if we are or become a USRPHC, a non-U.S. holder would not be subject to U.S. federal income tax on a sale, exchange or other taxable disposition of our common stock by reason of our status as a USRPHC so long as (i) our common stock continues to be regularly traded on an established securities market (within the meaning of Section 897(c)(3) of the Code) during the calendar year in which such disposition occurs and (ii) such non-U.S. holder does not own and is not deemed to own (directly, indirectly or constructively) more than 5% of our common stock at any time during the relevant period. If we are a USRPHC and the requirements of (i) or (ii) are not met, gain on the disposition of shares of our common stock generally will be taxed in the same manner as gain that is effectively connected with the conduct of a U.S. trade or business, except that the "branch profits tax" will not apply.

Additional Withholding and Reporting Requirements

Legislation enacted in March 2010 (commonly referred to as "FATCA") will impose United States federal withholding at a rate of 30% on payments to certain non-U.S. entities (including financial intermediaries), including dividends on and the gross proceeds from dispositions of our common stock, unless various information reporting and due diligence requirements, which are different from and in addition to the certification requirements described elsewhere in this discussion, have been satisfied (generally relating to ownership by U.S. persons of interests in or accounts with those entities). The withholding rules applicable to payments of dividends on our common stock are expected to be phased in beginning July 1, 2014. The withholding rules will apply to gross proceeds from dispositions of our common stock beginning January 1, 2017. Although Treasury regulations implementing FATCA were recently finalized, these rules remain unclear in several respects and are subject to material changes. Non-U.S. holders should consult their tax advisors regarding the possible implications of FATCA on their investment in our common stock.

Information Reporting and Backup Withholding

We must report annually to the IRS and to each non-U.S. holder the gross amount of the distributions on our common stock paid to such holder and the tax withheld, if any, with respect to such distributions, regardless of whether withholding was required. A non-U.S. holder will generally be subject to backup withholding on dividends paid to such holder unless such holder furnishes a valid IRS Form W-8BEN (or such other applicable form and documentation as required by the Code or the Treasury regulations) certifying under penalties of perjury that it is a non-U.S. holder (and the payor does not have actual knowledge or reason to know that such holder is a United States person as defined under the Code), or such holder otherwise establishes an exemption. Dividends paid to non-U.S. holders subject to the United States federal withholding tax, as described above in "Distributions on Shares of Our Common Stock," generally will be exempt from U.S. backup withholding.

Information reporting and, depending on the circumstances, backup withholding will apply to the payment of the proceeds of a sale or other disposition of shares of our common stock by a non-U.S. holder effected by or through the United States office of any broker, United States or foreign, unless the holder certifies that it is not a United States person (as defined under the Code)

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and satisfies certain other requirements, or otherwise establishes an exemption. Generally, information reporting and backup withholding will not apply to a payment of disposition proceeds to a non-U.S. holder where the transaction is effected outside the United States through a non-United States office of a broker. However, for information reporting purposes, dispositions effected through a non-United States office of a broker with substantial United States ownership or operations generally will be treated in a manner similar to dispositions effected through a United States office of a broker. Prospective investors should consult their own tax advisors regarding the application of the information reporting and backup withholding rules to them.

Copies of the information returns may be made available to the tax authorities in the country in which the non-U.S. holder resides or is incorporated under the provisions of an applicable treaty or agreement.

Backup withholding is not an additional tax. Any amounts withheld under the backup withholding rules may be allowed as a credit against a non-U.S. holder's United States federal income tax liability, if any, and may entitle such holder to a refund, provided that an appropriate claim is timely filed with the IRS.

Federal Estate Taxes

Shares of our common stock held (or treated as held) by an individual who is not a United States citizen or resident (as specifically determined for United States federal estate tax purposes) at the time of such individual's death generally will be included in the holder's gross estate for United States federal estate tax purposes, unless an applicable estate tax or other treaty provides otherwise, and, therefore, may be subject to United States federal estate tax.

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INCORPORATION OF CERTAIN DOCUMENTS BY REFERENCE

The SEC allows us to "incorporate by reference" into this prospectus supplement and the accompanying prospectus certain information we file with it, which means that we can disclose important information to you by referring you to those documents. The information incorporated by reference is considered to be part of this prospectus supplement and the accompanying prospectus, and information in documents that we file later with the SEC will automatically update and supersede information in this prospectus supplement and the accompanying prospectus. We incorporate by reference into this prospectus supplement and the accompanying prospectus the documents listed below and any future filings made by us with the SEC under Section 13(a), 13(c), 14 or 15(d) of the Exchange Act, except for information "furnished" under Items 2.02, 7.01 or 9.01 on Form 8-K or other information "furnished" to the SEC which is not deemed filed and not incorporated in this prospectus supplement and the accompanying prospectus, until the termination of the offering of securities described in this prospectus supplement. We hereby incorporate by reference the following documents:

Our Annual Report on Form 10-K for the year ended December 31, 2012 (including the portions of our Proxy Statement on Schedule 14A, filed on April 29, 2013, incorporated by reference therein) filed with the SEC on March 18, 2013;

Our Quarterly Report on Form 10-Q for the quarterly period ended March 31, 2012, filed with the SEC on May 7, 2013;

Our Current Reports on Form 8-K filed with the SEC on April 30, 2013, May 1, 2013, May 28, 2013, May 29, 2013 and July 1, 2013; and

The description of our common stock contained in our Registration Statement on Form 8-A filed on June 1, 2000, including any amendments or reports filed for the purpose of updating that description as supplemented by the section "Description of Common Stock" found on page 6 of the accompanying prospectus and including any amendments or reports filed for the purpose of updating such description.

You may request a copy of these filings, at no cost, by writing or telephoning us at the following address:

Insmmed Incorporated
9 Deer Park Drive, Suite C
Monmouth Junction, NJ
(732) 997-4600

Copies of these filings are also available, without charge, on the SEC's website at www.sec.gov and on our website at www.insmed.com as soon as reasonably practicable after they are filed electronically with the SEC. The information contained on our website is not a part of this prospectus supplement.

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LEGAL MATTERS

Certain legal matters will be passed upon for us by Gibson, Dunn & Crutcher LLP, New York, New York. The validity of the shares of common stock offered hereby is being passed upon for us by Hunton & Williams LLP, Richmond, Virginia. Ropes & Gray LLP, Boston, Massachusetts is counsel for the underwriters in connection with this offering.

EXPERTS

The consolidated financial statements of Insmmed Incorporated appearing in Insmmed Incorporated's Annual Report on Form 10-K for the year ended December 31, 2012 and the effectiveness of Insmmed Incorporated's internal control over financial reporting as of December 31, 2012 have been audited by Ernst & Young LLP, independent registered public accounting firm, as set forth in their reports thereon, included therein, and incorporated herein by reference. Such consolidated financial statements and Insmmed Incorporated's management's assessment of the effectiveness of internal control over financial reporting as of December 31, 2012 have been incorporated herein by reference in reliance upon such reports given on the authority of such firm as experts in accounting and auditing.

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PROSPECTUS

\$100,000,000

Insmmed Incorporated

Common Stock Preferred Stock Depositary Shares Stock Purchase Contracts Warrants Debt Securities Units

This prospectus relates to common stock, preferred stock, depositary shares, stock purchase contracts, warrants, debt securities and units that we may sell from time to time in one or more offerings up to a total dollar amount of \$100,000,000 on terms to be determined at the time of sale. We will provide specific terms of these securities in supplements to this prospectus. You should read this prospectus and any supplement carefully before you invest. This prospectus may not be used to offer and sell securities unless accompanied by a prospectus supplement for those securities.

Our common stock is listed on the Nasdaq Capital Market under the symbol "INSM."

These securities may be sold directly by us, through dealers or agents designated from time to time, to or through underwriters or through a combination of these methods. See "Plan of Distribution" in this prospectus. We may also describe the plan of distribution for any particular offering of these securities in any applicable prospectus supplement. If any agents, underwriters or dealers are involved in the sale of any securities in respect of which this prospectus is being delivered, we will disclose their names and the nature of our arrangements with them in a prospectus supplement. The net proceeds we expect to receive from any such sale will also be included in a prospectus supplement.

Investing in our securities involves a high degree of risk. See "Risk Factors" beginning on page 2.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

This prospectus may not be used to consummate sales of securities unless it is accompanied by a prospectus supplement.

The date of this prospectus is June 5, 2013

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Important Notice about the Information Presented in this Prospectus

You should rely only on the information contained or incorporated by reference in this prospectus or any applicable prospectus supplement. We have not authorized any other person to provide you with different information. If anyone provides you with different or inconsistent information, you should not rely on it. For further information, see the section of this prospectus entitled "Where You Can Find More Information." We are not making an offer to sell these securities in any jurisdiction where the offer or sale is not permitted.

You should not assume that the information appearing in this prospectus or any applicable prospectus supplement is accurate as of any date other than the date on the front cover of this prospectus or the applicable prospectus supplement, or that the information contained in any document incorporated by reference is accurate as of any date other than the date of the document incorporated by reference, regardless of the time of delivery of this prospectus or any prospectus supplement or any sale of a security. Our business, financial condition, results of operations and prospects may have changed since such dates. Neither this prospectus nor any accompanying supplement shall constitute an offer or solicitation by anyone in any jurisdiction in which such offer or solicitation is not authorized or in which the person making such offer or solicitation is not qualified to do so or to anyone to whom it is unlawful to make such offer or solicitation.

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ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement that we filed with the Securities and Exchange Commission (the "SEC"), using a "shelf" registration process. Under this shelf registration process, we may sell any combination of the securities described in this prospectus in one or more offerings up to a total dollar amount of \$100,000,000. This prospectus provides you with a general description of the securities we may offer. Each time we sell securities, we will provide a prospectus supplement that will contain specific information about the securities being offered and the terms of that offering. The prospectus supplement may also add to, update or change information contained in this prospectus.

As permitted by the rules and regulations of the SEC, the registration statement, of which this prospectus forms a part, includes additional information not contained in this prospectus. You may read the registration statement and other reports we file with the SEC on the SEC's web site or at the SEC's offices, each as further describe below under the heading "Where You Can Find More Information."

Unless otherwise expressly provided or the context otherwise requires, the terms "Insmed," "the Company," "our company," "we," "us," "our" and similar names refer collectively to Insmed and its subsidiaries. ARIKACE is a registered trademark of Insmed.

ABOUT INSMED INCORPORATED

Insmed is a biopharmaceutical company focused on developing and commercializing inhaled therapies for patients battling serious lung diseases that are often life threatening. Our lead product candidate, ARIKACE® or liposomal amikacin for inhalation, is an inhaled antibiotic treatment that delivers a proven and potent anti-infective directly to the site of serious lung infections to improve the efficacy, safety and convenience of this therapeutic approach for patients.

Currently, we are conducting clinical trials of ARIKACE for two initial indications in orphan patient populations: a phase 3 clinical trial in cystic fibrosis (CF) patients who have lung infections caused by *Pseudomonas aeruginosa* (*Pseudomonas*) and a phase 2 clinical trial in patients who have lung infections caused by non-tuberculous mycobacteria (NTM). Our strategy is to continue to develop ARIKACE for additional indications beyond *Pseudomonas* in CF and NTM. Our primary development focus is to obtain regulatory approval for ARIKACE in these two initial indications and to prepare for commercialization initially in Europe and Canada and eventually in the United States. If approved, ARIKACE will be the first once-a-day inhaled antibiotic treatment option available for these CF and NTM indications.

ARIKACE is considered a new molecular entity (NME) by the United States Food and Drug Administration (FDA) primarily due to its proprietary liposomal technology. For a further description of our liposomal technology, see the section titled "Business Our Proprietary Liposomal Technology" in our Annual Report on Form 10-K for the year ended December 31, 2012. The key active ingredient, amikacin, is an FDA-approved antibiotic with proven efficacy in the treatment of a broad range of gram-negative infections, including *Pseudomonas* and NTM. ARIKACE is in the aminoglycoside class of antibiotics.

ARIKACE is differentiated from other inhaled antibiotics used to treat serious lung infections by our proprietary advanced liposomal technology, which is designed specifically to enhance the delivery profile, safety and efficacy of pharmaceuticals delivered to the lung via inhalation. We believe ARIKACE provides potential improvements over existing treatments for these indications. In phase 2 studies in CF patients with *Pseudomonas* lung infections, ARIKACE demonstrated improved patient lung function during treatment as well as in the period following treatment (the "off-treatment" period). In a phase 2 open label extension study, ARIKACE also demonstrated statistically significant effectiveness for up to 56 days off-treatment over multiple treatment cycles.

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If approved for CF patients with *Pseudomonas* lung infections, we expect ARIKACE would be the first inhaled antibiotic to be approved for once-daily administration in this indication. If approved for NTM patients, we expect ARIKACE would be the first and only approved treatment for the treatment of NTM lung infections. ARIKACE has been granted orphan drug designation for CF patients who have *Pseudomonas* lung infections in both the European Union (EU) and the US and for NTM lung infections in the US. We are currently seeking orphan drug designation for NTM lung infections in Europe.

We believe ARIKACE also has the potential to be used to treat non-CF bronchiectasis characterized by *Pseudomonas* lung infections. However, we are currently concentrating our development efforts on the treatment of *Pseudomonas* lung infections in CF patients and patients with NTM lung infections. We will evaluate our development and commercialization strategies for this indication when we complete our Phase 3 study in CF patients with *Pseudomonas* lung infections and Phase 2 study in patients with NTM infections.

Non-CF bronchiectasis is a serious pulmonary condition characterized by localized, irreversible enlargement of the bronchial tubes. Accumulation of mucus in the bronchi leads to frequent infections, which causes inflammation and further reduces lung function. Patients evolve to a chronic inflammation-infection cycle. Disease burden has primarily been linked to productive cough and high levels of sputum production.

Corporate Information

Insmed was incorporated in the Commonwealth of Virginia on November 29, 1999. On December 1, 2010, we completed a business combination with Transave, Inc., a privately held, New Jersey-based pharmaceutical company focused on the development of differentiated and innovative inhaled pharmaceuticals for the site-specific treatment of serious lung infections. Our principal executive offices are located at 9 Deer Park Drive, Suite C, Monmouth Junction, New Jersey 08852 and our phone number is (732) 997-4600. Our Internet address is www.insmmed.com. The information on our web site is not incorporated by reference into this prospectus and should not be considered to be part of this prospectus.

RISK FACTORS

Investing in our securities involves significant risks. Please see the risk factors under the heading "Risk Factors" in our most recent Annual Report on Form 10-K, as revised or supplemented by our Quarterly Reports on Form 10-Q filed with the SEC since the filing of our most recent Annual Report on Form 10-K, each of which are on file with the SEC and are incorporated by reference in this prospectus. Before making an investment decision, you should carefully consider these risks as well as other information we include or incorporate by reference in this prospectus and any prospectus supplement. The risks and uncertainties we have described are not the only ones facing our company. Additional risks and uncertainties not presently known to us or that we currently deem immaterial may also affect our business operations, results of operation, financial condition or prospects.

SPECIAL NOTE REGARDING FORWARD-LOOKING INFORMATION

This prospectus includes and incorporates forward-looking statements within the meaning of Section 27A of the Securities Act of 1933, as amended (the "Securities Act"), and Section 21E of the Securities Exchange Act of 1934, as amended (the "Exchange Act"). All statements, other than statements of historical facts, included or incorporated in this prospectus regarding our strategy, future operations, financial position, future revenues, projected costs, prospects, plans and objectives of management are forward-looking statements. The words "anticipates," "believes," "estimates," "expects," "intends," "may," "plans," "projects," "will," "would" and similar expressions are intended

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to identify forward-looking statements, although not all forward-looking statements contain these identifying words. We cannot guarantee that we actually will achieve the plans, intentions or expectations disclosed in our forward-looking statements and you should not place undue reliance on our forward-looking statements. There are a number of important factors that could cause our actual results to differ materially from those indicated by these forward-looking statements. These important factors include the factors that we identify in the documents we incorporate by reference in this prospectus, as well as other information we include or incorporate by reference in this prospectus and any accompanying prospectus supplement. See "Risk Factors." You should read these factors and other cautionary statements made in this prospectus and any accompanying prospectus supplement, and in the documents we incorporate by reference as being applicable to all related forward-looking statements wherever they appear in the prospectus and any accompanying prospectus supplement, and in the documents incorporated by reference. We do not assume any obligation to update any forward-looking statements made by us.

Table of Contents**RATIO OF EARNINGS TO FIXED CHARGES**

We have experienced net losses for each of the last five fiscal years and for the three months ended March 31, 2013, except for the year ended December 31, 2009, when we completed the sale of our follow-on biologics platform to Merck & Co, Inc. Earnings (loss) consists of earnings (loss) before provision for income taxes plus fixed charges. Fixed charges consist of interest expense and a portion of rental expense that we believe to be representative of interest. The ratio of earnings to fixed charges presented below was computed by dividing earnings by fixed charges for the year ended December 31, 2009. The following table also discloses our dollar coverage deficiency for the years and the three months ended March 31, 2013, in which our earnings were inadequate to cover fixed charges.

	Three Months Ended March 31,	Year Ended December 31,				
	2013	2012	2011	2010	2009	2008
Ratio of Earnings to Fixed Charges	N/A(1)	N/A(2)	N/A(2)	N/A(2)	145x	N/A(2)

- (1) Fixed charges exceeded earnings by \$14.9 million for the three months ended March 31, 2013.
- (2) Fixed charges exceeded earnings by \$41.4 million, \$59.7 million, \$6.4 million and \$15.7 million for the years ended December 31, 2012, 2011, 2010 and 2008, respectively.

The ratios presented in the table above are based solely on historical financial information, and no pro forma adjustments have been made thereto. As of the date of this prospectus, we have no shares of preferred stock outstanding and have not declared or paid any cash dividends on preferred stock for the periods set forth above.

USE OF PROCEEDS

Unless otherwise provided in the applicable prospectus supplement, we intend to use the net proceeds from the sale of these securities for working capital and other general corporate purposes, including research and development expenses, clinical trial costs, expenses in connection with seeking regulatory approval for our product candidates and in preparation for product commercialization, and possibly acquisitions of other businesses, products or technologies. We have not yet determined the amount of net proceeds to be used specifically for any of the foregoing purposes. Accordingly, our management will have significant discretion and flexibility in applying the net proceeds from the sale of these securities. Pending any use, as described above, we intend to invest the net proceeds in high-quality, short-term, interest-bearing securities. Our plans to use the estimated net proceeds from the sale of these securities may change, and if they do, we will update this information in a prospectus supplement.

THE SECURITIES WE MAY OFFER

The descriptions of the securities contained in this prospectus, together with the applicable prospectus supplements, summarize the material terms and provisions of the various types of securities that we may offer. We will describe in the applicable prospectus supplement relating to any securities the particular terms of the securities offered by that prospectus supplement. If we so indicate in the applicable prospectus supplement, the terms of the securities may differ from the terms we have summarized below. We will also include in the prospectus supplement information, where applicable, about material U.S. federal income tax considerations relating to the securities, and the securities exchange, if any, on which the securities may be listed.

We may sell from time to time, in one or more offerings:

common stock;

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preferred stock;

depository shares;

stock purchase contracts;

debt securities;

warrants to purchase common stock, preferred stock, depository shares, debt securities or units; or

units comprised of common stock, preferred stock, depository shares, stock purchase contracts, warrants, and debt securities in any combination.

In this prospectus, we refer to the common stock, preferred stock, depository shares, stock purchase contracts; debt securities, warrants, and units collectively as "securities." The total dollar amount of all securities that we may issue pursuant to this prospectus will not exceed \$100,000,000.

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DESCRIPTION OF COMMON STOCK

The following is a description of the material terms and provisions of our common stock. It may not contain all the information that is important to you. You can access complete information by referring to our Articles of Incorporation, as amended (the "Articles of Incorporation"), and our Bylaws, as amended (the "Bylaws"), copies of which are filed as exhibits to the registration statement of which this prospectus forms a part.

General

Under our Articles of Incorporation, we have authority to issue 500,000,000 shares of common stock, par value \$0.01 per share. As of May 10, 2013, there were 31,795,357 shares of common stock issued and outstanding. All shares of common stock will, when issued pursuant to this prospectus, be duly authorized, fully paid and nonassessable. Accordingly, the full price for the outstanding shares of common stock will have been paid at issuance and any holder of our common stock will not be later required to pay us any additional money for such common stock.

Dividends

Subject to the prior rights of any series of preferred stock which may from time to time be outstanding, the holders of our common stock are entitled to receive such dividends, if any, as may be declared from time to time by our board of directors out of legally available funds. In the event we are liquidated, dissolved or our affairs are wound up, after we pay or make adequate provision for all of our known debts and liabilities, each holder of common stock will receive distributions pro rata out of assets that we can legally use to pay distributions, subject to any rights that are granted to the holders of any class or series of preferred stock. As of the date of this prospectus, we have not declared or paid any dividends on our shares of common stock.

Voting Rights

Holders of common stock will have the exclusive power to vote on all matters presented to our shareholders, including the election of directors, except as otherwise provided by Virginia law or as provided with respect to any other class or series of stock, as discussed in more detail below. Holders of common stock are entitled to one vote per share. There is no cumulative voting in the election of our directors, which means that, subject to any rights to elect directors that are granted to the holders of any class or series of preferred stock, a plurality of the votes cast at a meeting of shareholders at which a quorum is present is sufficient to elect a director.

Other Rights

Subject to the preferential rights of any other class or series of stock, all shares of common stock have equal dividend, distribution, liquidation and other rights, and have no preference, appraisal or exchange rights, except for any appraisal rights provided by Virginia law. Furthermore, holders of common stock have no conversion, sinking fund or redemption rights, or preemptive rights to subscribe for any of our securities.

Transfer Agent

The transfer agent and registrar for our common stock is American Stock Transfer and Trust Company. Its address is 10150 Mallard Creek Road, Suite 307, Charlotte, NC 28262.

Listing

Our common stock is listed on the Nasdaq Capital Market under the symbol "INSM."

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Registration Rights

We have granted registration rights to certain former Transave stockholders, pursuant to the Shareholders' Agreement, dated December 1, 2010, a copy of which is filed as an exhibit to the registration statement of which this prospectus forms part. Subject to specified limitations, holders of these registration rights may require that we register all or part of the shares of common stock issued to such holders of these registration rights for sale under the Securities Act. The registration rights include two demand registrations, "piggy-back" registration rights, and Form S-3 shelf registration rights. The registration rights are subject to certain dollar thresholds and other limitations, including, if applicable, holdbacks at the request of underwriters.

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DESCRIPTION OF PREFERRED STOCK

The following is a description of the material terms and provisions of our preferred stock. It may not contain all the information that is important to you. You can access complete information by referring to our Articles of Incorporation and Bylaws and to the applicable amendment to the Articles of Incorporation designating terms of a series of preferred stock.

General

Under our Articles of Incorporation, we have authority to issue 200,000,000 shares of preferred stock, par value \$0.01 per share. Our board of directors designated 500,000 shares of our preferred stock as Series A Junior Participating Preferred Stock in connection with the adoption of a rights plan, which rights plan expired by its terms and is no longer in effect.

No shares of Series A Junior Participating Preferred Stock are outstanding as of the date of this prospectus. We do not have any other shares of preferred stock outstanding as of the date of this prospectus.

Shares of preferred stock may be issued from time to time, in one or more series, as authorized by our board of directors. Prior to the issuance of shares of each series, the board of directors is required by the Virginia Stock Corporation Act (the "VSCA") and our Articles of Incorporation to fix and determine, for each series, the preferences, rights and limitations of the shares of each series and any qualifications, limitations and restrictions thereof, as are permitted by Virginia law. Our board of directors could authorize the issuance of shares of preferred stock with terms and conditions that could have the effect of discouraging a takeover or other transactions that holders of common stock might believe to be in their best interests or in which holders of some, or a majority, of the shares of common stock might receive a premium for their shares over the then market price of such shares of common stock. See "Certain Anti-Takeover and Indemnification Provisions of our Articles of Incorporation and Bylaws and Virginia Law" in this prospectus. When issued, the preferred stock will be fully paid and nonassessable and will have no preemptive rights.

Terms

If we decide to issue any preferred stock pursuant to this prospectus, we will describe in a prospectus supplement the terms of the preferred stock, including, if applicable, the following:

the title of the series and stated value;

the number of shares of the series of preferred stock offered, the liquidation preference per share, if applicable, and the offering price;

the applicable dividend rate(s) or amount(s), period(s) and payment date(s) or method(s) of calculation thereof;

the date from which dividends on the preferred stock will accumulate, if applicable;

any provisions for a sinking fund;

any applicable provision for redemption and the price or prices, terms and conditions on which preferred stock may be redeemed;

any securities exchange listing;

any voting rights and powers;

the terms and conditions, if applicable, of conversion into shares of our common stock, including the conversion price or rate or manner of calculation thereof;

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a discussion of any material U.S. federal income tax considerations;

the relative ranking and preference as to dividend rights and rights upon our liquidation, dissolution or the winding up of our affairs;

any limitations on issuance of any series of preferred stock ranking senior to or on a parity with such series of preferred stock as to dividend rights and rights upon our liquidation, dissolution or the winding up of our affairs; and

any other specific terms, preferences, rights, limitations or restrictions of such series of preferred stock.

Series A Junior Participating Preferred Stock

Liquidation Preference

The Series A Junior Participating Preferred Stock ranks junior to all other series of our preferred stock as to the payment of dividends and the distribution of assets, unless the terms of any such series provide otherwise. Upon liquidation, dissolution or winding up of Insmmed, the holders of the shares of Series A Junior Participating Preferred Stock are entitled to receive \$100 per share, plus any accrued and unpaid dividends and distributions thereonto the date of such payment. In case of any consolidation, merger, combination or other transaction in which the shares of common stock are exchanged for or changed into other stock or securities, cash and/or any other property, the shares of Series A Junior Participating Preferred Stock will at the same time be similarly exchanged or changed in an amount per share equal to 1000 times the aggregate amount of stock, securities, cash and/or any other property in to which or for which each share of common stock is changed or exchanged.

Dividend

Subject to the prior and superior rights of the holders of any shares of any series of preferred stock, shares of the Series A Junior Participating Preferred Stock are entitled to receive quarterly dividends in an amount per share equal to the greater of (i) \$1.00 or (ii) 1000 times the aggregate per share amount of all cash and non-cash dividends (other than dividends payable in shares of common stock) declared on the common stock.

Redemption

The shares of Series A Junior Participating Preferred Stock are not redeemable.

Voting

Each share of Series A Junior Participating Preferred Stock will entitle its holder to 1,000 votes on all matters submitted to a vote of our shareholders. The holders of shares of Series A Junior Participating Preferred Stock and the holders of shares of common stock will vote together as one class on all matters to a vote of our shareholders. If at any time dividends on any Series A Junior Participating Preferred Stock are in arrears in an amount equal to six quarterly dividends thereon, until all such accrued and unpaid dividends for all previous and current quarterly dividend periods are paid on all shares of Series A Junior Participating Preferred Stock, all holders of preferred stock (including holders of the Series A Junior Participating Preferred Stock) with dividends in arrears in an amount equal to six quarterly dividends thereon, voting as a class, irrespective of series, have the right to elect two directors. At any time when any shares of Series A Junior Participating Preferred Stock are outstanding, the Articles of Incorporation may not be amended in any manner that would materially alter the powers, preferences or special rights of the Series A Junior Participating Preferred Stock so as to affect them adversely without the affirmative vote of the holders of a majority or more of the then outstanding shares of the Series A Junior Participating Preferred Stock, voting separately as a class.

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DESCRIPTION OF DEPOSITARY SHARES

We may, at our option, elect to offer fractional shares of preferred stock, or "depository shares," rather than full shares of preferred stock. In that event, we will issue receipts for depository shares, and each receipt will represent a fraction of a share of a particular series of preferred stock as described in the applicable prospectus supplement.

The shares of any series of preferred stock represented by depository shares will be deposited under a deposit agreement to be entered into between us and the depository named in the applicable prospectus supplement. The deposit agreement will contain terms applicable to the holders of depository shares in addition to the terms stated in the depository receipts. Subject to the terms of the deposit agreement, each owner of a depository share will be entitled, in proportion, to all the rights and preferences of the preferred stock, including dividend, voting, redemption, subscription and liquidation rights. The terms of any depository shares will be described in the applicable prospectus supplement and the provisions of the deposit agreement, which will be filed with the SEC. You should carefully read the deposit agreement and the depository receipt attached to the deposit agreement for a more complete description of the terms of the depository shares.

If any series of preferred stock underlying the depository shares may be converted or exchanged, each record holder of depository receipts representing the shares of preferred stock being converted or exchanged will have the right or obligation to convert or exchange the depository shares represented by the depository receipts.

Whenever we redeem or convert shares of preferred stock held by the depository, the depository will redeem or convert, at the same time, the number of depository shares representing the preferred stock to be redeemed or converted. The depository will redeem or convert the depository shares from the proceeds it receives from the corresponding redemption or conversion of the applicable series of preferred stock. The redemption or conversion price per depository share will be equal to the applicable fraction of the redemption or conversion price per share on the applicable series of preferred stock. If less than all the depository shares are to be redeemed or converted, the depository will select which shares are to be redeemed or converted by lot on a pro rata basis or by any other equitable method as the depository may decide.

After the redemption or conversion date, the depository shares called for redemption or conversion will no longer be outstanding. When the depository shares are no longer outstanding, all rights of the holders will end, except the right to receive money, securities or other property payable upon redemption or conversion.

We will pay all fees, charges and expenses of the depository, including the initial deposit of preferred stock and any redemption of the preferred stock. Holders of depository shares will pay taxes and any other charges as are stated in the deposit agreement for their accounts.

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DESCRIPTION OF STOCK PURCHASE CONTRACTS

The following is a general description of the terms of the stock purchase contracts we may issue from time to time. Particular terms of any stock purchase contracts we offer will be described in the prospectus supplement relating to such stock purchase contracts. Material U.S. federal income tax considerations applicable to the stock purchase contracts will also be discussed in the applicable prospectus supplement. You should refer to the form of stock purchase contract and stock purchase certificate that we will file with the SEC in connection with the offering of the specific stock purchase contracts for more complete information.

We may issue stock purchase contracts, including contracts obligating holders to purchase from us, and obligating us to sell to holders, a specified number of shares of common stock, preferred stock or depositary shares at a future date. The consideration per share of common stock, preferred stock or depositary shares may be fixed at the time that the stock purchase contracts are issued or may be determined by reference to a specific formula set forth in the stock purchase contracts. Any stock purchase contract may include anti-dilution provisions to adjust the number of shares issuable pursuant to such stock purchase contract upon the occurrence of certain events.

The applicable prospectus supplement will describe the terms of any stock purchase contracts in respect of which this prospectus is being delivered, including, to the extent applicable, the following:

whether the stock purchase contracts obligate the holder or us to purchase or sell, or both purchase and sell, the securities subject to purchase under the stock purchase contract, and the nature and amount of each of those securities, or the method of determining those amounts;

whether the stock purchase contracts are to be prepaid or not;

whether the stock purchase contracts will be issued as part of a unit and, if so, the other securities comprising the unit;

whether the stock purchase contracts are to be settled by delivery, or by reference or linkage to the value, performance, or level of the securities subject to purchase under the stock purchase contract;

any acceleration, cancellation, termination, or other provisions relating to the settlement of the stock purchase contracts; and

whether the stock purchase contracts will be issued in full registered or global form.

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DESCRIPTION OF WARRANTS

We may issue warrants for the purchase of our common stock, preferred stock, depositary shares, debt securities or units of two or more of these types of securities. Warrants may be issued independently or together with common stock, preferred stock or debt securities and may be attached to or separate from these securities. Each series of warrants will be issued under a separate warrant agreement. We will distribute a prospectus supplement with regard to each issue or series of warrants.

Warrants to Purchase Common Stock or Preferred Stock

Each prospectus supplement for warrants to purchase common stock or preferred stock, will describe:

the title of the warrants;

the securities for which the warrants are exercisable;

the price or prices at which the warrants will be issued;

if applicable, the number of the warrants issued with each share of our common stock or preferred stock or a specified principal amount of our debt securities;

if applicable, the date on and after which such warrants and the related securities will be separately transferable;

any provisions for adjustment of the number or amount of shares of our common stock or preferred stock receivable upon exercise of the warrants or the exercise price of the warrants;

if applicable, a discussion of material U.S. federal income tax considerations; and

any other material terms of such warrants, including terms, procedures and limitations relating to the exchange and exercise of such warrants.

Warrants to Purchase Debt Securities

Each prospectus supplement for warrants to purchase debt securities will describe:

the title of the debt warrants;

the aggregate number of the debt warrants;

the price or prices at which the debt warrants will be issued;

the designation, aggregate principal amount and terms of the debt securities purchasable upon exercise of the debt warrants, and the procedures and conditions relating to the exercise of the debt warrants;

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if applicable, the number of the warrants issued with each share of our preferred stock or common stock or a specified principal amount of our debt securities;

if applicable, the date on and after which the debt warrants and the related securities will be separately transferable;

the principal amount of and exercise price for debt securities that may be purchased upon exercise of each debt warrant;

the maximum or minimum number of the debt warrants which may be exercised at any time;

if applicable, a discussion of any material U.S. federal income tax considerations; and

any other material terms of the debt warrants and terms, procedures and limitations relating to the exercise of the debt warrants.

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Exercise of Warrants

Each warrant will entitle the holder of the warrant to purchase shares of common stock or preferred stock or the principal amount of debt securities at the exercise price as shall in each case be set forth in, or be determinable as set forth in, the prospectus supplement relating to the warrants offered in the applicable prospectus supplement. Warrants may be exercised at any time up to the close of business on the expiration date set forth in the applicable prospectus supplement. After the close of business on the expiration date, unexercised warrants will become void.

Upon receipt of payment and the warrant certificate properly completed and duly executed at the corporate trust office of the warrant agent or any other office indicated in the prospectus supplement, we will, as soon as practicable, forward the common stock, preferred stock or debt securities to be purchased upon such exercise. If less than all of the warrants represented by a warrant certificate are exercised, a new warrant certificate will be issued for the remaining warrants.

Prior to the exercise of any warrants to purchase common stock, preferred stock or debt securities holders of the warrants will not have any of the rights of holders of the common stock, preferred stock or debt securities purchasable upon exercise, including:

in the case of warrants for the purchase of common stock or preferred stock, the right to vote or to receive any payments of dividends on the common stock or preferred stock purchasable upon exercise; or

in the case of warrants for the purchase of debt securities, the right to receive payments of principal of, or any premium or interest on, the debt securities purchasable upon exercise or to enforce covenants in the applicable indenture.

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DESCRIPTION OF DEBT SECURITIES

The following is a general description of the debt securities that we may offer from time to time. The particular terms of the debt securities offered by any prospectus supplement and the extent, if any, to which the general provisions described below may apply to those securities will be described in the applicable prospectus supplement. We also may sell hybrid securities that combine certain features of debt securities and other securities described in this prospectus. As you read this section, please remember that the specific terms of a debt security as described in the applicable prospectus supplement will supplement and may modify or replace the general terms described in this section. If there are differences between the applicable prospectus supplement and this prospectus, the applicable prospectus supplement will control. As a result, the statements we make in this section may not apply to the debt security you purchase.

Except as otherwise defined herein, capitalized terms used but not defined in this section have the respective meanings set forth in the applicable indenture. As used in this section, "Insmmed" refers to Insmmed Incorporated on an unconsolidated basis and does not include any of its consolidated subsidiaries.

General

The debt securities that we offer will be senior debt securities or subordinated debt securities and may be secured or unsecured. We will issue senior debt securities under an indenture, which we refer to as the senior indenture, to be entered into between Insmmed and the trustee named in the applicable prospectus supplement. We will issue subordinated debt securities under an indenture, which we refer to as the subordinated indenture, to be entered into between Insmmed and the trustee named in the applicable prospectus supplement. We refer to the senior indenture and the subordinated indenture as the indentures, and to each of the trustees under the indentures as a trustee. In addition, the indentures may be supplemented or amended as necessary to set forth the terms of any debt securities issued under the indentures. You should read the indentures, including any amendments or supplements, carefully to fully understand the terms of the debt securities. The forms of the indentures have been filed as exhibits to the registration statement of which this prospectus is a part. The indentures are subject to, and are governed by, the Trust Indenture Act of 1939.

The senior debt securities will be Insmmed's unsubordinated obligations. They will rank equally with each other and all other unsubordinated debt, unless otherwise indicated in the applicable prospectus supplement. The subordinated debt securities will be subordinated in right of payment to the prior payment in full of our senior debt. See "Subordination of Subordinated Debt Securities." The subordinated debt securities will rank equally with each other, unless otherwise indicated in the applicable prospectus supplement. We will indicate in each applicable prospectus supplement relating to subordinated debt securities, as of the most recent practicable date, the aggregate amount of our outstanding debt that would rank senior to the subordinated debt securities.

The indentures do not limit the amount of debt securities that can be issued thereunder and provide that debt securities of any series may be issued thereunder up to the aggregate principal amount that we may authorize from time to time. Unless otherwise provided in the prospectus supplement, the indentures do not limit the amount of other indebtedness or securities that we may issue. We may issue debt securities of the same series at more than one time and, unless prohibited by the terms of the series, we may reopen a series for issuances of additional debt securities, without the consent of the holders of the outstanding debt securities of that series. All debt securities issued as a series, including those issued pursuant to any reopening of a series, will vote together as a single class unless otherwise described in the prospectus supplement for such series.

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Reference is made to the prospectus supplement for the following and other possible terms of each series of the debt securities in respect of which this prospectus is being delivered:

the title of the debt securities;

any limit upon the aggregate principal amount of the debt securities of that series that may be authenticated and delivered under the applicable indenture, except for debt securities authenticated and delivered upon registration of transfer of, or in exchange for or in lieu of, other debt securities of that series;

the date or dates on which the principal and premium, if any, of the debt securities of the series is payable;

the rate or rates, which may be fixed or variable, at which the debt securities of the series shall bear interest or the manner of calculation of such rate or rates, if any, including any procedures to vary or reset such rate or rates, and the basis upon which interest will be calculated if other than that of a 360-day year of twelve 30-day months;

the date or dates from which such interest shall accrue, the dates on which such interest will be payable or the manner of determination of such dates, and the record date for the determination of holders to whom interest is payable on any such dates;

any trustees, authenticating agents or paying agents with respect to such series, if different from those set forth in the applicable indenture;

the right, if any, to extend the interest payment periods or defer the payment of interest and the duration of such extension or deferral;

the period or periods within which, the price or prices at which and the terms and conditions upon which, debt securities of the series may be redeemed, in whole or in part, at the option of Insmmed;

the obligation, if any, of Insmmed to redeem, purchase or repay debt securities of the series pursuant to any sinking fund or analogous provisions, including payments made in cash in anticipation of future sinking fund obligations, or at the option of a holder thereof and the period or periods within which, the price or prices at which, and the terms and conditions upon which, debt securities of the series shall be redeemed, purchased or repaid, in whole or in part, pursuant to such obligation;

the form of the debt securities of the series including the form of the trustee's certificate of authentication for such series;

if other than denominations of \$2,000 and any integral multiple of \$1,000 in excess thereof, the denominations in which securities of the series shall be issuable;

the currency or currencies in which payment of the principal of, premium, if any, and interest on, debt securities of the series shall be payable;

if the principal amount payable at the stated maturity of debt securities of the series will not be determinable as of any one or more dates prior to such stated maturity, the amount which will be deemed to be such principal amount as of any such date for any purpose, including the principal amount thereof that will be due and payable upon declaration of the maturity thereof

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or upon any maturity other than the stated maturity or that will be deemed to be outstanding as of any such date, or, in any such case, the manner in which such deemed principal amount is to be determined;

the terms of any repurchase or remarketing rights;

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if the securities of the series shall be issued in whole or in part in the form of a global security or securities, the type of global security to be issued; the terms and conditions, if different from those contained in the applicable indenture, upon which such global security or securities may be exchanged in whole or in part for other individual securities in definitive registered form; the depositary for such global security or securities; and the form of any legend or legends to be borne by any such global security or securities in addition to or in lieu of the legends referred to in the indenture;

whether the debt securities of the series will be convertible into or exchangeable for other debt securities, registered shares or other securities of any kind of Insmmed or another obligor, and, if so, the terms and conditions upon which such debt securities will be so convertible or exchangeable, including the initial conversion or exchange price or rate or the method of calculation, how and when the conversion price or exchange ratio may be adjusted, whether conversion or exchange is mandatory, at the option of the holder or at Insmmed's option, the conversion or exchange period, and any other provision in addition to or in lieu of those described herein;

any additional restrictive covenants or events of default that will apply to the debt securities of the series, or any changes to the restrictive covenants set forth in the applicable indenture that will apply to the debt securities of the series, which may consist of establishing different terms or provisions from those set forth in the applicable indenture or eliminating any such restrictive covenant or event of default with respect to the debt securities of the series;

any provisions granting special rights to holders when a specified event occurs;

if the amount of principal or any premium or interest on debt securities of a series may be determined with reference to an index or pursuant to a formula, the manner in which such amounts will be determined;

any special tax implications of the debt securities, including provisions for original issue discount securities, if offered;

whether and upon what terms debt securities of a series may be defeased if different from the provisions set forth in the applicable indenture;

with regard to the debt securities of any series that do not bear interest, the dates for certain required reports to the trustee;

whether the debt securities of the series will be issued as unrestricted securities or restricted securities, and, if issued as restricted securities, the rule or regulation promulgated under the Securities Act in reliance on which they will be sold;

whether the series will be issued with guarantees and, if so, the identity of the guarantor and the terms, if any, of any guarantee of the payment of principal and interest, if any, with respect to the series and any corresponding changes to the indenture as then in effect;

if the debt securities are subordinated debt securities, the subordination terms of the debt securities and any related guarantee; and

any and all additional, eliminated or changed terms that shall apply to the debt securities of the series, including any terms that may be required by or advisable under United States laws or regulations, including the Securities Act and the rules and regulations promulgated thereunder, or advisable in connection with the marketing of debt securities of that series.

"Principal" when used herein includes any premium on any series of the debt securities.

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Unless otherwise provided in the prospectus supplement relating to any debt securities, principal and interest, if any, will be payable, and transfers of the debt securities may be registered, at the office or offices or agency we maintain for such purposes, provided that payment of interest on the debt securities will be paid at such place by check mailed to the persons entitled thereto at the addresses of such persons appearing on the security register. Interest on the debt securities, if any, will be payable on any interest payment date to the persons in whose names the debt securities are registered at the close of business on the record date for such interest payment.

The debt securities may be issued in fully registered form. Additionally, the debt securities may be represented in whole or in part by one or more global notes registered in the name of a depository or its nominee and, if so represented, interests in such global note will be shown on, and transfers thereof will be effected only through, records maintained by the designated depository and its participants.

Unless otherwise provided in the prospectus supplement relating to any debt securities, the debt securities may be exchanged for an equal aggregate principal amount of debt securities of the same series and date of maturity in such authorized denominations as may be requested upon surrender of the debt securities at an agency that we maintain for such purpose and upon fulfillment of all other requirements of such agent. No service charge will be made for any registration of transfer or exchange of the debt securities, but we may require payment of an amount sufficient to cover any associated tax or other governmental charge.

The indentures require the annual filing by Insmed with the trustee of a certificate as to compliance with certain covenants contained in the indentures.

We will comply with Section 14(e) under the Exchange Act, to the extent applicable, and any other tender offer rules under the Exchange Act that may be applicable, in connection with any obligation to purchase debt securities at the option of the holders thereof. Any such obligation applicable to a series of debt securities will be described in the prospectus supplement relating thereto.

Unless otherwise described in a prospectus supplement relating to any debt securities, there are no covenants or provisions contained in the indentures that may afford the holders of debt securities protection in the event that we enter into a highly leveraged transaction.

The statements made hereunder relating to the indentures and the debt securities are summaries of certain provisions thereof and are qualified in their entirety by reference to all provisions of the indentures and the debt securities and the descriptions thereof, if different, in the applicable prospectus supplement.

Form of the Debt Securities

The indentures provide that we may issue debt securities in the forms, including temporary or definitive global form, established by a board resolution or in a supplemental indenture.

Unless indicated otherwise in the applicable prospectus supplement, we will issue debt securities in denominations of \$2,000 or any integral multiple of \$1,000, and interest on the debt securities, if any, will be computed on the basis of a 360-day year of twelve 30-day months.

Registration, Transfer, Payment and Paying Agent

We will maintain an office or agency where the debt securities may be presented for payment, registration of transfer and exchange, and, if applicable, for conversion. The indenture trustee is appointed security registrar for purposes of registering, and registering transfers of, the debt securities. Unless otherwise indicated in a board resolution or supplemental indenture, the indenture trustee also will act as paying agent, and will be authorized to pay principal and interest, if any, on any debt security of any series.

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There will be no service charge for any registration of transfer or exchange of debt securities, but we or the indenture trustee may require a holder to pay any tax or other governmental charge that may be imposed in connection with any registration of transfer or exchange of the debt securities, other than certain exchanges not involving any transfer, and other than certain exchanges or transfers as may be specified in a board resolution or supplemental indenture.

Global Debt Securities

Unless otherwise indicated in the applicable prospectus supplement for a series of debt securities, each series of the debt securities will be issued in global form, which means that we will deposit with the depository identified in the applicable prospectus supplement (or its custodian) one or more certificates representing the entire series, as described below under "Book-Entry Procedures and Settlement." Global debt securities may be issued in either temporary or definitive form.

The applicable prospectus supplement will describe any limitations and restrictions relating to a series of global debt securities.

Book-Entry Procedures and Settlement

Most offered debt securities will be book-entry, or global, securities. Upon issuance, all book-entry securities will be represented by one or more fully registered global securities, without coupons. Each global security will be deposited with, or on behalf of, The Depository Trust Company or DTC, a securities depository, and will be registered in the name of DTC or a nominee of DTC. DTC therefore will be the only registered holder of these securities.

Purchasers of debt securities may hold interests in the global securities through DTC if they are participants in the DTC system. Purchasers also may hold interests through a securities intermediary a bank, brokerage house and other institution that maintains securities accounts for customers that has an account with DTC or its nominee. DTC will maintain accounts showing the security holdings of its participants, and these participants will in turn maintain accounts showing the security holdings of their customers. Some of these customers may be securities intermediaries holding securities for their customers. Thus, each beneficial owner of a book-entry security will hold that security indirectly through a hierarchy of intermediaries, with DTC at the top and the beneficial owner's own securities intermediary at the bottom.

The securities of each beneficial owner of a book-entry security will be evidenced solely by entries on the books of the beneficial owner's securities intermediary. The actual purchaser of the securities generally will not be entitled to have the securities represented by the global securities registered in its name and will not be considered the owner under the indenture, the declaration of trust or other applicable governing documents relating to the security. In most cases, a beneficial owner will not be able to obtain a paper certificate evidencing the holder's ownership of securities. The book-entry system for holding securities eliminates the need for physical movement of certificates. However, the laws of some jurisdictions require some purchasers of securities to take physical delivery of their securities in definitive form. These laws may impair the ability to transfer book-entry securities.

A beneficial owner of book-entry securities represented by a global security may exchange the securities for definitive, or paper, securities only if:

DTC is unwilling or unable to continue as depository for such global security and we do not appoint a qualified replacement for DTC within 90 days; or

we decide in our sole discretion to allow some or all book-entry securities to be exchangeable for definitive securities in registered form.

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Unless otherwise indicated, any global security that is exchangeable will be exchangeable in whole for definitive securities in registered form, with the same terms and of an equal aggregate principal amount. Definitive securities will be registered in the name or names of the person or persons specified by DTC in a written instruction to the registrar of the securities. DTC may base its written instruction upon directions that it receives from its participants.

In this prospectus, for book-entry securities, references to actions taken by security holders will mean actions taken by DTC upon instructions from its participants, and references to payments and notices of redemption to security holders will mean payments and notices of redemption to DTC as the registered holder of the securities for distribution to participants in accordance with DTC's procedures.

DTC is a limited purpose trust company organized under the laws of the State of New York, a member of the Federal Reserve System, a clearing corporation within the meaning of the New York Uniform Commercial Code and a clearing agency registered under section 17A of the Securities Exchange Act of 1934. The rules applicable to DTC and its participants are on file with the SEC.

Neither we nor any trustee or underwriter will have any responsibility or liability for any aspect of the records relating to, or payments made on account of, beneficial ownership interest in the book-entry securities or for maintaining, supervising or reviewing any records relating to the beneficial ownership interests.

Links may be established among DTC, Clearstream Banking, S.A. (Clearstream) and the Euroclear System (Euroclear) to facilitate the initial issuance of book-entry securities and cross-market transfers of book-entry securities associated with secondary market trading. Euroclear and Clearstream are international clearing systems that perform functions similar to those that DTC performs in the United States.

Although we understand that DTC, Clearstream and Euroclear have agreed to the procedures provided below in order to facilitate transfers, they are under no obligation to perform such procedures, and the procedures may be modified or discontinued at any time.

Clearstream and Euroclear will record the ownership interests of their participants in much the same way as DTC, and DTC will record the aggregate ownership of each of the U.S. agents of Clearstream and Euroclear, as participants in DTC.

When book-entry securities are to be transferred from the account of a DTC participant to the account of a Clearstream participant or a Euroclear participant, the purchaser must send instructions to Clearstream or Euroclear through a participant at least one business day prior to settlement. Clearstream or Euroclear, as the case may be, will instruct its U.S. agent to receive book-entry securities against payment. After settlement, Clearstream or Euroclear will credit its participant's account. Credit for the book-entry securities will appear on the next day (European time).

Because settlement is taking place during New York business hours, DTC participants can employ their usual procedures for sending book-entry securities to the relevant U.S. agent acting for the benefit of Clearstream or Euroclear participants. The sale proceeds will be available to the DTC seller on the settlement date. Thus, to the DTC participant, a cross-market transaction will settle no differently than a trade between two DTC participants.

When a Clearstream or Euroclear participant wishes to transfer book-entry securities to a DTC participant, the seller must send instructions to Clearstream or Euroclear through a participant at least one business day prior to settlement. In these cases, Clearstream or Euroclear will instruct its U.S. agent to transfer the book-entry securities against payment. The payment will then be reflected in the account of the Clearstream or Euroclear participant the following day, with the proceeds back-valued to the value date (which would be the preceding day, when settlement occurs in New York). If settlement is not completed on the intended value date (i.e., the trade fails), proceeds credited to the Clearstream or Euroclear participant's account would instead be valued as of the actual settlement date.

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The information in this "Book-Entry Procedures and Settlement" section, including any description of the operations and procedures of DTC, Euroclear or Clearstream, has been provided solely as a matter of convenience. We do not take any responsibility for the accuracy of this information, and this information is not intended to serve as a representation, warranty or contract modification of any kind. The operations and procedures of DTC, Euroclear and Clearstream are solely within the control of such settlement systems and are subject to changes by them. We urge investors to contact such systems or their participants directly to discuss these matters.

Subordination of Subordinated Debt Securities

We will set forth in the applicable prospectus supplement the terms and conditions, if any, upon which any series of subordinated debt securities is subordinated to debt securities of another series or to our other indebtedness. The terms will include a description of:

- (1) the indebtedness ranking senior to the debt securities being offered;
- (2) the restrictions, if any, on payments to the holders of the debt securities being offered while a default with respect to the senior indebtedness is continuing; and
- (3) the provisions requiring holders of the debt securities being offered to remit some payments to the holders of senior indebtedness.

Events of Default

Except as otherwise set forth in the prospectus supplement relating to any debt securities, an event of default with respect to the debt securities of any series is defined in the indentures as:

- (1) default in the payment of any installment of interest upon any of the debt securities of such series as and when the same shall become due and payable, and continuance of such default for a period of 30 days;
- (2) default in the payment of all or any part of the principal of or premium, if any, on any of the debt securities of such series as and when the same shall become due and payable either at maturity, upon any redemption or repurchase, by declaration or otherwise;
- (3) default in the performance, or breach, of any other covenant or warranty of Insmmed in respect of the debt securities of such series and any related guarantee or set forth in the applicable indenture (other than the failure to comply with any covenant or agreement to file with the trustee information required to be filed with the SEC or a default in the performance or breach of a covenant or warranty included in the applicable indenture solely for the benefit of one or more series of debt securities other than such series) and continuance of such default or breach for a period of 90 days after due notice by the trustee or by the holders of at least 25% in principal amount of the outstanding securities of such series; or
- (4) certain events of bankruptcy, insolvency or reorganization of Insmmed.

Any failure to perform, or breach of, any covenant or agreement by Insmmed in respect of the debt securities with respect to the filing with the trustee of the information required to be filed with the SEC shall not be a default or an event of default. Remedies against Insmmed for any such failure or breach will be limited to liquidated damages. If there is such a failure or breach and continuance of such failure or breach for a period of 90 days after the date on which there has been given, by registered or certified mail, to Insmmed by the trustee or to Insmmed and the trustee by the holders of at least 25% in principal amount of the outstanding debt securities of such series, a written notice specifying such failure or breach and requiring it to be remedied and stating that such notice is a "Notice of Reporting Noncompliance" under the indenture, Insmmed will pay liquidated damages to all holders of debt securities, at a rate per year equal to 0.25% of the principal amount of such debt

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securities from the 90th day following such notice to and including the 150th day following such notice and at a rate per year equal to 0.5% of the principal amount of such Securities from and including the 151st day following such notice, until such failure or breach is cured.

Additional Events of Default may be added for the benefit of holders of certain series of debt securities that, if added, will be described in the prospectus supplement relating to such debt securities.

If an event of default shall have occurred and be continuing in respect of a series of debt securities, in each and every case, unless the principal of all the debt securities of such series shall have already become due and payable, either the trustee or the holders of not less than 25% in aggregate principal amount of the debt securities of such series then outstanding, by notice in writing to Insmmed and, if given by such holders, to the trustee may declare the unpaid principal of all the debt securities to be due and payable immediately.

The holders of a majority in aggregate principal amount of a series of debt securities, by written notice to Insmmed and the trustee may waive any existing default in the performance of any of the covenants contained in the indenture or established with respect to such series of debt securities and its consequences, except a default in the payment of the principal of, premium, if any, or interest on, any of the debt securities of such series as and when the same shall become due by the terms of such series. Upon any such waiver, the default covered thereby and any event of default arising therefrom shall be deemed to be cured for all purposes of the indenture.

The holders of a majority in aggregate principal amount of the outstanding debt securities of a series shall have the right to direct the time, method and place of conducting any proceeding for any remedy available to the trustee or exercising any trust or power conferred on the trustee with respect to the debt securities of such series; provided, however, that such direction shall not be in conflict with any rule of law or with the indenture or be unduly prejudicial to the rights of holders of securities of any other outstanding series of debt securities. Subject to the terms of the indenture, the trustee shall have the right to decline to follow any such direction if the trustee in good faith shall determine that the proceeding so directed would involve the trustee in personal liability.

Merger

Each indenture provides that Insmmed may merge or consolidate with any other person or sell or convey all or substantially all of its assets to any person if:

(1) either (a) Insmmed is the continuing company or (b) the successor person expressly assumes all of the obligations of the Company under the applicable indenture, is an entity treated as a corporation for U.S. tax purposes and obtains either (x) an opinion, in form and substance reasonably acceptable to the Trustee or (y) a ruling from the U.S. Internal Revenue Service, in either case (x) or (y) to the effect that such merger or consolidation, or such sale or conveyance, will not result in an exchange of the debt securities for new debt instruments for U.S. federal income tax purposes; and

(2) no event of default and no event that, after notice or lapse of time or both, would become an event of default shall be continuing immediately after such merger or consolidation, or such sale or conveyance.

Satisfaction and Discharge of Indentures

The indenture with respect to any series of debt securities (except for certain specified surviving obligations, including our obligation to pay the principal of and interest, if any, on the debt securities of such series) will be discharged and cancelled upon the satisfaction of certain conditions, including the payment of all the debt securities of such series or the deposit with the trustee under such indenture of cash or appropriate government obligations or a combination thereof sufficient for such payment or redemption in accordance with the applicable indenture and the terms of the debt securities of such series.

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Modification of the Indentures

Insmmed and the trustee may from time to time and at any time enter into an indenture or indentures supplemental to the indenture without the consent of any holders of any series of securities for one or more of the following purposes:

to cure any ambiguity, defect or inconsistency in the indenture or debt securities of any series, including making any such changes as are required for the indenture to comply with the Trust Indenture Act;

to add an additional obligor on the debt securities or to evidence the succession of another person to Insmmed, or successive successions, and the assumption by the successor person of the covenants, agreements and obligations of Insmmed pursuant to provisions in the indenture concerning consolidation, merger, the sale of assets or successor entities;

to provide for uncertificated debt securities in addition to or in place of certificated debt securities;

to add to the covenants of Insmmed for the benefit of the holders of any outstanding series of debt securities or to surrender any of Insmmed's rights or powers under the indenture;

to add any additional Events of Default for the benefit of the holders of any outstanding series of debt securities;

to change or eliminate any of the provisions of the indenture, provided that any such change or elimination shall not become effective with respect to any outstanding debt security of any series created prior to the execution of such supplemental indenture which is entitled to the benefit of such provision;

to secure the debt securities of any series;

to make any other change that does not adversely affect the rights of any holder of outstanding debt securities in any material respect;

to provide for the issuance of and establish the form and terms and conditions of a series of debt securities, to provide which, if any, of the covenants of Insmmed shall apply to such series, to provide which of the events of default shall apply to such series, to name one or more guarantors and provide for guarantees of such series of debt securities, to provide for the terms and conditions upon which any guarantees by a guarantor of such series may be released or terminated, or to define the rights of the holders of such series of debt securities;

to issue additional debt securities of any series; provided that such additional debt securities have the same terms as, and be deemed part of the same series as, the applicable series of debt securities to the extent required under the indenture; or

to evidence and provide for the acceptance of appointment by a successor trustee with respect to the debt securities of one or more series and to add to or change any of the provisions of the indenture as shall be necessary to provide for or facilitate the administration of the trust by more than one trustee.

In addition, under the indenture, with the written consent of the holders of not less than a majority in aggregate principal amount of the debt securities of each series at the time outstanding that is affected, Insmmed and the trustee, from time to time and at any time may enter into an indenture or indentures to supplement the indenture. However, the following changes may only be made with the consent of each holder of outstanding debt securities affected:

extend a fixed maturity of or any installment of principal of any debt securities of any series or reduce the principal amount thereof or reduce the amount of principal of any original issue

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discount security that would be due and payable upon declaration of acceleration of the maturity thereof;

reduce the rate of or extend the time for payment of interest on any debt security of any series;

reduce the premium payable upon the redemption of any debt security;

make any debt security payable in currency other than that stated in the debt security;

impair the right to institute suit for the enforcement of any payment on or after the fixed maturity thereof or, in the case of redemption, on or after the redemption date;

modify the subordination provisions applicable to any debt security or the related guarantee in a manner materially adverse to the holder thereof; or

reduce the percentage of debt securities, the holders of which are required to consent to any such supplemental indenture or indentures.

A supplemental indenture that changes or eliminates any covenant, event of default or other provision of the indenture that has been expressly included solely for the benefit of one or more particular series of securities, if any, or which modifies the rights of the holders of securities of such series with respect to such covenant, event of default or other provision, shall be deemed not to affect the rights under the indenture of the holders of securities of any other series.

It will not be necessary for the consent of the holders to approve the particular form of any proposed supplement, amendment or waiver, but it shall be sufficient if such consent approves the substance of it.

Defeasance and Discharge of Obligations

Insmed's obligations with respect to a series of debt securities will be discharged upon compliance with the conditions under the caption "Covenant Defeasance" if, with respect to all debt securities of such series that have not been previously delivered to the trustee for cancellation or that have not become due and payable as described below, such debt securities of such series have been paid by Insmed by depositing irrevocably with the trustee, in trust, funds or governmental obligations, or a combination thereof, sufficient, in the opinion of a nationally recognized firm of certified public accountants, to pay at maturity or upon redemption all such outstanding debt securities of such series, such deposit to include: principal; premium, if any; interest due or to become due to such date of maturity or date fixed for redemption, as the case may be; and all other payments due under the terms of the indenture with respect to the debt securities of such series.

Notwithstanding the above, Insmed may not be discharged from the following obligations, which will survive until such date of maturity or the redemption date for a series of debt securities: to make any interest or principal payments that may be required; to register the transfer or exchange of a series of debt securities; to execute and authenticate a series of debt securities; to replace stolen, lost or mutilated debt securities of such series; to maintain an office or agency; to maintain paying agencies; and to appoint new trustees as required.

Insmed also may not be discharged from the following obligations which will survive the satisfaction and discharge of a series of debt securities: to compensate and reimburse the trustee in accordance with the terms of the indenture; to receive unclaimed payments held by the trustee for at least one year after the date upon which the principal, if any, or interest on a series of debt securities shall have respectively come due and payable and remit those payments to the holders if required; and to withhold or deduct taxes as provided in the indenture.

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Covenant Defeasance

Upon compliance with specified conditions, Insmmed will not be required to comply with some covenants contained in the indenture, and any omission to comply with the obligations will not constitute a default or event of default relating to a series of debt securities, or, if applicable, Insmmed's obligations with respect to a series of debt securities will be discharged. These conditions are:

Insmmed irrevocably deposits in trust with the trustee or, at the option of the trustee, with a trustee satisfactory to the trustee and Insmmed under the terms of an irrevocable trust agreement in form and substance satisfactory to the trustee, funds or governmental obligations or a combination thereof sufficient, in the opinion of a nationally recognized firm of certified public accountants, to pay principal of, premium, if any, and interest on the outstanding debt securities of such series to maturity or redemption, as the case may be, and to pay all other amounts payable by it hereunder, provided that (A) the trustee of the irrevocable trust shall have been irrevocably instructed to pay such funds or the proceeds of such governmental obligations to the trustee and (B) the trustee shall have been irrevocably instructed to apply such funds or the proceeds of such governmental obligations to the payment of principal, premium, if any, and interest with respect to such series of debt securities;

Insmmed delivers to the trustee an officer's certificate stating that all conditions precedent specified herein relating to defeasance or covenant defeasance, as the case may be, have been complied with, and an opinion of counsel to the same effect;

no event of default shall have occurred and be continuing, and no event which with notice or lapse of time or both would become such an event of default shall have occurred and be continuing, on the date of such deposit;

Insmmed shall have delivered to the trustee an opinion of counsel or a ruling received from the Internal Revenue Service to the effect that the holders of such series of debt securities will not recognize income, gain or loss for federal income tax purposes as a result of Insmmed's exercise of such defeasance or covenant defeasance and will be subject to U.S. Federal income tax in the same amount and in the same manner and at the same times as would have been the case if such election had not been exercised;

such defeasance or covenant defeasance shall not (i) cause the trustee to have a conflicting interest for purposes of the Trust Indenture Act with respect to any securities or (ii) result in the trust arising from such deposit to constitute, unless it is registered as such, a regulated investment company under the Investment Company Act of 1940; and

such defeasance or covenant defeasance shall be effected in compliance with any additional or substitute terms, conditions or limitations which may be imposed on Insmmed pursuant to the indenture.

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DESCRIPTION OF UNITS

The following description, together with the additional information we include in any applicable prospectus supplement, summarizes the material terms and provisions of the units that we may offer under this prospectus. Units may be offered independently or together with common stock, preferred stock, debt securities and/or warrants offered by any prospectus supplement, and may be attached to or separate from those securities.

While the terms we have summarized below will generally apply to any future units that we may offer under this prospectus, we will describe the particular terms of any series of units that we may offer in more detail in the applicable prospectus supplement. The terms of any units offered under a prospectus supplement may differ from the terms described below.

We will incorporate by reference into the registration statement of which this prospectus is a part the form of unit agreement, including a form of unit certificate, if any, that describes the terms of the series of units we are offering before the issuance of the related series of units. The following summaries of material provisions of the units and the unit agreements are subject to, and qualified in their entirety by reference to, all the provisions of the unit agreement applicable to a particular series of units. We urge you to read the applicable prospectus supplements related to the units that we sell under this prospectus, as well as the complete unit agreements that contain the terms of the units.

General

We may issue units consisting of common stock, preferred stock, depositary shares, stock purchase contracts, debt securities, warrants or any combination thereof. Each unit will be issued so that the holder of the unit is also the holder of each security included in the unit. Thus, the holder of a unit will have the rights and obligations of a holder of each included security. The unit agreement under which a unit is issued may provide that the securities included in the unit may not be held or transferred separately, at any time, or at any time before a specified date.

We will describe in the applicable prospectus supplement the terms of the series of units, including the following:

the designation and terms of the units and of the securities comprising the units, including whether and under what circumstances those securities may be held or transferred separately;

any provisions of the governing unit agreement that differ from those described below; and

any provisions for the issuance, payment, settlement, transfer, or exchange of the units or of the securities comprising the units.

The provisions described in this section, as well as those described under "Description of Common Stock," "Description of Preferred Stock," "Description of Warrants," "Description of Debt Securities," and "Description of Units" will apply to each unit and to any common stock, preferred stock, debt security or warrant included in each unit, respectively.

Issuance in Series

We may issue units in such amounts and in such numerous distinct series as we determine.

Enforceability of Rights by Holders of Units

Each unit agent will act solely as our agent under the applicable unit agreement and will not assume any obligation or relationship of agency or trust with any holder of any unit. A single bank or trust company may act as unit agent for more than one series of units. A unit agent will have no duty or responsibility in case of any default by us under the applicable unit agreement or unit, including any

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duty or responsibility to initiate any proceedings at law or otherwise, or to make any demand upon us. Any holder of a unit, without the consent of the related unit agent or the holder of any other unit, may enforce by appropriate legal action its rights as holder under any security included in the unit.

Title

We, the unit agent and any of their agents may treat the registered holder of any unit certificate as an absolute owner of the units evidenced by that certificate for any purposes and as the person entitled to exercise the rights attaching to the units so requested, despite any notice to the contrary.

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CERTAIN ANTI-TAKEOVER AND INDEMNIFICATION PROVISIONS OF OUR ARTICLES OF INCORPORATION AND BY-LAWS AND VIRGINIA LAW

The following is a summary of certain anti-takeover and indemnification provisions of Virginia law and our Articles of Incorporation and Bylaws which affect us and our shareholders. The description below is intended as only a summary. You can access complete information by referring to the VSCA and our Articles of Incorporation and Bylaws, and the following summary is qualified in its entirety by reference to such documents and the applicable provisions of the VSCA.

Board Composition, Removal of Directors and Filling Vacancies

In accordance with our Articles of Incorporation, our board is divided into three classes serving staggered three-year terms, with one class being elected each year. Our Articles of Incorporation also provide that, for so long as the board is classified, directors may be removed only for cause and then only by the affirmative vote of the holders of at least 75% of the shares of capital stock issued and outstanding and entitled to vote generally in the election of directors. Furthermore any vacancy on our board of directors, however occurring, including a vacancy resulting from an increase in the size of our board, may be filled solely (i) by the affirmative vote of a majority of our directors then in office even if less than a quorum or (ii) at an annual meeting of shareholders by the shareholders entitled to vote on the election of directors. Any amendment to the provisions of the Articles of Incorporation with respect to these matters must be approved by at least 75% of the outstanding shares of capital stock entitled to vote on the amendment.

Blank Check Preferred Stock

We have shares of preferred stock available for future issuance without shareholder approval, except to the extent holders of preferred stock have a consent right under the terms of their preferred stock. The existence of authorized but unissued shares of preferred stock may enable our board of directors to render more difficult or to discourage an attempt to obtain control of us by means of a merger, tender offer, proxy contest or otherwise. For example, if in the due exercise of its fiduciary obligations, our board of directors were to determine that a takeover proposal is not in the best interests of us or our shareholders, our board of directors could cause shares of preferred stock to be issued without shareholder approval in one or more private offerings or other transactions that might dilute the voting or other rights of the proposed acquirer or insurgent shareholder or shareholder group. In this regard, our Articles of Incorporation grant our board of directors broad power to establish the rights and preferences of authorized and unissued shares of preferred stock. The issuance of shares of preferred stock could decrease the amount of earnings and assets available for distribution to holders of shares of common stock. The issuance may also adversely affect the rights and powers, including voting rights, of these holders and may have the effect of delaying, deterring or preventing a change in control of us.

Affiliated Transactions Statute

Virginia law contains provisions that limit Insmmed's ability to enter into certain transactions, called affiliated transactions, with interested shareholders for a period of three years following the date that such person became an interested shareholder unless:

a majority of the disinterested members of the board of directors of the corporation and the holders of two-thirds of the voting shares, other than the shares beneficially owned by the interested shareholder, approve the affiliated transaction; or

before the date the person became an interested shareholder, a majority of the disinterested members of the board of directors approved the transaction that resulted in the shareholder becoming an interested shareholder.

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In general, a shareholder is an interested shareholder if it beneficially owns more than 10% of any class of Insmmed's outstanding voting shares. Affiliated transactions subject to the statute include:

mergers of Insmmed or its subsidiaries with an interested shareholder or with any other corporation that immediately after the merger would be an affiliate of an interested shareholder;

share exchanges in which an interested shareholder acquires one or more classes or series of voting shares of Insmmed or its subsidiaries;

except for transactions in the ordinary course of business, any sale, lease, exchange, mortgage, pledge, transfer or other disposition (in one transaction or a series of transactions) to or with any interested shareholder of any assets of Insmmed or its subsidiaries having an aggregate fair market value in excess of 5% of Insmmed's consolidated net worth as of the date of the most recently available financial statements;

except for transactions in the ordinary course of business, any guaranty by Insmmed or any of its subsidiaries (in one transaction or a series of transactions) of indebtedness of any interested shareholder in an amount in excess of 5% of Insmmed's consolidated net worth as of the date of the most recently available financial statements;

the sale or other disposition by Insmmed or its subsidiaries to an interested shareholder (in one transaction or a series of transactions) of any voting shares of Insmmed or its subsidiaries having an aggregate fair market value in excess of 5% of the aggregate fair market value of all outstanding voting shares of Insmmed as of the determination date except pursuant to a share dividend or the exercise of rights or warrants distributed or offered on a basis affording substantially proportionate treatment to all holders of the same class or series of voting shares;

the dissolution of the corporation if proposed by or on behalf of an interested shareholder; or

any reclassification of securities, including any reverse stock split, or recapitalization of the corporation, or any merger of Insmmed with any of its subsidiaries or any distribution or other transaction, whether or not with or into or otherwise involving an interested shareholder, which has the effect, directly or indirectly (in one transaction or a series of transactions), of increasing by more than 5% the percentage of the outstanding voting shares of Insmmed or any of its subsidiaries beneficially owned by any interested shareholder.

After three years, any such transaction must be at a "fair price," as statutorily defined or must be approved by the holders of two-thirds of the voting shares, other than the shares beneficially owned by the interested shareholder.

Control Share Acquisitions Statute

As permitted by Virginia law, our Articles of Incorporation contain a provision opting out of the control share acquisition provisions of Virginia law. In absence of such opt out, Virginia law governs control share acquisitions, which are transactions causing the voting strength of any person acquiring beneficial ownership of shares of a Virginia public corporation to meet or exceed certain threshold percentages (20%, 33 $\frac{1}{3}$ % or 50%) of the total votes entitled to be cast for the election of directors. Under the default statutory rule, shares acquired in a control share acquisition would have no voting rights unless the voting rights are granted by a majority vote of all outstanding shares other than those held by the acquiring person or any officer or employee director of the corporation. The acquiring person may require that a special meeting of the shareholders be held to consider the grant of voting rights to the shares acquired in the control share acquisition.

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Indemnification of Directors and Officers

Our Articles of Incorporation provide that no director or officer shall be liable to Insmmed or our shareholders for monetary damages except for liability resulting from willful misconduct or a knowing violation of the criminal law or of any federal or state securities laws.

Our Articles of Incorporation require us to indemnify any director, officer or employee who is or was a party to a proceeding due to his or her status as a director, officer or employee of Insmmed or who is or was serving at our request as a director, officer or employee of another corporation, partnership, joint venture, trust, employee benefit plan or other enterprise. This indemnification covers all reasonable expenses incurred by any such director, officer or employee. Such indemnification will be made unless the board of directors, by a majority vote of a quorum of those directors who were directors at the time of the occurrence giving rise to the claim, action or proceeding involved and who were not at the time parties to such claim, action or proceeding or, under certain circumstances, independent legal counsel appointed by the board of directors, determines that the director, officer or employee seeking indemnification was guilty of willful misconduct or a knowing violation of the criminal law.

Insofar as indemnification for liabilities under the Securities Act may be permitted to directors, officers and controlling persons of Insmmed pursuant to the foregoing provisions or otherwise, we have been informed that, in the opinion of the SEC, indemnification for liabilities under the Securities Act is against public policy and is unenforceable.

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PLAN OF DISTRIBUTION

We may offer and sell the securities described in this prospectus:

through agents;

through one or more underwriters or dealers;

through a block trade in which the broker or dealer engaged to handle the block trade will attempt to sell the securities as agent, but may position and resell a portion of the block as principal to facilitate the transaction;

directly to one or more purchasers (through a specific bidding or auction process or otherwise);

in "at the market offerings," within the meaning of Rule 415(a)(4) of the Securities Act;

through a combination of any of these methods of sale; or

at a fixed exchange ratio in return for other of our securities.

The distribution of the securities described in this prospectus may be effected from time to time in one or more transactions either:

at a fixed price or prices, which may be changed;

at market prices prevailing at the time of sale;

at prices relating to the prevailing market prices; or

at negotiated prices.

Offers to purchase the securities may be solicited by agents designated by us from time to time. Any agent involved in the offer or sale of the securities will be named, and any commissions payable by us to the agent will be described, in the applicable prospectus supplement. Unless otherwise indicated in the applicable prospectus supplement, any such agent will be acting on a best efforts basis for the period of its appointment. Any agent may be deemed to be an underwriter, as that term is defined in the Securities Act, of the securities so offered and sold.

If we offer and sell securities through an underwriter or underwriters, we will execute an underwriting agreement with the underwriter or underwriters. The names of the specific managing underwriter or underwriters, as well as any other underwriters, and the terms of the transactions, including compensation of the underwriters and dealers, which may be in the form of discounts, concessions or commissions, if any, will be described in the applicable prospectus supplement, which will be used by the underwriters to make resales of the securities.

If we offer and sell securities through a dealer, we or an underwriter will sell the securities to the dealer, as principal. The dealer may then resell the securities to the public at varying prices to be determined by the dealer at the time of resale. The name of the dealer and the terms of the transactions will be set forth in the applicable prospectus supplement. Any dealer may be deemed to be an underwriter, as that term is defined in the Securities Act, of the securities so offered and sold.

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We may solicit offers to purchase the securities directly and we may sell the securities directly to institutional or other investors. The terms of these sales, including the terms of any bidding or auction process, if utilized, will be described in the applicable prospectus supplement. We may enter into agreements with agents, underwriters and dealers under which we may agree to indemnify the agents, underwriters and dealers against certain liabilities, including liabilities under the Securities Act, or to contribute to payments they may be required to make with respect to these liabilities. The terms and conditions of this indemnification or contribution will be described in the applicable prospectus

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supplement. Some of the agents, underwriters or dealers, or their affiliates, may be customers of, engage in transactions with or perform services for us in the ordinary course of business.

If the applicable prospectus supplement indicates, we may authorize agents, underwriters or dealers to solicit offers from certain types of institutions to purchase securities at the public offering price under delayed delivery contracts. These contracts would provide for payment and delivery on a specified date in the future. The contracts would be subject only to those conditions described in the prospectus supplement. The applicable prospectus supplement will describe the commissions payable for solicitation of those contracts.

We may from time to time engage a firm to act as our agent for one or more offerings of our securities. We sometimes refer to this agent as our "offering agent." If we reach an agreement with an offering agent with respect to a specific offering, including the number of securities and any minimum price below which sales may not be made, then the offering agent will try to sell such securities on the agreed terms. The offering agent could make sales in privately negotiated transactions or any other method permitted by law, including sales deemed to be an "at the market" offering as defined in Rule 415 promulgated under the Securities Act, including sales made directly on the Nasdaq Capital Market, or sales made to or through a market maker other than on an exchange. The offering agent will be deemed to be an underwriter, as that term is defined in the Securities Act with respect to any sales effected through an "at the market" offering.

Unless indicated in the applicable prospectus supplement, all debt securities, depositary shares, warrants and preferred stock will be new issues of securities with no established trading market. Unless indicated in the applicable prospectus supplement, we do not expect to list the securities on a securities exchange, except for the common stock, which is listed on the Nasdaq Capital Market. Underwriters involved in the public offering and sale of these securities may make a market in the securities. They are not obligated to make a market, however, and may discontinue market making activity at any time. We cannot give any assurance as to the liquidity of the trading market for any of these securities.

In connection with any particular offering pursuant to this shelf registration statement, an underwriter may engage in stabilizing transactions, over-allotment transactions, syndicate covering transactions and penalty bids.

Stabilizing transactions permit bids to purchase the underlying security so long as the stabilizing bids do not exceed a specified maximum price.

Over-allotment involves sales by an underwriter of securities in excess of the number of securities an underwriter is obligated to purchase, which creates a syndicate short position. The short position may be either a covered short position or a naked short position. In a covered short position, the number of securities over-allotted by an underwriter is not greater than the number of securities that it may purchase pursuant to an over-allotment option. In a naked short position the number of securities involved is greater than the number of securities in an over-allotment option. An underwriter may close out any short position by either exercising its over-allotment option and/or purchasing securities in the open market.

Syndicate covering transactions involve purchases of the securities in the open market after the distribution has been completed in order to cover syndicate short positions where there is an over-allotment option. In determining the source of securities to close out the short position, an underwriter will consider, among other things, the price of securities available for purchase in the open market as compared to the price at which they may purchase securities through the over-allotment option. If an underwriter sells more securities than could be covered by the over-allotment option, a naked short position, the position can only be closed out by buying securities in the open market. A naked short position is more likely to be created if an

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underwriter is concerned that there could be downward pressure on the price of the securities in the open market after pricing that could adversely affect investors who purchase in the offering.

Penalty bids permit representatives to reclaim a selling concession from a syndicate member when the securities originally sold by the syndicate member are purchased in a stabilizing or syndicate covering transaction to cover syndicate short positions.

These stabilizing transactions, syndicate covering transactions and penalty bids may have the effect of raising or maintaining the market price of our securities or preventing or retarding a decline in the market price of the securities. As a result, the price of our securities may be higher than the price that might otherwise exist in the open market. These transactions may be effected on the Nasdaq Capital Market or otherwise and, if commenced, may be discontinued at any time.

We, the underwriters or other agents may engage in derivative transactions involving the securities. These derivatives may consist of short sale transactions and other hedging activities. The underwriters or agents may acquire a long or short position in the securities, hold or resell securities acquired and purchase options or futures on the securities and other derivative instruments with returns linked to or related to changes in the price of the securities. In order to facilitate these derivative transactions, we may enter into security lending or repurchase agreements with the underwriters or agents. The underwriters or agents may effect the derivative transactions through sales of the securities to the public, including short sales, or by lending the securities in order to facilitate short sale transactions by others. The underwriters or agents may also use the securities purchased or borrowed from us or others (or, in the case of derivatives, securities received from us in settlement of those derivatives) to directly or indirectly settle sales of the securities or close out any related open borrowings of the securities.

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

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

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

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EXPERTS

The consolidated financial statements of Insmmed Incorporated appearing in Insmmed Incorporated's Annual Report on Form 10-K for the year ended December 31, 2012 and the effectiveness of Insmmed Incorporated's internal control over financial reporting as of December 31, 2012 have been audited by Ernst & Young LLP, independent registered public accounting firm, as set forth in their reports thereon, included therein, and incorporated herein by reference. Such consolidated financial statements and Insmmed Incorporated's management's assessment of the effectiveness of internal control over financial reporting as of December 31, 2012 are incorporated herein by reference in reliance upon such report given on the authority of such firm as experts in accounting and auditing.

VALIDITY OF THE SECURITIES

Certain legal matters, including the legality of the securities offered, will be passed upon for us by Gibson, Dunn & Crutcher, LLP or Hunton & Williams LLP or others named in the applicable prospectus supplement. If the securities are distributed in an underwritten offering, certain legal matters will be passed upon for the underwriters by counsel identified in the applicable prospectus supplement.

WHERE YOU CAN FIND MORE INFORMATION

We file reports, proxy statements and other documents with the SEC. You may read and copy any document we file at the SEC's public reference room at 100 F Street, N.E., Room 1580, Washington, DC 20549. You should call 1-800-SEC-0330 for more information on the operation of the public reference room. You can review our electronically filed reports, proxy and information statements on SEC's web site at www.sec.gov or on our web site at www.insmed.com. Information included on our web site is not a part of this prospectus or any prospectus supplement.

This prospectus is part of a registration statement that we filed with the SEC. The registration statement contains more information than this prospectus regarding us and our common stock, including certain exhibits and schedules. You can obtain a copy of the registration statement from the SEC at the address listed above or from the SEC's Internet site.

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INCORPORATION OF CERTAIN DOCUMENTS BY REFERENCE

The SEC allows us to "incorporate" into this prospectus information that we file with the SEC in other documents. This means that we can disclose important information to you by referring to other documents that contain that information. Any information that we incorporate by reference is considered part of this prospectus. The documents and reports that we list below are incorporated by reference into this prospectus. In addition, all documents and reports which we file pursuant to Section 13(a), 13(c), 14 or 15(d) of the Exchange Act after the date of this prospectus are incorporated by reference in this prospectus as of the respective filing dates of these documents and reports, provided, however, that we are not incorporating by reference any information furnished (but not filed) under Item 2.02 or Item 7.01 of any Current Report on Form 8-K. Statements contained in documents that we file with the SEC and that are incorporated by reference in this prospectus will automatically update and supersede information contained in this prospectus, including information in previously filed documents or reports that have been incorporated by reference in this prospectus, to the extent the new information differs from or is inconsistent with the old information.

We have filed the following documents with the SEC. These documents are incorporated herein by reference as of their respective dates of filing:

- (1) Our Annual Report on Form 10-K for the fiscal year ended December 31, 2012 (including the portions of our Proxy Statement on Schedule 14A, filed on April 29, 2013, incorporated by reference therein) filed with the SEC on March 18, 2013;
- (2) Our Quarterly Report on Form 10-Q for the three months ended March 31, 2013;
- (3) Our Current Reports on Form 8-K filed with the SEC on April 1, 2013, April 30, 2013, and May 1, 2013;
- (4) All of our filings pursuant to the Exchange Act after the date of filing the initial registration statement and prior to the effectiveness of the registration statement; and
- (5) The description of our common stock contained in our Registration Statement on Form 8-A filed on June 1, 2000, including any amendments or reports filed for the purpose of updating that description.

You may request a copy of these documents, which will be provided to you at no cost, by contacting:

Insmmed Incorporated
9 Deer Park Drive, Suite C
Monmouth Junction, NJ 08852
Attention: Andrea Holtzman Drucker, Corporate Secretary
(732) 997-4600

You should rely only on the information contained in this prospectus, including information incorporated by reference as described above, or any prospectus supplement that we have specifically referred you to. We have not authorized anyone else to provide you with different information. You should not assume that the information in this prospectus or any prospectus supplement is accurate as of any date other than the date on the front of those documents or that any document incorporated by reference is accurate as of any date other than its filing date. You should not consider this prospectus to be an offer or solicitation relating to the securities in any jurisdiction in which such an offer or solicitation relating to the securities is not authorized. Furthermore, you should not consider this prospectus to be an offer or solicitation relating to the securities if the person making the offer or solicitation is not qualified to do so, or if it is unlawful for you to receive such an offer or solicitation.

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\$60,000,000

Common Stock

Sole Book-Running Manager

Leerink Swann

Co-Managers

Lazard Capital Markets

Canaccord Genuity
