

MEDICINOVA INC  
Form S-4/A  
November 16, 2009  
Table of Contents

As filed with the Securities and Exchange Commission on November 16, 2009

Registration No. 333-161969

**UNITED STATES**  
**SECURITIES AND EXCHANGE COMMISSION**  
Washington, DC 20549

**Amendment No. 2**  
**to**  
**FORM S-4**  
**REGISTRATION STATEMENT**  
*Under*  
*The Securities Act of 1933*

**MEDICINOVA, INC.**

(Exact name of Registrant as specified in its charter)

<b>Delaware</b> (State or Other Jurisdiction of Incorporation or Organization)	<b>2834</b> (Primary Standard Industrial Classification Code Number) <b>4350 La Jolla Village Drive, Suite 950</b>  <b>San Diego, CA 92122</b>  <b>Tel: (858) 373-1500</b>	<b>33-0927979</b> (I.R.S. Employer Identification No.)
--------------------------------------------------------------------------------------	-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------	--------------------------------------------------------------

(Address, including zip code, and telephone number, including area code, of Registrant's principal executive offices)

**Shintaro Asako**  
  
**Chief Financial Officer**  
  
**MediciNova, Inc.**  
  
**4350 La Jolla Village Drive, Suite 950**  
  
**San Diego, CA 92122**  
  
**Tel: (858) 373-1500**  
  
**Fax: (858) 373-7000**

(Name, address, including zip code, and telephone number, including area code, of agent for service)

*Copies to:*

<b>David E. Schulman</b>  <b>William J. Tuttle</b>  <b>Dechert LLP</b>  <b>1775 I Street, N.W.</b>  <b>Washington, D.C. 20006</b>  <b>Tel: (202) 261-3300</b>	<b>Andrew A. Sauter</b>  <b>Chief Executive Officer, President</b>  <b>and Chief Financial Officer</b>  <b>Avigen, Inc.</b>  <b>1301 Harbor Bay Parkway</b>  <b>Alameda, California 94502</b>	<b>Brett D. White</b>  <b>Jennifer Fonner DiNucci</b>  <b>Cooley Godward Kronish LLP</b>  <b>Five Palo Alto Square</b>  <b>3000 El Camino Real</b>  <b>Palo Alto, CA 94306</b>
---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------	-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------	--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------

Edgar Filing: MEDICINOVA INC - Form S-4/A

Fax: (202) 261-3333

Tel: (510) 748-7150

Tel: (650) 843-5000

Fax: (510) 748-7155

Fax: (650) 849-7400

Approximate date of commencement of proposed sale to the public: As soon as practicable after the effectiveness of this registration statement and the satisfaction or waiver of all other conditions under the merger agreement described herein.

If the securities being registered on this Form are being offered in connection with the formation of a holding company and there is compliance with General Instruction G, check the following box.

If this Form is filed to register additional securities for an offering pursuant to Rule 462(b) under the Securities Act, check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

If this Form is a post-effective amendment filed pursuant to Rule 462(d) under the Securities Act, check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

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

Large accelerated filer

Accelerated filer

Non-accelerated filer  (Do not check if a smaller reporting company)

Smaller reporting company

If applicable, place an X in the box to designate the appropriate rule provision relied upon in conducting this transaction:

Exchange Act Rule 13e-4(i) (Cross-Border Issuer Tender Offer)

Exchange Act Rule 14d-1(d) (Cross-Border Third-Party Tender Offer)

**The Registrant hereby amends this registration statement on such date or dates as may be necessary to delay its effective date until the Registrant shall file a further amendment that specifically states that this registration statement shall thereafter become effective in accordance with Section 8(a) of the Securities Act of 1933, as amended, or until the registration statement shall become effective on such date as the Securities and Exchange Commission, acting pursuant to said Section 8(a), may determine.**

---

**Table of Contents**

**The information in this joint proxy statement/prospectus is not complete and may be changed. We may not issue or sell these securities until the registration statement filed with the Securities and Exchange Commission is effective. This preliminary joint proxy statement/prospectus is not an offer to sell these securities, and we are not soliciting any offer to buy these securities in any jurisdiction where the offer or sale is not permitted.**

**PRELIMINARY- SUBJECT TO COMPLETION-DATED NOVEMBER 16, 2009**

**PROPOSED MERGER YOUR VOTE IS VERY IMPORTANT**

The board of directors of MediciNova, Inc. and Avigen, Inc. each have approved a merger in which the businesses of MediciNova and Avigen will be combined. We are sending this joint proxy statement/prospectus to you to ask you to vote to adopt the Agreement and Plan of Merger by and among MediciNova, Absolute Merger, Inc. and Avigen, dated as of August 20, 2009, or the Merger Agreement, and certain other matters described herein.

The Merger Agreement provides that, upon the terms and subject to the conditions set forth therein, Absolute Merger, Inc., a wholly-owned subsidiary of MediciNova, or Absolute Merger, will merge with and into Avigen, with Avigen continuing as the surviving entity and wholly-owned subsidiary of MediciNova. We refer to this transaction as the Merger.

Under the terms of the Merger Agreement, at the effective time of the Merger, each share of Avigen's common stock, together with the associated preferred stock purchase right, or Avigen common stock, will be cancelled and extinguished and automatically converted into the right to receive:

one of the following:

for each share of Avigen common stock with respect to which an election to receive cash has been made, the right to receive cash equal to the First Payment Consideration (as defined herein) and Second Payment Consideration (as defined herein), if any;

for each share of Avigen common stock for which an election to receive secured convertible notes to be issued by MediciNova, or the Convertible Notes, which will be governed by the indenture by and between MediciNova and American Stock Transfer & Trust Company, LLC, or the Indenture, described under the section of this joint proxy statement/prospectus entitled "Description of Convertible Notes" has been made, the right to receive one Convertible Note with a face value equal to the First Payment Consideration and Second Payment Consideration, if any; or

for each share of Avigen common stock with respect to which no valid election has been made, the right to receive cash equal to 50 percent of the First Payment Consideration and Second Payment Consideration, if any, and Convertible Notes with a face value equal to 50 percent of the First Payment Consideration and Second Payment Consideration, if any; and

one Contingent Payment Right, or a CPR, granting the holder thereof the rights described under the section entitled "Certain Terms of the Merger Agreement and the CPR Agreement Contingent Payment Rights" herein. MediciNova common stock is listed on the NASDAQ Global Market, or Nasdaq, under the symbol "MNOV" and on the Hercules Market of the Osaka Securities Exchange, or the OSE, under the code "4875," and Avigen common stock is listed on Nasdaq under the symbol "AVGN."

**Your vote is very important.** MediciNova and Avigen cannot complete the Merger unless (1) the MediciNova stockholders vote to adopt the Merger Agreement and approve the issuance of the Convertible Notes and (2) the Avigen stockholders vote to adopt the Merger Agreement. **Your failure to vote will have the same effect as a vote against the Merger.**

## Edgar Filing: MEDICINOVA INC - Form S-4/A

MediciNova and Avigen each will hold a special meeting of stockholders to vote on proposals related to the Merger. The special meetings will be held at the dates, times and locations set forth below. Whether or not you plan to attend your company's special meeting, please take the time to submit your proxy either by completing and mailing the enclosed proxy card or using the telephone or Internet voting procedures described on your proxy card as soon as possible. If your shares of MediciNova common stock or Avigen common stock are held in an account with a bank, broker or other nominee, you must instruct your bank, broker or other nominee how to vote those shares.

**Table of Contents**

**For MediciNova stockholders:**

December 17, 2009 at 3:00 p.m. Pacific Standard Time at Northern Trust Tower, 4370 La Jolla Village Drive, Suite 210, San Diego, California 92122.

**The board of directors of MediciNova recommends that MediciNova stockholders vote FOR adoption of the Merger Agreement and approval of the issuance of the Convertible Notes and FOR any adjournment of the MediciNova special meeting, if necessary, to solicit additional proxies.**

This joint proxy statement/prospectus gives you detailed information regarding the special meetings and the Merger. We urge you to read this joint proxy statement/prospectus carefully including Risk Factors beginning on page 22 for a discussion of risks relating to the Merger.

**Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved the Convertible Notes and MediciNova common stock to be issued upon conversion thereof or passed upon the adequacy or accuracy of this joint proxy statement/prospectus. Any representation to the contrary is a criminal offense.**

This joint proxy statement/prospectus is dated November 18, 2009 and is first being mailed to MediciNova stockholders and Avigen stockholders on or about November 19, 2009.

**For Avigen stockholders:**

December 17, 2009 at 3:00 p.m. Pacific Standard Time at 1301 Harbor Bay Parkway, Alameda, California 94502.

**The board of directors of Avigen recommends that Avigen stockholders vote FOR adoption of the Merger Agreement and FOR any adjournment of the Avigen special meeting, if necessary, to solicit additional proxies.**

**Table of Contents**

MEDICINOVA, INC.

4350 La Jolla Village Drive, Suite 950

San Diego, CA 92122 (858) 373-1500

**NOTICE OF SPECIAL MEETING OF STOCKHOLDERS**

**TO BE HELD ON DECEMBER 17, 2009**

Dear MediciNova Stockholder:

On behalf of the board of directors of MediciNova, Inc., a Delaware corporation, we are pleased to deliver this joint proxy statement/prospectus relating to the proposed merger by which MediciNova, Inc. is proposing to acquire Avigen, Inc., a Delaware corporation, pursuant to that certain Agreement and Plan of Merger, dated as of August 20, 2009, among MediciNova, Absolute Merger, Inc., a Delaware corporation and direct wholly-owned subsidiary of MediciNova, and Avigen, Inc. A special meeting of stockholders of MediciNova, Inc. will be held on December 17, 2009 at 3:00 p.m. Pacific Standard Time at Northern Trust Tower, 4370 La Jolla Village Drive, Suite 210, San Diego, California 92122 for the following purposes:

**Proposal No. 1.** To consider and vote upon the adoption of the Merger Agreement and issuance of the Convertible Notes; and

**Proposal No. 2.** To consider and vote upon an adjournment of the MediciNova special meeting, if necessary, if a quorum is present, to solicit additional proxies if there are not sufficient votes in favor of Proposal No. 1.

The MediciNova special meeting will also address such other business as may properly come before the MediciNova special meeting or any adjournment or postponement thereof.

The record date for the determination of stockholders entitled to notice of, and to vote at, the MediciNova special meeting and any adjournment or postponement thereof is October 30, 2009. Only stockholders of record at the close of business on that date are entitled to notice of, and to vote at, the MediciNova special meeting. At the close of business on the record date, MediciNova had outstanding and entitled to vote 12,103,969 shares of common stock.

Your vote is important. The affirmative vote of the holders of a majority of the outstanding shares of MediciNova common stock on the record date for the MediciNova special meeting is required for approval of Proposal No. 1 above. The affirmative vote of the holders of a majority of the votes cast in person or by proxy at the MediciNova special meeting is required to approve Proposal No. 2 above. **THE APPROVAL OF PROPOSAL NO. 1 IS A CONDITION TO THE COMPLETION OF THE MERGER.** Even if you plan to attend the MediciNova special meeting in person, we request that you sign and return the enclosed proxy card or vote by telephone or by using the Internet as instructed on the enclosed proxy card and thus ensure that your shares will be represented at the MediciNova special meeting if you are unable to attend. If you sign, date and mail your proxy card without indicating how you wish to vote, your proxy will be counted as a vote in favor of each of Proposal Nos. 1 and 2 above. If you fail to return your proxy card or vote by telephone or by using the Internet, your shares will not be counted for purposes of determining whether a quorum is present at the MediciNova special meeting, and the effect will be a vote against the adoption of the Merger Agreement and issuance of the Convertible Notes. If you do attend the MediciNova special meeting and wish to vote in person, you may withdraw your proxy and vote in person.

The accompanying joint proxy statement/prospectus describes the Merger and the actions to be taken at the special meeting and provides additional information about the parties involved. Please give this information your careful attention.

**Table of Contents**

**It is important that your shares are represented at the special meeting. Even if you plan to attend the meeting in person, we hope that you will either complete and mail the enclosed proxy card or use the telephone or Internet voting procedures described on your proxy card as soon as possible. This will not limit your right to attend or vote at the meeting.**

By Order of the Board of Directors,

Yuichi Iwaki, M.D., Ph.D.

President, Chief Executive Officer and Director

San Diego, California

November 18, 2009

**THE MEDICINOVA BOARD OF DIRECTORS HAS DETERMINED AND BELIEVES THAT THE MERGER IS ADVISABLE AND FAIR TO, AND IN THE BEST INTERESTS OF, MEDICINOVA AND ITS STOCKHOLDERS, AND RECOMMENDS THAT MEDICINOVA STOCKHOLDERS VOTE FOR PROPOSAL NO. 1 TO ADOPT THE MERGER AGREEMENT AND APPROVE THE ISSUANCE OF THE CONVERTIBLE NOTES. THE MEDICINOVA BOARD OF DIRECTORS ALSO RECOMMENDS THAT MEDICINOVA STOCKHOLDERS VOTE FOR PROPOSAL NO. 2 TO ADJOURN THE SPECIAL MEETING, IF NECESSARY, IF A QUORUM IS PRESENT, TO SOLICIT ADDITIONAL PROXIES IF THERE ARE NOT SUFFICIENT VOTES IN FAVOR OF ADOPTION OF THE MERGER AGREEMENT AND ISSUANCE OF THE CONVERTIBLE NOTES.**



**Table of Contents**

**AVIGEN, INC.**

**1301 Harbor Bay Parkway**

**Alameda, California 94502**

**NOTICE OF SPECIAL MEETING OF STOCKHOLDERS**

**TO BE HELD ON DECEMBER 17, 2009**

Dear Avigen Stockholder:

On behalf of the board of directors of Avigen, Inc., a Delaware corporation, we are pleased to deliver this joint proxy statement/prospectus relating to the proposed merger by which MediciNova, Inc., a Delaware corporation, is proposing to acquire Avigen, Inc. pursuant to that certain Agreement and Plan of Merger, dated as of August 20, 2009, among MediciNova, Absolute Merger, Inc., a Delaware corporation and direct wholly-owned subsidiary of MediciNova, and Avigen, Inc. A special meeting of stockholders of Avigen, Inc. will be held on December 17, 2009 at 3:00 p.m. Pacific Standard Time at 1301 Harbor Bay Parkway, Alameda, California 94502 for the following purposes:

**Proposal No. 1.** To consider and vote upon the adoption of the Merger Agreement; and

**Proposal No. 2.** To consider and vote upon an adjournment of the Avigen special meeting, if necessary, if a quorum is present, to solicit additional proxies if there are not sufficient votes in favor of Proposal No. 1.

The Avigen special meeting will also address such other business as may properly come before the Avigen special meeting or any adjournment or postponement thereof.

The record date for the determination of stockholders entitled to notice of, and to vote at, the Avigen special meeting and any adjournment or postponement thereof is October 30, 2009. Only stockholders of record at the close of business on that date are entitled to notice of, and to vote at, the Avigen special meeting. At the close of business on the record date, Avigen had outstanding and entitled to vote 29,836,365 shares of common stock.

Your vote is important. The affirmative vote of the holders of a majority of the outstanding shares of Avigen common stock on the record date for the Avigen special meeting is required for approval of Proposal No. 1 above. The affirmative vote of the holders of a majority of the votes cast in person or by proxy at the Avigen special meeting is required to approve Proposal No. 2 above. **THE APPROVAL OF PROPOSAL NO. 1 IS A CONDITION TO THE COMPLETION OF THE MERGER.** Even if you plan to attend the Avigen special meeting in person, we request that you sign and return the enclosed proxy card or vote by telephone or by using the Internet as instructed on the enclosed proxy card and thus ensure that your shares will be represented at the Avigen special meeting if you are unable to attend. If you sign, date and mail your proxy card without indicating how you wish to vote, your proxy will be counted as a vote in favor of each of Proposal Nos. 1 and 2 above. If you fail to return your proxy card or vote by telephone or by using the Internet, your shares will not be counted for purposes of determining whether a quorum is present at the Avigen special meeting, and the effect will be a vote against the adoption of the Merger Agreement. If you do attend the Avigen special meeting and wish to vote in person, you may withdraw your proxy and vote in person.

Please do not send any certificates representing your Avigen common stock at this time.

The accompanying joint proxy statement/prospectus describes the Merger and the actions to be taken at the special meeting and provides additional information about the parties involved. Please give this information your careful attention.

**Table of Contents**

**It is important that your shares are represented at the special meeting. Even if you plan to attend the meeting in person, we hope that you will either complete and mail the enclosed proxy card or use the telephone or Internet voting procedures described on your proxy card as soon as possible. This will not limit your right to attend or vote at the meeting.**

By Order of the Board of Directors

Sincerely,

ANDREW SAUTER

*President and Chief Executive Officer*

Alameda, California

November 18, 2009

**THE AVIGEN BOARD OF DIRECTORS HAS DETERMINED THAT THE MERGER AGREEMENT AND THE MERGER ARE ADVISABLE, FAIR TO AND IN THE BEST INTERESTS OF AVIGEN AND ITS STOCKHOLDERS, AND RECOMMENDS THAT AVIGEN STOCKHOLDERS VOTE FOR PROPOSAL NO. 1 TO ADOPT THE MERGER AGREEMENT. THE AVIGEN BOARD OF DIRECTORS ALSO RECOMMENDS THAT AVIGEN STOCKHOLDERS VOTE FOR PROPOSAL NO. 2 TO ADJOURN THE SPECIAL MEETING, IF NECESSARY, IF A QUORUM IS PRESENT, TO SOLICIT ADDITIONAL PROXIES IF THERE ARE NOT SUFFICIENT VOTES IN FAVOR OF ADOPTION OF THE MERGER AGREEMENT.**

**Table of Contents**

**ADDITIONAL INFORMATION**

This joint proxy statement/prospectus incorporates important business and financial information about MediciNova, Inc. and Avigen, Inc. from documents filed with the Securities and Exchange Commission, or the SEC, that are not included in or delivered with this joint proxy statement/prospectus.

MediciNova will provide you with copies of this information relating to it, without charge, upon written or oral request to:

MediciNova, Inc.

4350 La Jolla Village Drive, Suite 950

San Diego, CA 92122

Tel: (858) 373-1500

Avigen will provide you with copies of this information relating to it, without charge, upon written or oral request to:

Avigen, Inc.

1301 Harbor Bay Parkway

Alameda, California 94502

Tel: (510) 748-7150

**In order to receive timely delivery of the documents in advance of your stockholder meeting, you must request this information no later than December 8, 2009.**

You may also obtain these documents at the SEC's website, [www.sec.gov](http://www.sec.gov), and you may obtain certain of these documents at MediciNova's website, [www.medicinova.com](http://www.medicinova.com), by going to the Investor Relations section and at Avigen's website, [www.avigen.com](http://www.avigen.com), by going to the Investors section.

**You should rely only on the information contained in this joint proxy statement/prospectus to vote on the matters set forth herein. No one has been authorized to provide you with information that is different from that contained in this joint proxy statement/prospectus. This joint proxy statement/prospectus is dated November 18, 2009. You should not assume that the information contained in this joint proxy statement/prospectus is accurate as of any date other than that date. Neither the mailing of this joint proxy statement/prospectus to MediciNova stockholders or Avigen stockholders nor the issuance by MediciNova of Convertible Notes in connection with the Merger will create any implication to the contrary.**

**This joint proxy statement/prospectus does not constitute an offer to sell, or a solicitation of an offer to buy, any securities, or the solicitation of a proxy, in any jurisdiction to or from any person to whom it is unlawful to make any such offer or solicitation in such jurisdiction. Information contained in this joint proxy statement/prospectus regarding MediciNova has been provided by MediciNova, and information contained in this joint proxy statement/prospectus regarding Avigen has been provided by Avigen.**

**Table of Contents****TABLE OF CONTENTS**

	<b>Page</b>
<u>QUESTIONS AND ANSWERS ABOUT THE MERGER</u>	1
<u>SUMMARY</u>	6
<u>SELECTED HISTORICAL AND UNAUDITED PRO FORMA CONDENSED COMBINED FINANCIAL DATA</u>	17
<u>RISK FACTORS</u>	22
<u>FORWARD-LOOKING STATEMENTS</u>	63
<u>THE SPECIAL MEETING OF MEDICINOVA STOCKHOLDERS</u>	64
<u>THE SPECIAL MEETING OF AVIGEN STOCKHOLDERS</u>	67
<u>THE MERGER</u>	70
<u>CERTAIN TERMS OF THE MERGER AGREEMENT AND THE CPR AGREEMENT</u>	101
<u>MEDICINOVA S BUSINESS</u>	120
<u>AVIGEN S BUSINESS</u>	149
<u>MEDICINOVA S MANAGEMENT S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATION</u>	157
<u>MEDICINOVA S QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK</u>	172
<u>AVIGEN S MANAGEMENT S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATION</u>	173
<u>AVIGEN S QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK</u>	189
<u>MEDICINOVA MANAGEMENT</u>	190
<u>CORPORATE GOVERNANCE</u>	195
<u>COMPENSATION DISCUSSION AND ANALYSIS</u>	196
<u>CERTAIN RELATIONSHIPS AND RELATED TRANSACTIONS</u>	207
<u>MEDICINOVA SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT</u>	208
<u>AVIGEN SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT</u>	210
<u>MARKET PRICES AND DIVIDENDS ON COMMON STOCK AND RELATED STOCKHOLDER MATTERS</u>	212
<u>MATERIAL U.S. FEDERAL INCOME TAX CONSEQUENCES OF THE MERGER</u>	215
<u>UNAUDITED PRO FORMA CONDENSED COMBINED FINANCIAL STATEMENTS</u>	221
<u>DESCRIPTION OF COMMON STOCK</u>	230
<u>DESCRIPTION OF CONVERTIBLE NOTES</u>	233
<u>COMPARISON OF STOCKHOLDER RIGHTS AND CORPORATE GOVERNANCE MATTERS</u>	240
<u>LEGAL MATTERS</u>	245
<u>EXPERTS</u>	245
<u>WHERE YOU CAN FIND MORE INFORMATION</u>	245
<u>INDEX TO MEDICINOVA S CONSOLIDATED FINANCIAL STATEMENTS</u>	FI-1
<u>INDEX TO AVIGEN S FINANCIAL STATEMENTS</u>	FI-40
<u>ANNEX A - AGREEMENT AND PLAN OF MERGER</u>	A-1
<u>ANNEX B - CONTINGENT PAYMENT RIGHTS AGREEMENT</u>	B-1
<u>ANNEX C - INDENTURE</u>	C-1
<u>ANNEX D - TRUST AGREEMENT</u>	D-1
<u>ANNEX E - ESCROW AGREEMENT</u>	E-1
<u>ANNEX F - FORM OF OPINION OF LADENBURG THALMANN &amp; CO. INC</u>	F-1
<u>ANNEX G - FORM OF OPINION OF RBC CAPITAL MARKETS CORPORATION</u>	G-1
<u>ANNEX H - COPY OF SECTION 262 OF THE DELAWARE GENERAL CORPORATION LAW</u>	H-1

---

**Table of Contents**

**QUESTIONS AND ANSWERS ABOUT THE MERGER**

*The following are some questions that you, as a stockholder of MediciNova or Avigen, may have regarding the Merger, and the answers to those questions. You are urged to read carefully this joint proxy statement/prospectus and the other documents referred to in this joint proxy statement/prospectus in their entirety because the information in this section does not provide all of the information that might be important to you with respect to the Merger and the other matters being considered at the special meetings. Additional important information is contained in the annexes to this joint proxy statement/prospectus.*

**Q: Why am I receiving this joint proxy statement/prospectus?**

A: You are receiving this joint proxy statement/prospectus because you were a stockholder of record of MediciNova or Avigen as of the close of business on October 30, 2009, the record date for the MediciNova special meeting, or October 30, 2009, the record date for the Avigen special meeting. MediciNova and Avigen are sending this joint proxy statement/prospectus and the form of proxy card to solicit your proxy to vote upon certain matters at their respective special meetings.

**Q: What is the Merger?**

A: MediciNova and Avigen have agreed to the Merger, pursuant to which Avigen will become a wholly-owned subsidiary of MediciNova. Under the terms of the Merger Agreement, which has been approved by both companies' boards of directors, Avigen stockholders will have the right to elect to receive an amount currently estimated at approximately \$1.24 per share in either cash or Convertible Notes to be issued by MediciNova. Approximately \$1.19 of this consideration will be paid at the closing, and approximately \$0.05 will be paid at June 30, 2010. As set forth in the Merger Agreement and described herein, both payments are subject to certain potential adjustments. See Certain Terms of the Merger Agreement Merger Agreement First Payment Consideration and Certain Terms of the Merger Agreement Merger Agreement Second Payment Consideration. In addition, Avigen's stockholders will be entitled to one CPR for each share of Avigen common stock, which will entitle holders under certain circumstances to the payments described under Certain Terms of the Merger Agreement and the CPR Agreement Contingent Payment Rights CPR Payments.

**Q: What matters will be considered at the special meetings?**

A: At the MediciNova special meeting, MediciNova stockholders will be asked to vote to adopt the Merger Agreement and approve the issuance of the Convertible Notes. At the Avigen special meeting, Avigen stockholders will be asked to vote to adopt the Merger Agreement.

**Q: What are the recommendations of the boards of directors of MediciNova and Avigen?**

A: MediciNova's board of directors recommends that you vote **FOR** the adoption of the Merger Agreement and approval of the issuance of the Convertible Notes. Avigen's board of directors recommends that you vote **FOR** the adoption of the Merger Agreement.

**Q: Why is this a joint proxy statement/proxy?**

A: MediciNova and Avigen are delivering this joint proxy statement/prospectus to you as both a proxy statement of MediciNova and Avigen and a prospectus of MediciNova. It is a proxy statement of MediciNova because MediciNova's board of directors is soliciting proxies from MediciNova stockholders to vote on the adoption of the Merger Agreement and issuance of the Convertible Notes, and such proxies will

## Edgar Filing: MEDICINOVA INC - Form S-4/A

be used at the meeting or at any adjournment or postponement thereof. It is a proxy statement of Avigen because Avigen's board of directors is soliciting proxies from Avigen stockholders to vote on the adoption

**Table of Contents**

of the Merger Agreement, and such proxies will be used at the meeting or at any adjournment or postponement thereof. It is a prospectus of MediciNova because MediciNova is offering Convertible Notes to certain Avigen stockholders as part of the Merger.

**Q: What is a proxy, and who is paying the costs to prepare this joint proxy statement/prospectus and solicit my proxy?**

A: A proxy is your legal designation of another person to vote your shares of common stock. The document that designates someone as your proxy is also called a proxy or a proxy card.

MediciNova will pay all expenses of this solicitation as it pertains to MediciNova stockholders, including the cost of preparing and mailing this joint proxy statement/prospectus and the form of proxy card, and Avigen will pay all expenses of this solicitation as it pertains to Avigen stockholders, including the cost of preparing and mailing this joint proxy statement/prospectus and the form of proxy card.

**Q: When do MediciNova and Avigen need to receive my proxy in order for my vote to count?**

A: MediciNova and Avigen must receive your proxy the business day before their respective special meetings in order for your proxy to be voted at the applicable special meeting.

**Q: What approval of each of MediciNova's and Avigen's stockholders is required to consummate the Merger?**

A: The Merger Agreement must be adopted by the holders of a majority of the outstanding shares of MediciNova common stock and a majority of the outstanding shares of Avigen common stock. Failure to vote or abstention from voting will have the same effect as a vote **AGAINST** the matters submitted for consideration at the special meetings.

**Q: How will abstentions be counted?**

A: Abstentions are counted as present and entitled to vote for purposes of determining a quorum. Abstentions have the same effect as a vote **AGAINST** adoption of the Merger Agreement and the issuance of the Convertible Notes.

**Q: What do I need to do now in order to vote?**

A: After you have read this joint proxy statement/prospectus carefully, please respond as soon as possible so that your shares will be represented and voted at the appropriate special meeting by completing, signing and dating your proxy card or voting instruction card and returning it in the postage-paid envelope or voting by telephone or Internet as instructed on the proxy card or voting instruction card.

**Q: How do I vote my shares if my shares are held in street name by my broker?**

A: You should contact your broker or bank who holds your shares in street name. Your broker or bank can give you directions on how to instruct such broker or bank to vote your shares. Your broker or bank will not vote your shares unless the broker or bank receives appropriate instructions from you. Thus, if you do not give your broker or nominee specific instructions on how to vote for you or do not vote for yourself in accordance with the voting instructions on the proxy card being forwarded to you, your shares will be treated as present for the purposes of a quorum but will have the effect of a vote **AGAINST** such proposal. You should provide your broker or bank

## Edgar Filing: MEDICINOVA INC - Form S-4/A

with instructions as to how to vote your shares. You cannot vote shares held in street name by returning a proxy card to MediciNova or Avigen. In addition, if you are an Avigen stockholder, when you receive a form of election, you should follow your broker's or bank's instructions for making an election with respect to your shares of Avigen common stock.



**Table of Contents**

**Q: When and where are the stockholder meetings and who may attend?**

A: The MediciNova special meeting will take place at 3:00 p.m. Pacific Standard Time on December 17, 2009. The location of the MediciNova special meeting is the Northern Trust Tower, 4370 La Jolla Village Drive, Suite 210, San Diego, California 92122. Only MediciNova stockholders, their proxy holders and MediciNova's invited guests may attend the meeting.

The Avigen special meeting will take place at 3:00 p.m. Pacific Standard Time on December 17, 2009. The location of the Avigen special meeting is 1301 Harbor Bay Parkway, Alameda, California 94502. Only Avigen stockholders, their proxy holders and Avigen's invited guests may attend the meeting.

**Q: Who is entitled to vote at the special meetings?**

A: Only holders of shares of MediciNova common stock as of the record date for the MediciNova special meeting, which is October 30, 2009, are entitled to vote at the MediciNova special meeting, and only holders of shares of Avigen common stock as of the record date for the Avigen special meeting, which is October 30, 2009, are entitled to vote at the Avigen special meeting.

**Q: How many votes do I have, and can I cumulate my vote?**

A: You have one vote at the MediciNova special meeting for each share of MediciNova common stock that you held as of the record date for the MediciNova special meeting and one vote at the Avigen special meeting for each share of Avigen common stock that you held as of the record date for the Avigen special meeting. Cumulative voting is not allowed. As of the record date for the MediciNova special meeting, there were 12,103,969 shares of MediciNova common stock outstanding, and, as of the record date for the Avigen special meeting, there were 29,836,365 shares of Avigen common stock outstanding.

**Q: What constitutes a quorum for the special meetings?**

A: A majority of the outstanding shares having voting power being present in person or represented by proxy constitutes a quorum for each of the special meetings.

**Q: Who will constitute the management and board of directors of the combined company?**

A: The management and board of directors of the combined company will consist of the management and board of directors of MediciNova immediately prior to the Merger. The board of directors of the combined company is expected to be comprised of the following seven individuals: Jeff Himawan, Ph.D.; Alan W. Dunton, M.D.; Yuichi Iwaki, M.D., Ph.D.; Arlene Morris; Hideki Nagao; John K.A. Prendergast, Ph.D. and Hiroaki Shigeta. The senior management team of the combined company is expected to be comprised of: Yuichi Iwaki, M.D., Ph.D.; Shintaro Asako, CPA; and Masatsune Okajima.

**Q: Are there risks associated with the Merger that I should consider in deciding how to vote?**

A: Yes. There are a number of risks related to the Merger, the Convertible Notes, MediciNova and Avigen that are discussed in this joint proxy statement/prospectus. Please read with particular care the detailed description of the risks associated with the Merger beginning on page 22.

**Q: When do you currently expect to complete the Merger?**

A: MediciNova and Avigen currently expect to complete the Merger in the fourth quarter of 2009. However, MediciNova and Avigen cannot assure you when or if the Merger will occur. The companies must obtain the approval of MediciNova stockholders and Avigen stockholders at the special meetings and satisfy the closing conditions set forth in the Merger Agreement before the Merger can be completed.

**Table of Contents**

**Q: If I am an Avigen stockholder, when must I elect the type of merger consideration that I prefer to receive?**

A: Avigen stockholders who wish to elect the type of merger consideration they prefer to receive in the Merger should carefully review and follow the instructions set forth in the form of election that will be provided to Avigen stockholders together with this joint proxy statement/prospectus. The election deadline is 5:00 p.m. New York City time on the date of the Avigen special meeting. If an Avigen stockholder does not submit a properly completed and signed form of election to the exchange agent by the election deadline, such stockholder will receive 50 percent of the merger consideration in cash and 50 percent in Convertible Notes.

**Q: If I am an Avigen stockholder, should I send in my Avigen stock certificates now?**

A: No. After completion of the Merger, MediciNova will send you instructions for exchanging your Avigen stock certificates for the merger consideration.

**Q: Are Avigen stockholders entitled to seek appraisal rights if they do not vote in favor of the adoption of the Merger Agreement?**

A: Yes. Under Delaware law, record holders of Avigen common stock who do not vote in favor of the adoption of the Merger Agreement will be entitled to seek appraisal rights in connection with the Merger, and if the Merger is completed, obtain payment in cash of the fair value of their shares of Avigen common stock as determined by the Delaware Chancery Court, instead of the merger consideration. To exercise your appraisal rights, you must strictly follow the procedures prescribed by Delaware law and included as Annex H hereto. Failure to strictly comply with these provisions will result in a loss of the right of appraisal.

**Q: What if I want to change my vote after I have delivered my proxy card or voted by telephone or Internet?**

A: You may change your vote at any time before your proxy is voted at the applicable special meeting. If you are the record holder of your shares, you can do this in any of the three following ways:

by sending a written revocation to the secretary of MediciNova or Avigen, as appropriate, in time to be received before the appropriate special meeting stating that you would like to revoke your proxy;

by properly completing another proxy card that is dated later than the original proxy and returning it in time to be received before the appropriate special meeting;

by providing proxy instructions via telephone or the Internet at a later date (a stockholder's latest telephone or Internet proxy is counted); or

by voting in person at the appropriate special meeting if your shares of MediciNova common stock or Avigen common stock are registered in your name rather than in the name of a broker or bank.

If your shares are held in street name, you should contact your broker or bank to give it instructions to change your vote.

**Will my vote be confidential?**

## Edgar Filing: MEDICINOVA INC - Form S-4/A

Yes. MediciNova and Avigen will continue their practice of keeping the votes of all stockholders confidential. Stockholder votes will not be disclosed to MediciNova's or Avigen's directors, officers, employees or agents, except:

as necessary to meet applicable legal requirements;

in a dispute regarding authenticity of proxies and ballots;

**Table of Contents**

in the case of a contested proxy solicitation, if the other party soliciting proxies does not agree to comply with the confidential voting policy; or

when a stockholder makes a written comment on the proxy card or otherwise communicates the vote to management.

**Q: Where is MediciNova's common stock traded?**

A: MediciNova's common stock is traded and quoted on Nasdaq under the symbol MNOV and on the Hercules Market of the OSE under the code 4875.

**Q: Where is Avigen's common stock traded?**

A: Avigen's common stock is traded and quoted on Nasdaq under the symbol AVGN.

**Q: Who can I call with questions about the special meetings or the Merger?**

A: If you are a MediciNova stockholder and you have questions about the Merger or the MediciNova special meeting or you need additional copies of this joint proxy statement/prospectus, or if you have questions about the process for voting or if you need a replacement proxy card, you should contact:

Advantage Proxy  
24925 13<sup>th</sup> Place South  
Des Moines, Washington 98198  
(206) 870-8565

If you are an Avigen stockholder and you have questions about the Merger or the Avigen special meeting or you need additional copies of this joint proxy statement/prospectus, or if you have questions about the process for voting or if you need a replacement proxy card, you should contact:

Investor Relations  
Avigen, Inc.  
1301 Harbor Bay Parkway  
Alameda, California 94502  
(510) 748-7150

**Q: Where can I find more information about the companies?**

A: You can find more information about MediciNova and Avigen in this joint proxy statement/prospectus and from the various sources described under Where You Can Find More Information.

## **Table of Contents**

### **SUMMARY**

*This summary highlights the material terms of the Merger and other material information contained or incorporated by reference in this joint proxy statement/prospectus. You should read carefully this entire joint proxy statement/prospectus and the documents referred to in this joint proxy statement/prospectus for a more complete description of the terms of the Merger and related agreements. The Merger Agreement is attached as Annex A and the forms of CPR Agreement and Indenture are attached as Annexes B and C, respectively, to this joint proxy statement/prospectus. You are encouraged to read the Merger Agreement as it is the legal document that governs the Merger, as well as these additional documents attached as Annexes hereto. In this joint proxy statement/prospectus, unless the context otherwise requires, MediciNova refers to MediciNova, Inc. and its subsidiaries, Avigen refers to Avigen, Inc. and Absolute Merger refers to Absolute Merger, Inc., a wholly-owned subsidiary of MediciNova.*

#### **The Companies**

##### **MediciNova, Inc.**

MediciNova is a biopharmaceutical company focused on acquiring and developing novel, small molecule therapeutics for the treatment of diseases with unmet medical need with a specific focus on the U.S. market. Through strategic alliances, primarily with Japanese pharmaceutical companies, MediciNova holds rights to a diversified portfolio of clinical and preclinical product candidates, each of which MediciNova believes has a well-characterized and differentiated therapeutic profile, attractive commercial potential and patent assets having claims of commercially adequate scope.

MediciNova was incorporated under the laws of the State of Delaware in September 2000. MediciNova's principal executive offices are located at 4350 La Jolla Village Drive, Suite 950, San Diego, California 92122. MediciNova's telephone number is (858) 373-1500.

##### **Absolute Merger, Inc.**

Absolute Merger is a Delaware corporation and a wholly-owned subsidiary of MediciNova incorporated on August 17, 2009. Absolute Merger does not engage in any operations and exists solely to facilitate the Merger. Absolute Merger's principal executive offices are located at 4350 La Jolla Village Drive, Suite 950, San Diego, California 92122. Absolute Merger's telephone number is (858) 373-1500.

##### **Avigen, Inc.**

Avigen is a biopharmaceutical company that has focused on identifying and developing differentiated products to treat patients with serious disorders. Avigen's strategy was to conceive or acquire and develop opportunities that represent a positive return to Avigen stockholders. The company's current potential product is AV411, a glial attenuator, for neuropathic pain and opioid withdrawal and methamphetamine addiction.

Avigen was incorporated under the laws of the State of Delaware in October 1992. Avigen's principal executive offices are located at 1301 Harbor Bay Parkway, Alameda, California 94502. Avigen's telephone number is (510) 748-7150.

##### **Ibudilast**

Ibudilast is an orally available, small molecule therapeutic that has been in clinical development by MediciNova for the treatment of multiple sclerosis, or MS (MN-166), and by Avigen for the treatment of neuropathic pain and opioid withdrawal and drug addiction (AV411). Following completion of the Merger, MediciNova intends to integrate the two ibudilast-based product development programs and pursue discussions with potential partners to secure a strategic collaboration to advance the clinical development of the combined development programs.

## **Table of Contents**

### **Special Meeting of MediciNova Stockholders**

*Date, Time and Place.* The special meeting of MediciNova stockholders will be held on December 17, 2009, at 3:00 p.m. Pacific Standard Time at Northern Trust Tower, 4370 La Jolla Village Drive, Suite 210, San Diego, California 92122. At the special meeting, MediciNova stockholders will be asked to consider the proposal to adopt the Merger Agreement and approve the issuance of the Convertible Notes and the adjournment and postponement of the special meeting to a later date or time, if necessary or appropriate, to solicit additional proxies in the event there are insufficient votes at the time of the special meeting to adopt the Merger Agreement and approve the issuance of the Convertible Notes. The MediciNova special meeting also will address such other business as may properly come before the MediciNova special meeting or any adjournment or postponement thereof.

*Record Date.* Only MediciNova stockholders of record at the close of business on October 30, 2009 will be entitled to vote at the special meeting. Each share of MediciNova common stock is entitled to one vote. As of the record date, there were 12,103,969 shares of MediciNova common stock outstanding and entitled to vote at the special meeting.

*Vote Required for Approval.* To adopt the Merger Agreement and approve the issuance of the Convertible Notes, the holders of a majority of the outstanding shares of MediciNova common stock entitled to vote must vote in favor of the adoption of the Merger Agreement and approve the issuance of the Convertible Notes. Because adoption of the Merger Agreement and approval of the issuance of the Convertible Notes requires the affirmative vote of a majority of shares outstanding, a MediciNova stockholder's failure to vote or abstention from voting will have the same effect as a vote against approval of the issuance of the Convertible Notes.

To approve the proposal to adjourn or postpone the special meeting, if necessary or appropriate, a majority of the shares of MediciNova common stock present in person or represented by proxy at the special meeting and entitled to vote must vote in favor of such proposal. A MediciNova stockholder's failure to vote or abstention from voting will have no effect on the proposal for possible adjournment or postponement of the special meeting.

*Share Ownership by Management.* As of the record date, the directors and executive officers of MediciNova beneficially owned in the aggregate approximately 15.3 percent of the outstanding shares of MediciNova common stock entitled to vote at the special meeting.

### **Recommendation to MediciNova's Stockholders**

MediciNova's board of directors has approved and adopted the Merger Agreement and approved the issuance of the Convertible Notes. The board of directors of MediciNova recommends that MediciNova stockholders vote **FOR** adoption of the Merger Agreement and the issuance of the Convertible Notes and **FOR** the approval of the proposal to adjourn or postpone the special meeting, if necessary or appropriate, to solicit additional proxies if there are not sufficient votes in favor of the adoption of the Merger Agreement and approval of the issuance of the Convertible Notes at the time of the special meeting.

### **Special Meeting of Avigen Stockholders**

*Date, Time and Place.* The special meeting of Avigen stockholders will be held on December 17, 2009, at 3:00 p.m. Pacific Standard Time at 1301 Harbor Bay Parkway, Alameda, California 94502. At the special meeting, Avigen stockholders will be asked to consider the proposal to adopt the Merger Agreement and the adjournment and postponement of the special meeting to a later date or time, if necessary or appropriate, to solicit additional proxies in the event there are insufficient votes at the time of the special meeting to adopt the Merger Agreement. The Avigen special meeting also will address such other business as may properly come before the Avigen special meeting or any adjournment or postponement thereof.

## **Table of Contents**

*Record Date.* Only Avigen stockholders of record at the close of business on October 30, 2009 will be entitled to vote at the special meeting. Each share of Avigen common stock is entitled to one vote. As of the record date, there were 29,836,365 shares of Avigen common stock outstanding and entitled to vote at the special meeting.

*Vote Required for Approval.* To adopt the Merger Agreement, the holders of a majority of the outstanding shares of Avigen common stock entitled to vote must vote in favor of the adoption of the Merger Agreement. Because adoption of the Merger Agreement requires the affirmative vote of a majority of shares outstanding, an Avigen stockholder's failure to vote or abstention from voting will have the same effect as a vote against adoption of the Merger Agreement.

To approve the proposal to adjourn or postpone the special meeting, if necessary or appropriate, a majority of the shares of Avigen common stock present in person or represented by proxy at the special meeting and entitled to vote must vote in favor of such proposal. An Avigen stockholder's failure to vote or abstention from voting will have no effect on the proposal for possible adjournment or postponement of the special meeting.

*Share Ownership by Management.* As of the record date, the directors and executive officers of Avigen beneficially owned in the aggregate less than one percent of the outstanding shares of Avigen common stock entitled to vote at the special meeting.

### **Recommendation to Avigen's Stockholders**

Avigen's board of directors has approved and adopted the Merger Agreement and approved the Merger. The board of directors of Avigen recommends that Avigen's stockholders vote **FOR** the adoption of the Merger Agreement and **FOR** the approval of the proposal to adjourn or postpone the special meeting, if necessary or appropriate, to solicit additional proxies if there are not sufficient votes in favor of the adoption of the Merger Agreement.

### **The Merger**

At the effective time of the Merger, MediciNova's wholly-owned subsidiary, Absolute Merger, will be merged with and into Avigen, with Avigen continuing as the surviving corporation. Upon completion of the Merger, the directors and officers of Absolute Merger immediately prior to the Merger will become the directors and officers of the surviving corporation.

Under the terms of the Merger Agreement, at the effective time of the Merger, each share of Avigen common stock (and the associated preferred stock purchase right) will be cancelled and extinguished and automatically converted into the right to receive:

one of the following:

for each share of Avigen common stock with respect to which an election to receive cash has been made, the right to receive cash equal to the First Payment Consideration and Second Payment Consideration, if any;

for each share of Avigen common stock for which an election to receive Convertible Notes has been made, the right to receive one Convertible Note with a face value equal to the First Payment Consideration and Second Payment Consideration, if any;

for each share of Avigen common stock with respect to which no valid election has been made, the right to receive cash equal to 50 percent of the First Payment Consideration and Second Payment Consideration, if any, and Convertible Notes with a face value equal to 50 percent of the First Payment Consideration and Second Payment Consideration, if any; and





---

**Table of Contents**

one CPR granting the holder thereof the rights described under the section entitled "Contingent Payment Rights" below. As used in this joint proxy statement/prospectus, the term "Merger Consideration" refers to either (1) the combination of Convertible Notes and one CPR, (2) the combination of cash and one CPR or (3) the combination of cash and Convertible Notes and one CPR.

All of the unexercised and outstanding stock options under Avigen's existing equity compensation plans will be cancelled at or prior to the effective time of the Merger and holders will cease to have any rights with respect to such options.

Effective as of immediately prior to the effective time of the Merger, the existing warrant issued by Avigen to University License Equity Holdings, Inc., an affiliate of the University of Colorado, to acquire 15,000 shares of Avigen common stock will be converted into a new warrant entitling its holder to receive, in lieu of the shares of Avigen common stock theretofore issuable upon exercise or conversion of the existing warrant, the Merger Consideration that would have been receivable upon the Merger by the holder of the existing warrant if it had been exercised, and a cash election had been made, immediately prior to the effective time of the Merger.

**First Payment Consideration**

The First Payment Consideration is equal to \$35,461,000 divided by the number of shares of Avigen's common stock outstanding immediately prior to the effective time of the Merger. This aggregate First Payment Consideration is subject to downward adjustment (on a dollar for dollar basis) in the event that the aggregate cash liquidation proceeds of the marketable securities and restricted investments held by Avigen as of June 30, 2009 are less than \$27,721,000. In the event that, prior to the effective time of the Merger, Avigen sells or otherwise disposes of its rights to the first milestone payment under its assignment agreement with Genzyme Corporation, or the Genzyme Agreement, the aggregate First Payment Consideration will be increased by the amount received by Avigen pursuant to such transaction. In addition, in the event that, prior to the effective time of the Merger, Avigen sells or otherwise disposes of all of its rights under the Genzyme Agreement, the aggregate First Payment Consideration will be increased by the amount received by Avigen pursuant to such transaction less 50 percent of all amounts in excess of \$6,000,000.

**Second Payment Consideration**

The Second Payment Consideration is equal to \$1,500,000 divided by the number of shares of Avigen's common stock outstanding immediately prior to the effective time of the Merger, or approximately \$0.05 per share of Avigen common stock, subject to certain adjustments described more fully below. The aggregate Second Payment Consideration is subject to upward adjustment based on savings in estimated expenses through closing and receipt of certain payments post-closing as well as downward adjustment in the event that actual closing liabilities exceed estimated liabilities through closing. For example, to the extent salaries paid by Avigen from June 30, 2009 to Closing exceed \$298,530, the aggregate Second Payment Consideration would be reduced by such excess. The Second Payment Consideration will be equal to the amount remaining in the escrow account described herein following satisfaction of the demand amount, as adjusted by the selected amount divided by the number of shares of Avigen's common stock outstanding immediately prior to the effective time of the Merger.

Under the terms of an escrow agreement to be entered into at the time of completion of the Merger (which is included as Annex E hereto), Avigen will deposit in an escrow account \$1,500,000, or approximately \$0.05 per share of Avigen common stock, plus the amount by which the aggregate cash liquidation proceeds of its marketable securities and restricted investments held as of June 30, 2009 exceed \$28,021,000. After closing, MediciNova also will deposit into the escrow account certain payments, including royalties pursuant to an agreement between Avigen and Advanced Cell Technology, Inc., if any, received during the escrow period and

---

**Table of Contents**

excess cash amounts collected from subtenants at Avigen's current headquarters, to the extent such payments exceed specified amounts agreed upon by the parties.

On or prior to June 30, 2010, MediciNova will be entitled to submit one demand certificate to claim all or a portion of the funds in the escrow account, or the demand amount, with respect to certain additional liabilities of Avigen related to its business activities and operations prior to the effective time of the Merger, including any amounts paid to current or former directors and officers of Avigen in connection with releases delivered by such individuals under the Merger Agreement, liabilities in excess of specified amounts agreed upon by the parties and the expenses of the representative of the Avigen stockholders incurred in connection with the Merger Agreement and the Contingent Payment Rights Agreement, or the CPR Agreement. Upon delivery of MediciNova's demand certificate, amounts in the escrow account that are not being demanded in satisfaction of additional liabilities will be released to Avigen's former stockholders on a pro rata basis. A stockholder representative will be entitled to dispute the demand amount, and an independent accounting firm will resolve any unresolved dispute between MediciNova and the stockholder representative with respect to the demand amount. Prior to resolution of any dispute regarding the demand amount, all amounts set forth in the demand certificate that are not being contested by the stockholder representative will be released to MediciNova.

Following resolution of the dispute regarding the demand amount, which requires the independent accounting firm to select either the amount demanded by MediciNova or the amount of such demand as adjusted by the amounts contested by the stockholder representative as the numerical amount it believes is the accurate amount of additional liabilities, or the selected amount, MediciNova will receive an amount reflecting any adjustments resulting from the selected amount. Any remaining amounts in the escrow account then will be released to Avigen's former stockholders on a pro rata basis.

**Contingent Payment Rights**

Immediately prior to the closing of the Merger, MediciNova, Avigen and American Stock Transfer & Trust Company, LLC, as rights agent, will enter into the CPR Agreement. MediciNova will issue Avigen stockholders one CPR for each share of Avigen common stock held immediately prior to the effective time of the Merger.

The CPR Agreement provides for the payment of the following amounts, each a CPR payment event, on a pro rata basis:

if the first milestone payment under Avigen's agreement with Genzyme Corporation, or the Genzyme Agreement, is received within 20 months of effective time of the Merger, \$6,000,000 or such lesser cash amount paid by Genzyme;

if the first milestone payment has not occurred and the Parkinson's Product, as defined in the Genzyme Agreement, is sold or otherwise disposed of by MediciNova within 20 months of the effective time of the Merger, 50 percent of the net proceeds of such sale or disposition received within such 20-month period; and

if the trust established pursuant to Avigen's management transition plan is terminated, the amount remaining in such trust upon termination (less any payments required to be made under Avigen's management transition plan trust agreement), such amount currently estimated at \$550,000.

All payments will be made on a pro rata basis. In each case, the payments will be net of any related taxes and out-of-pocket costs, damages, fines, penalties and expenses incurred by MediciNova. For a description of the events that trigger Genzyme's election to either pay the milestone or revert the rights to the Parkinson's disease product candidate, see Certain Terms of the Merger Agreement and the CPR Agreement Genzyme Agreement beginning on page 118 of this joint proxy statement/prospectus.

---

**Table of Contents**

**Convertible Notes**

At the completion of the Merger, MediciNova and American Stock Transfer & Trust Company, LLC, trustee, will enter into the Indenture. Under the terms of a trust agreement by and between MediciNova, American Stock Transfer & Trust Company, LLC, as trust agent and securities intermediary, and American Stock Transfer & Trust Company, LLC, acting in the capacity of property agent for the benefit of the Noteholders, MediciNova will grant a security interest in or pledge certain assets as security for the full and final payment and performance of its obligations under the Convertible Notes. These assets include the initial principal amount of the Convertible Notes to be deposited into a segregated trust account at the completion of the Merger, the additional principal amount of the Convertible Notes to be deposited into such trust account on June 30, 2010 as part of the Second Payment Consideration, if any, all rights of MediciNova against the trust agent or any clearing broker for the trust agent in connection with the trust account, all securities, stocks, bonds, mutual fund shares, U.S. Treasury instruments and other investment property and financial assets now or hereafter reflected as maintained in the trust account, together with any and all proceeds, replacements or substitutions therefor, and all proceeds of every kind or nature, and in whatever form (including both cash and non-cash) received now or in the future upon the sale or other disposition of any of the foregoing, collectively the property. Provided no event of default has occurred and is continuing, MediciNova will be able to direct the investment and reinvestment of the property in certain approved investment options, including certain money market funds. At the maturity of the Convertible Notes on the 18-month anniversary of the closing of the Merger, MediciNova will use the property to pay the principal amount of, and accrued interest on, the Convertible Notes.

The Convertible Notes are the secured obligation of MediciNova, and the Indenture does not limit other indebtedness of MediciNova, secured or unsecured. The Indenture contains limited covenants, including a requirement that MediciNova deliver to holders of the Convertible Notes quarterly statements setting forth the principal amount of the Convertible Notes at the close of the fiscal quarter as well as information regarding the amount of interest capitalized to such Convertible Notes during the fiscal quarter.

Holders of the Convertible Notes may submit conversion notices, which are irrevocable, instructing the trustee to convert such Convertible Notes into shares of MediciNova common stock at an initial conversion price of \$6.80 per share. Following each conversion date, which date generally is the final business day of each calendar month, MediciNova will issue the number of whole shares of common stock issuable upon conversion as promptly as practicable (and in any event within ten business days). Any fractional shares (after aggregating all Convertible Notes being converted by a holder on such date) will be rounded down and MediciNova will deliver cash for the current market value of the fractional share. The Indenture will include customary anti-dilution adjustments and events of default. See Description of Convertible Notes beginning on page 233 of this joint proxy statement/prospectus.

**MediciNova's Reasons for the Merger**

In reaching its decision to approve the Merger Agreement and issuance of the Convertible Notes and recommend that its stockholders adopt the Merger Agreement and approve the issuance of the Convertible Notes, MediciNova's board of directors consulted with MediciNova's management, as well as its financial and legal advisors, and considered a number of factors. These factors include (i) the combined ibudilast clinical development programs of the two companies, (ii) preclinical and clinical data for AV411 are expected to be used as support for a development pathway for MN-166, resulting in significant cost savings and (iii) the potential financing opportunity presented by the transaction. See The Merger MediciNova's Reasons for the Merger; Recommendation of MediciNova's Board of Directors beginning on page 80 of this joint proxy statement/prospectus.

## **Table of Contents**

### **Opinion of MediciNova's Financial Advisor**

On August 20, 2009, Ladenburg Thalmann & Co. Inc., or Ladenburg, delivered its written opinion to MediciNova's board of directors. The opinion stated that, as of August 20, 2009, based upon and subject to the assumptions made, matters considered, procedures followed and limitations on Ladenburg's review as set forth in the opinion, the Net Merger Consideration (as defined hereinafter) to be paid by MediciNova is fair to MediciNova's stockholders. The full text of Ladenburg's written opinion dated as of August 20, 2009, which sets forth the assumptions made, matters considered, procedures followed, and limitations on the review undertaken by Ladenburg in rendering its opinion, is attached as Annex F to this joint proxy statement/prospectus and is incorporated herein by reference. Ladenburg's opinion is not intended to be, and does not constitute, a recommendation to you as to how you should vote or act with respect to the Merger or any other matter relating thereto. See "The Merger" Opinion of Ladenburg Thalmann & Co. Inc. Financial Advisor to MediciNova beginning on page 86 of this joint proxy statement/prospectus.

### **Avigen's Reasons for the Merger**

In reaching its decision to approve the Merger Agreement and recommend that its stockholders adopt the Merger Agreement, Avigen's board of directors consulted with Avigen's management, as well as its financial and legal advisors, and considered a number of factors. These factors include (i) Avigen's strategic alternatives, (ii) the consolidation of the intellectual property related to ibudilast and (iii) the opportunity for Avigen stockholders to participate in the short and long-term value of MediciNova's preclinical and clinical development programs. See "The Merger" Avigen's Reasons for the Merger; Recommendation of Avigen's Board of Directors beginning on page 82 of this joint proxy statement/prospectus.

### **Opinion of Avigen's Financial Advisor**

On August 20, 2009, as financial advisor to Avigen's board of directors, RBC Capital Markets Corporation, or RBC, rendered its written opinion to Avigen's board of directors that, as of that date and subject to the assumptions, qualifications and limitations set forth in its opinion, the Merger Consideration payable in the Merger was fair, from a financial point of view, to Avigen stockholders. The full text of RBC's written opinion dated as of August 20, 2009, which sets forth the assumptions made, matters considered, procedures followed, and limitations on the review undertaken by RBC in rendering its opinion, is attached as Annex G to this joint proxy statement/prospectus and is incorporated herein by reference. RBC's opinion is not intended to be, and does not constitute, a recommendation to you as to how you should vote or act with respect to the Merger or any other matter relating thereto. See "The Merger" Opinion of RBC Capital Markets Corporation Financial Advisor to Avigen beginning on page 91 of this joint proxy statement/prospectus.

### **Interests of Avigen's Directors and Executive Officers in the Merger**

In considering the recommendation of Avigen's board of directors with respect to adoption of the Merger Agreement, Avigen stockholders should be aware that members of the board of directors and executive officers of Avigen have interests in the Merger that may be different from, or in addition to, interests they have as Avigen stockholders. These interests may create an appearance of a conflict of interest. Avigen's board of directors was aware of these potential conflicts of interest during its deliberations on the merits of the Merger and in making its decision in approving the Merger, the Merger Agreement and the related transactions.

Subject to applicable Delaware law, from and after the effective time of the Merger, MediciNova has agreed to cause the surviving entity to maintain and honor all indemnification arrangements in place for all past and present directors, officers, employees and agents of Avigen and its subsidiaries as of the date of the Merger Agreement under Avigen's amended and restated certificate of incorporation and amended and restated bylaws and the indemnification agreements disclosed to MediciNova for acts or omissions occurring at or prior to the effective time of the Merger.

**Table of Contents**

Avigen's board of directors has established a management transition plan intended to retain key employees and enable executive officers to represent stockholder interests during periods involving a possible change in control of Avigen and to provide severance benefits in the event of termination of employment without cause. The management transition plan was designed to protect the earned benefits of key employees, including executive officers, against adverse changes that may result from a change in control of Avigen or termination without cause. As amended, the management transition plan will terminate in connection with the Merger, and the scheduled payouts under the management transition plan will occur upon termination or shortly thereafter, except to the extent necessary to delay payouts to avoid adverse tax consequences.

Five of Avigen's current and former named executive officers are participants in the plan and are entitled to receive the following benefits if his or her employment is involuntarily terminated, or he or she resigns as a result of a constructive termination, as defined under the management transition plan:

15 months base salary (21 months, in the case of Dr. Kenneth Chahine, J.D., Ph.D., Avigen's former Chief Executive Officer and President);

full accelerated vesting of outstanding stock options; and

15 months (18 months, in the case of Dr. Chahine) health benefits payments, or until such earlier date as the executive officer secures subsequent employment that provides substantially similar health benefits.

If such a termination had occurred on September 30, 2009, Avigen's current named executive officers would have received the following benefits:

Name	Salary Continuation	COBRA Payments
Andrew A. Sauter	\$ 334,914	\$ 22,041
Kirk Johnson	\$ 348,160	\$ 21,645

Regardless of whether the Merger is consummated, these amounts, subject to de minimis adjustments to the cost of payments under the Consolidated Omnibus Budget Reconciliation Act ( COBRA ), will be payable at the time of such named executive officers' termination.

The employment of three of Avigen's former named executive officers, Dr. Chahine, M. Christina Thomson, J.D., Avigen's former Vice President, General Counsel and Secretary, and Michael Coffee, Avigen's former Chief Business Officer, was terminated in March 2009, at which time such executive officers became entitled to receive benefits under the plan. The amounts payable to these former executive officers, which are specified below, are currently being paid and will be paid whether or not the Merger is consummated.

Name	Salary Continuation	COBRA Payments
Kenneth Chahine, J.D., Ph.D.	\$ 775,689	\$ 32,656
Michael Coffee	\$ 392,379	\$ 4,813
M. Christina Thomson, J.D.	\$ 334,914	\$ 8,594

Andrew A. Sauter, Avigen's current Chief Executive Officer, President and Chief Financial Officer, and Kirk Johnson, Ph.D., Avigen's Vice President, Research and Development, are expected to receive cash bonuses for the remainder of Avigen's existence as determined by Avigen's compensation committee of the board of directors, in its sole discretion, based on the estimated value to be received by Avigen's stockholders upon completion of the Merger or dissolution of Avigen, as applicable. The receipt of cash bonuses by Messrs. Sauter and Johnson is not conditioned on the completion of the Merger. However, based on the anticipated amount of consideration estimated to be paid by MediciNova in the Merger, an aggregate of \$150,000 in cash bonuses have been included in Avigen's estimated closing liabilities, with the precise amount of such awards expected to be determined prior to consummation of the Merger.



## **Table of Contents**

Under the CPR Agreement, Andrew A. Sauter, Avigen's current Chief Executive Officer, President and Chief Financial Officer, or any successor person appointed in accordance with the CPR Agreement will receive fees of \$1,500 per month plus reimbursement of reasonable, documented out-of-pocket expenses of up to \$50,000 for serving as the representative of the interests of former Avigen stockholders under such agreement. If Mr. Sauter decides not to act as such representative, then Kenneth G. Chahine, J.D., Ph.D., a current director of Avigen and the company's former Chief Executive Officer and President, will be eligible, at his election, to act as the representative of former Avigen stockholders under such agreement, thereby entitling him to receive such fees and reimbursement of expenses. See "The Merger - Interests of Avigen's Directors and Executive Officers in the Merger" beginning on page 84 of this joint proxy statement/prospectus.

## **Regulatory Approvals**

No federal or state regulatory approvals are required in connection with the Merger and the issuance of the Convertible Notes, and neither Avigen nor MediciNova is subject to compliance with any federal or state regulatory requirements in connection with the Merger or issuance of the Convertible Notes.

## **Conditions of the Obligations of the Parties**

The Merger Agreement provides that the obligations of MediciNova, Absolute Merger and Avigen to consummate and effect the Merger are subject to the satisfaction, at or prior to the effective time of the Merger, of certain satisfied conditions. See "Certain Terms of the Merger Agreement and the CPR Agreement - Conditions to the Obligations of Each Party," "Certain Terms of the Merger Agreement and the CPR Agreement - Additional Conditions to the Obligations of Avigen" and "Certain Terms of the Merger Agreement and the CPR Agreement - Additional Conditions to the Obligations of MediciNova and Absolute Merger" beginning on page 111 of this joint proxy statement/prospectus.

## **Termination of the Merger Agreement**

The Merger Agreement provides that the boards of directors of MediciNova and Avigen can agree by mutual written consent to terminate the Merger Agreement at any time prior to the effective time of the Merger. In addition, the Merger Agreement provides that either MediciNova or Avigen may terminate the Merger Agreement, at any time prior to the effective time of the Merger, if certain specified events occur. See "Certain Terms of the Merger Agreement and the CPR Agreement - Termination of the Merger Agreement" beginning on page 113 of this joint proxy statement/prospectus.

## **Fees and Expenses**

In the event that Avigen's board of directors changes its recommendation regarding the Merger following receipt of a superior offer, and the Merger is not consummated, Avigen is required to reimburse MediciNova for 50 percent of its reasonable and documented out-of-pocket expenses up to a maximum \$500,000. Each party otherwise will pay its own costs and expenses incurred in connection with the Merger Agreement and the transactions contemplated thereby.

## **Termination Fee**

Except for the limited circumstances in which Avigen may be required to reimburse MediciNova for certain out-of-pocket expenses as described above, no termination fees are payable in connection with a termination of the Merger Agreement.



## **Table of Contents**

### **Risk Factors**

You should carefully review the section of this joint proxy statement/prospectus entitled "Risk Factors" beginning on page 22 of this joint proxy statement/prospectus, which sets forth certain risks and uncertainties related to the Merger, risks and uncertainties to which the combined company's business will be subject and risks and uncertainties to which each of MediciNova and Avigen, as an independent company, is subject. These risk factors should be considered along with any additional risk factors in the other information included in or incorporated by reference into this joint proxy statement/prospectus.

### **Listing of Shares of MediciNova Common Stock Issuable Upon Conversion of the Convertible Notes**

MediciNova will use reasonable efforts to authorize for listing on Nasdaq prior to the effective time of the Merger, the shares of MediciNova common stock issuable upon conversion of the Convertible Notes to be issued in connection with the Merger, subject to official notice of issuance.

### **Delisting and Deregistration of Avigen Common Stock**

If the Merger is completed, Avigen common stock will be delisted from Nasdaq and deregistered under the Securities Exchange Act of 1934, as amended, or the Exchange Act. Avigen also will cease to be a reporting company under the Exchange Act.

### **Tax Treatment**

U.S. persons who hold Avigen stock generally will recognize capital gain or loss based on the difference between (1) the sum of cash received and the fair market value of each of the Convertible Notes, the Second Payment Consideration rights, and the CPRs received at the Merger and (2) their adjusted tax basis in their Avigen Stock. The tax treatment of the CPRs is unclear as is more fully described below. The Convertible Notes will bear original issue discount for which U.S. persons subject to tax will be required to report taxable income before payments are made with respect to the Convertible Notes. U.S. persons will be required to report the unstated interest with respect to Second Payment Consideration Rights in accordance with their normal method of accounting, and will recognize income, gain or loss on the payment of the Second Payment Consideration as described below. Non-U.S. persons generally will not be subject to withholding on original issue discount with respect to Convertible Notes received unless they fail to qualify for the exception from withholding on portfolio interest. See "Material U.S. Federal Income Tax Consequences of the Merger" beginning on page 215 of this joint proxy statement/prospectus.

### **Anticipated Accounting Treatment**

MediciNova will account for the Merger under the acquisition method of accounting in accordance with the authoritative guidance under Accounting Standards Codification 805 (formerly Statement of Financial Accounting Standards No. 141(R), Business Combinations (Revised)). See "The Merger Anticipated Accounting Treatment" beginning on page 97 of this joint proxy statement/prospectus.

### **Appraisal Rights**

Holders of Avigen common stock are entitled to appraisal rights under Delaware law. See the section entitled "Annex H Copy of Section 262 of the Delaware General Corporation Law" beginning on page H-1 of this joint proxy statement/prospectus.

**Table of Contents****Material Differences in Rights of MediciNova Stockholders and Avigen Stockholders**

When the Merger is completed, Avigen stockholders may become MediciNova stockholders upon conversion of any Convertible Notes received as part of the Merger Consideration. The rights of MediciNova stockholders differ from the rights of Avigen stockholders in certain important ways. These material differences include: (i) MediciNova stockholders may only remove directors for cause while Avigen stockholders may remove directors both with and without cause and (ii) ten percent of Avigen stockholders may call a special meeting while MediciNova stockholders have no ability to call a special meeting. See "Comparison of Stockholder Rights and Corporate Governance Matters" beginning on page 240 of this joint proxy statement/prospectus.

**Comparative Closing Market Prices of MediciNova and Avigen Common Stock**

The table below presents the closing market price on Nasdaq for MediciNova common stock and the closing market price for Avigen common stock on Nasdaq on August 20, 2009, the last trading day before the public announcement of the signing of the Merger Agreement and November 12, 2009. **The calculation for the equivalent price does not include, or attribute any value to, the option value of the Convertible Notes, which option value is estimated at approximately \$16.4 million, or approximately \$0.55 per share of Avigen common stock based upon the Black-Scholes option valuation and certain assumptions as of August 19, 2009, the day immediately prior to the signing of the Merger Agreement. In addition, the calculation for the equivalent price does not include, or attribute any value to, the CPRs.** As a result, these comparisons may not provide meaningful information to MediciNova stockholders in determining whether to adopt the Merger Agreement and approve the issuance of the Convertible Notes or to Avigen stockholders in determining whether to adopt the Merger Agreement. MediciNova and Avigen stockholders are encouraged to review carefully the other information contained or incorporated by reference in this joint proxy statement/prospectus in considering whether to approve the applicable proposals.

<b>Date</b>	<b>MediciNova Closing Price</b>	<b>Avigen Closing Price</b>	<b>Equivalent Price (1)</b>
August 20, 2009	\$ 6.47	\$ 1.33	\$ 1.24
November 12, 2009	\$ 6.01	\$ 1.43	\$ 1.24

- (1) The equivalent price is equal to the estimated First Payment Consideration plus the estimated Second Payment Consideration and represents the principal amount of Convertible Notes that would be issued in exchange for each share of Avigen common stock assuming all such amounts were paid in Convertible Notes on the specified date.

**Table of Contents****SELECTED HISTORICAL AND UNAUDITED PRO FORMA CONDENSED****COMBINED FINANCIAL DATA**

The following tables present summary historical financial data for MediciNova and Avigen, summary unaudited pro forma condensed combined financial data for MediciNova and Avigen, and comparative historical and unaudited pro forma per share data for MediciNova and Avigen.

**Selected Historical Consolidated Financial Data of MediciNova**

The following selected financial data for the five years ended December 31, 2008 and for the period ended September 26, 2000 (inception) to December 31, 2008 are derived from the audited consolidated financial statements of MediciNova, Inc. The financial data for the nine month periods ended September 30, 2009 and 2008 are derived from unaudited financial statements. The unaudited financial statements include all adjustments, consisting of normal recurring accruals, which MediciNova, Inc. considers necessary for a fair presentation of the financial position and the results of operations for these periods. Operating results for the nine months ended September 30, 2009 are not necessarily indicative of the results that may be expected for the entire year ending December 31, 2009.

You should read the following financial information together with the information under the sections entitled MediciNova's Management's Discussion and Analysis of Financial Condition and Results of Operations and MediciNova's Business and MediciNova's financial statements and the related notes to these financial statements appearing elsewhere in this joint proxy statement/prospectus.

**Selected Historical Consolidated Financial Data of MediciNova, Inc.**

(in thousands, except share and per share amounts)	Nine Months Ended September 30,		Year Ended December 31,					For the period from September 26, 2000 (inception) to December 31, 2008
	2009 (unaudited)	2008 (unaudited)	2008	2007	2006	2005	2004	
<b>Statement of Operations Data:</b>								
Revenues	\$	\$	\$	\$	\$ 264	\$ 804	\$ 490	\$ 1,558
Operating expenses:								
Cost of revenues					147	674	438	1,258
Research and development	8,226	11,823	13,828	42,121	32,171	22,739	11,317	133,673
General and administrative	6,927	6,993	8,773	11,373	9,624	7,479	37,348	78,661
Total operating expenses	15,153	18,816	22,601	53,494	41,942	30,892	49,103	213,592
Operating loss	(15,153)	(18,816)	(22,601)	(53,494)	(41,678)	(30,088)	(48,613)	(212,034)
Gain/(impairment charge) on investment securities and ARS put, net	214	(3,296)	(1,260)					(1,260)
Foreign exchange (loss)/gain	(2)	(91)	(88)					(88)
Interest income, net	489	1,697	2,038	4,611	5,988	4,396	340	17,796
Income taxes	(1)	(4)	(14)	(20)				(33)
Net loss	\$ (14,453)	\$ (20,510)	\$ (21,925)	\$ (48,903)	\$ (35,690)	\$ (25,692)	\$ (48,273)	\$ (195,619)
Accretion to redemption value of redeemable convertible preferred stock						(20)	(79)	(98)
Deemed dividend resulting from conversion of Series C redeemable preferred stock							(31,264)	(31,265)

## Edgar Filing: MEDICINOVA INC - Form S-4/A

Net loss applicable to common stockholders	\$	(14,453)	\$	(20,510)	\$	(21,925)	\$	(48,903)	\$	(35,690)	\$	(25,712)	\$	(79,616)	\$	(226,982)
Basic and diluted net loss per common share	\$	(1.20)	\$	(1.70)	\$	(1.82)	\$	(4.16)	\$	(3.52)	\$	(2.88)	\$	(1,592.32)		
Shares used to compute basic and diluted net loss per common share		12,088,029		12,072,027		12,072,027		11,752,139		10,130,920		8,928,533		50,000		

**Table of Contents**

(in thousands)	Nine Months Ended September 30,			Year Ended December 31,			
	2009 (unaudited)	2008 (unaudited)	2008	2007	2006	2005	2004
<b>Balance Sheet Data:</b>							
Cash, cash equivalents and investment securities current	\$ 47,034	\$ 47,451	\$ 19,297	\$ 70,635	\$ 104,051	\$ 138,701	\$ 50,801
Working capital	33,166	44,792	17,836	65,938	100,102	134,633	48,704
Total assets	55,949	51,879	50,224	73,752	111,591	142,394	53,769
Deficit accumulated during development stage	(241,436)	(225,567)	(226,982)	(205,057)	(156,154)	(120,465)	(94,753)
Total stockholders' equity	35,853	48,106	48,045	66,608	100,981	135,708	7,669

**Table of Contents****Selected Historical Financial Data of Avigen**

The following selected financial data for the five years ended December 31, 2008 and for the period ended October 22, 1992 (inception) to December 31, 2008 are derived from the audited financial statements of Avigen, Inc. The financial data for the nine month periods ended September 30, 2009 and 2008 are derived from unaudited financial statements. The unaudited financial statements include all adjustments, consisting of normal recurring accruals, which Avigen, Inc. considers necessary for a fair presentation of the financial position and the results of operations for these periods. Operating results for the nine months ended September 30, 2009 are not necessarily indicative of the results that may be expected for the entire year ending December 31, 2009.

You should read the following financial information together with the information under the sections entitled "Avigen's Management's Discussion and Analysis of Financial Condition and Results of Operations" and "Avigen's Business" and Avigen's financial statements and the related notes to these financial statements appearing elsewhere in this joint proxy statement/prospectus.

**Selected Historical Financial Data of Avigen, Inc.**

(in thousands, except share and per share amounts)	Nine Months Ended September 30,		Year Ended December 31,				For the period from October 22, 1992 (inception) to December 31, 2008	
	2009 (unaudited)	2008 (unaudited)	2008	2007	2006	2005	2004	
<b>Statement of Operations Data:</b>								
Revenues	\$ 103	\$	\$ 7,100	\$	\$ 103	\$ 12,026	\$ 2,195	\$ 22,674
Operating expenses:								
Research and development	3,566	17,841	23,607	20,681	15,219	13,775	19,344	200,787
General and administrative	8,180	6,398	8,696	8,633	8,860	8,264	8,367	86,643
Impairment loss on long-lived assets		(274)	139		450	6,130		6,719
In-license fees		2,500	2,500		3,000			10,534
Total operating expenses	11,746	26,465	34,942	29,314	27,529	28,169	27,711	304,683
Operating loss	(11,643)	(26,465)	(27,842)	(29,314)	(27,426)	(16,143)	(25,516)	(282,009)
Interest income, net	1,071	2,067	2,491	3,466	2,535	1,359	1,696	34,781
Sublease income	594	270	365	703	565	67		1,700
Other (expense) income, net	9	(27)	(113)	(19)	70	21	(103)	(266)
Net loss	\$ (9,969)	\$ (24,155)	\$ (25,099)	\$ (25,164)	\$ (24,256)	\$ (14,696)	\$ (23,923)	\$ (245,794)
Basic and diluted net loss per common share	\$ (0.33)	\$ (0.81)	\$ (0.84)	\$ (0.90)	\$ (1.03)	\$ (0.71)	\$ (1.17)	
Shares used to compute basic and diluted net loss per common share	29,807,557	29,764,487	29,765,651	27,962,202	23,509,378	20,624,229	20,362,155	
<b>Balance Sheet Data:</b>								
Cash, cash equivalents, available-for-sale securities, and restricted investments	\$ 39,903	\$ 56,410	\$ 56,839	\$ 78,114	\$ 70,768	\$ 70,388	\$ 76,218	
Working capital	36,013	45,057	45,513	67,168	59,467	59,649	63,873	
Total assets	40,340	58,106	58,046	81,069	75,017	76,264	90,507	
Long-term obligations	461	7,656	602	7,796	1,570	9,282	9,064	
	(255,763)	(244,850)	(245,794)	(220,695)	(195,531)	(171,275)	(156,579)	

Edgar Filing: MEDICINOVA INC - Form S-4/A

Deficit accumulated during development stage								
Total stockholders equity	37,783	47,182	47,204	69,832	63,477	65,464	79,875	

**Table of Contents****Selected Unaudited Pro Forma Condensed Combined Financial Data of MediciNova and Avigen**

(In thousands, except per share amounts)

The following selected unaudited pro forma condensed combined financial information was prepared using the acquisition method of accounting. The unaudited pro forma condensed combined balance sheet is based on the individual historical consolidated balance sheets of MediciNova and Avigen as of September 30, 2009, and has been prepared to reflect the merger of MediciNova and Avigen as of September 30, 2009. The unaudited pro forma condensed combined statements of operations are based on the individual historical consolidated statements of operations of MediciNova and Avigen and combine the results of operations of MediciNova and Avigen for the year ended December 31, 2008 and the nine months ended September 30, 2009, giving effect to the Merger as if it occurred as of the beginning of the periods presented, reflecting only pro forma adjustments expected to have a continuing impact on the combined results. The unaudited pro forma condensed combined financial statements assume that each share of Avigen common stock (together with the associated preferred stock purchase right) was cancelled and extinguished in exchange for Convertible Notes issued by MediciNova on the date of completion of the Merger. It is also assumed in the unaudited pro forma condensed combined financial statements that all Convertible Notes were converted into shares of MediciNova common stock at a conversion price of \$6.80 per share on the date of completion of the Merger.

The selected unaudited pro forma condensed combined financial data are presented for illustrative purposes only and are not necessarily indicative of the combined financial position or results of operations of future periods or the results that actually would have been realized had the entities been a single entity during these periods. The selected unaudited pro forma condensed combined financial data as of and for the nine months ended September 30, 2009 and for the year ended December 31, 2008 are derived from the unaudited pro forma condensed combined financial information and the historical financial statements of MediciNova and Avigen and should be read in conjunction with that information. For more information, please see the section entitled "Unaudited Pro Forma Condensed Combined Financial Statements" in this joint proxy statement/prospectus and the consolidated financial statements of MediciNova and Avigen included in this joint proxy statement/prospectus.

	<b>For the Year Ended December 31, 2008</b>	<b>For the Nine Months Ended September 30, 2009</b>
<b>Unaudited Pro Forma Condensed Combined Statement of Operations Data:</b>		
Total revenue	\$ 7,100	\$ 103
Research and development expense	39,935	11,792
General and administrative expense	17,356	12,237
Loss from operations	(50,191)	(23,926)
Net loss	\$ (47,024)	\$ (22,155)

	<b>As of September 30, 2009</b>
<b>Unaudited Pro Forma Condensed Combined Balance Sheet Data:</b>	
Cash and cash equivalents	\$ 57,776
Working capital	64,842
Total assets	95,137
Stockholders' equity	70,984



**Table of Contents**

**Comparative Historical and Unaudited Pro Forma Per Share Data**

The information below reflects the historical net loss and book value per share of MediciNova common stock and the historical net loss and book value per share of Avigen common stock in comparison with the unaudited pro forma net loss and book value per share after giving effect to the proposed merger of MediciNova with Avigen on an acquisition method of accounting basis.

You should read the tables below in conjunction with the audited and unaudited financial statements of MediciNova, Inc. included in this joint proxy statement/prospectus and audited and unaudited financial statements of Avigen, Inc. included in this joint proxy statement/prospectus and the related notes and the unaudited pro forma condensed financial information and notes related to such financial statements included elsewhere in this joint proxy statement/prospectus.

**MEDICINOVA**

	<b>Year Ended December 31, 2008</b>	<b>Nine Months Ended September 30, 2009</b>
<b>Historical Per Common Share Data:</b>		
Net loss per common share basic and diluted	\$ (1.82)	\$ (1.20)
Book value per share	\$ 4.01	\$ 2.96

**AVIGEN**

	<b>Year Ended December 31, 2008</b>	<b>Nine Months Ended September 30, 2009</b>
<b>Historical Per Common Share Data:</b>		
Net loss per common share basic and diluted	\$ (0.84)	\$ (0.33)
Book value per share	\$ 1.59	\$ 1.27

**MEDICINOVA AND AVIGEN**

	<b>Year Ended December 31, 2008</b>	<b>Nine Months Ended September 30, 2009</b>
<b>Combined Unaudited Pro Forma Per Share Data:</b>		
Net loss per common share basic and diluted	\$ (2.72)	\$ (1.28)
Book value per share		\$ 4.11

**Table of Contents**

**RISK FACTORS**

*You should consider the following factors in evaluating whether to approve the proposals described in this joint proxy statement/prospectus. These factors should be considered in conjunction with the other information included by MediciNova and Avigen in this joint proxy statement/prospectus.*

**Risks Related to the Merger**

***Satisfying closing conditions may delay or prevent completion of the Merger.***

Specified conditions must be satisfied or waived in order for MediciNova, Absolute Merger and Avigen to complete the Merger. These conditions include the requirement that no governmental entity issues an order, decree, injunction or other order or ruling makes the Merger illegal or otherwise prohibits consummation of the Merger, that the SEC declares the Registration Statement on Form S-4 effective and that the shares of MediciNova common stock required to be reserved for issuance in connection with the conversion of the Convertible Notes have been duly authorized for listing by Nasdaq subject to official notice of issuance. MediciNova and Avigen cannot assure you that all of the conditions will be satisfied. If the conditions are not satisfied or waived, the Merger may not occur or may be delayed, and MediciNova and Avigen each may lose some or all of the intended benefits of the Merger. MediciNova and Avigen cannot assure you that a delay in satisfying the closing conditions would not be detrimental to MediciNova or Avigen. If the combined company is unable to realize the strategic and financial benefits anticipated from the Merger, MediciNova stockholders may experience substantial dilution of their ownership interest in connection with the Merger without receiving any commensurate benefit.

***The Merger is subject to approval by holders of a majority of the outstanding shares of each of MediciNova and Avigen, and neither MediciNova nor Avigen can assure you that such stockholders will approve the Merger.***

Under the Merger Agreement, holders of a majority of the outstanding shares of MediciNova common stock must approve the adoption of the Merger Agreement and approve the issuance of the Convertible Notes contemplated thereunder. Holders of a majority of the outstanding shares of Avigen common stock also must approve the adoption of the Merger Agreement. MediciNova and Avigen cannot assure you that the Merger will be adopted by the stockholders of both companies, in which case the Merger Agreement may be terminated. In the event that the Merger is not consummated, MediciNova and Avigen may be subject to many risks, including the inability to recognize the benefits of a combined clinical development program based on ibudilast and the costs related to the Merger, such as legal, accounting and advisory fees, which must be paid even if the Merger is not completed. In addition, Avigen is expected to commence voluntary dissolution proceedings under Delaware law if its stockholders do not approve the Merger.

***The First Payment Consideration may have a larger or smaller value than expected at the time the Merger Agreement was signed.***

The First Payment Consideration is subject to adjustment based on activities related to the liquidation or sale of certain assets of Avigen in connection with the winding down of its operations prior to closing. The Merger Agreement establishes the method for calculating the First Payment Consideration, which is expected to be approximately \$1.19 per share of Avigen common stock. The First Payment Consideration is equal to \$35,461,000 divided by the number of shares of Avigen common stock outstanding immediately prior to the effective time of the Merger. The aggregate First Payment Consideration is subject to downward adjustment (on a dollar for dollar basis) in the event that the aggregate cash liquidation proceeds of the marketable securities and restricted investments held by Avigen as of June 30, 2009 are less than \$27,721,000. In the event that, prior to the effective time of the Merger, Avigen sells or otherwise disposes of its rights to the first milestone payment under the Genzyme Agreement the aggregate First Payment Consideration will be increased by the amount received by Avigen pursuant to such transaction. In addition, in the event that, prior to the effective time of the Merger,

## **Table of Contents**

Avigen sells or otherwise disposes of all of its rights under the Genzyme Agreement, the aggregate First Payment Consideration will be increased by the amount received by Avigen pursuant to such transaction less 50 percent of all amounts received by Avigen pursuant to such transaction in excess of \$6,000,000. Accordingly, Avigen stockholders could receive consideration at the closing with considerably more or less value than anticipated.

*The Second Payment Consideration may have a larger or smaller value than expected at the time the Merger Agreement was signed.*

The aggregate Second Payment Consideration is subject to upward adjustment based on savings in estimated expenses through closing and receipt of certain payments post-closing, as well as downward adjustment in the event that actual closing liabilities exceed estimated liabilities through closing. For example, to the extent salaries paid by Avigen from the date of the signing of the Merger Agreement to closing exceed \$298,530, the aggregate Second Payment Consideration would be reduced by such excess. The Second Payment Consideration will be equal to the amount remaining in the escrow account described herein following satisfaction of the demand amount, as adjusted by the selected amount, as described below, divided by the number of shares of Avigen's common stock outstanding immediately prior to the effective time of the Merger.

Under the terms of an escrow agreement to be entered into at the time of completion of the Merger, Avigen will deposit in an escrow account \$1,500,000, or approximately \$0.05 per share of Avigen common stock, plus the amount by which the aggregate cash liquidation proceeds of its marketable securities and restricted investments held as of June 30, 2009 exceed \$28,021,000. After closing, MediciNova also will deposit into the escrow account certain payments, including royalties pursuant to an agreement between Avigen and Advanced Cell Technology, Inc., if any, received during the escrow period and excess cash amounts collected from subtenants at Avigen's current headquarters, to the extent such payments exceed specified amounts agreed upon by the parties.

On or prior to June 30, 2010, MediciNova will be entitled to submit one demand certificate to claim all or a portion of the funds in the escrow account, or the demand amount, with respect to certain additional liabilities of Avigen related to its business activities and operations prior to the effective time of the Merger, including any amounts paid to current or former directors and officers of Avigen in connection with releases delivered by such individuals under the Merger Agreement, liabilities in excess of specified amounts agreed upon by the parties and the expenses of the representative of the Avigen stockholders incurred in connection with the Merger Agreement and the CPR Agreement. Upon delivery of MediciNova's demand certificate, amounts in the escrow account that are not being demanded in satisfaction of additional liabilities will be released to former Avigen stockholders on a pro rata basis. A stockholder representative will be entitled to dispute the demand amount, and an independent accounting firm will resolve any unresolved dispute between MediciNova and the stockholder representative with respect to the demand amount. Prior to resolution of any dispute regarding the demand amount, all amounts set forth in the demand certificate that are not being contested by the stockholder representative will be released to MediciNova.

Following resolution of the dispute regarding the demand amount, which requires the independent accounting firm to select either the amount demanded by MediciNova or the amount of such demand as adjusted by the amounts contested by the stockholder representative as the numerical amount it believes is the accurate amount of additional liabilities, or the selected amount, MediciNova will receive an amount reflecting any adjustments resulting from the selected amount. Any remaining amounts in the escrow account then will be released to former Avigen stockholders on a pro rata basis. Accordingly, Avigen stockholders could receive less than \$0.05 per share as part of the Second Payment Consideration.

*The CPRs may expire worthless.*

Under the terms of the Merger Agreement, at the effective time of the Merger, each share of Avigen common stock (and the associated preferred stock purchase right) will be cancelled and extinguished in return for

---

**Table of Contents**

certain consideration, including the right to receive one CPR. At the completion of the Merger, MediciNova, Avigen and the rights agent will enter into the CPR Agreement. The CPR Agreement will set forth the rights that former Avigen stockholders will have with respect to each CPR held after the completion of the Merger. The CPR Agreement provides for the payment of the following amounts (net of applicable expenses and taxes) on a pro rata basis:

if the first milestone payment under the Genzyme Agreement is received within 20 months of the effective time of the Merger, \$6,000,000 or such lesser cash amount paid by Genzyme less certain costs and expenses;

if the first milestone payment has not occurred and the Parkinson's Product, as defined in the Genzyme Agreement, is sold or otherwise disposed of by MediciNova within 20 months of the effective time of the Merger, 50 percent of the difference between the net proceeds of such sale or disposition received within such 20-month period and certain costs and expenses; and

if the trust established pursuant to Avigen's management transition plan is terminated, the amount remaining in such trust upon termination (less any payments required to be made under Avigen's management transition plan trust agreement), which is currently estimated at \$550,000.

MediciNova and Avigen cannot assure you that any of these events will occur or that MediciNova will receive the amounts owing upon occurrence of such events. In addition, MediciNova will be in control of the Genzyme relationship and does not have a direct financial incentive to actively pursue the payment of the first milestone payment for the benefit of Avigen's stockholders within the 20-month timeframe. If the payment events do not occur within the timeframes required, or do occur but amounts owing are not paid, no payments will be made under the CPR Agreement. Accordingly, the CPRs may ultimately have no value and expire worthless. See Genzyme Agreement beginning on page 118 of this joint proxy statement/prospectus for a description of the events that would trigger the milestone payment and current status.

***You may not be able to determine the amount of cash to be received under the CPRs, which makes it difficult to value the CPRs.***

The actual amount of any CPR payment cannot be determined until the occurrence of an event that would result in a CPR payment, and the amount received may be significantly less than expected particularly if significant costs are expended in an effort to receive such payments. The amount of actual payments on the CPRs is highly speculative, and accordingly, it may be difficult to value the CPRs.

***The U.S. federal income tax treatment of the CPRs is unclear.***

There is substantial uncertainty as to the tax treatment of the CPRs. The receipt of the CPRs as part of the merger consideration may be treated as a closed transaction or an open transaction for U.S. federal income tax purposes, which affects the amount of gain, if any, that may be recognized at the time of consummation of the Merger. See Material U.S. Federal Income Tax Consequences beginning on page 215 of this joint proxy statement/prospectus.

***MediciNova and Avigen may not realize all of the anticipated benefits of the transaction.***

Completion of the Merger will permit the combination of MediciNova's and Avigen's clinical development programs based on ibudilast (MediciNova's MN-166 and Avigen's AV411). Following completion of the Phase II clinical trial of MN-166 for the treatment of multiple sclerosis, or MS, in the second quarter of 2008, MediciNova has not undertaken, nor does it plan to undertake, any further significant clinical development of MN-166 until such time that it secures a strategic collaboration to advance the clinical development of MN-166. Following completion of the Merger, and aside from monitoring the NIDA-supported AV411 opioid withdrawal clinical trial in collaboration with Columbia University/New York State Psychiatric Institute, MediciNova does not intend to undertake any significant clinical development of AV411. Rather, MediciNova intends to integrate the two development programs and pursue discussions with potential partners to secure a strategic

---

**Table of Contents**

collaboration to advance the clinical development of the combined development program. MediciNova and Avigen cannot assure you that MediciNova will be able to secure such a strategic collaboration or otherwise further advance, or recognize value from, the MN-166 and AV411 clinical development programs.

***Covenants in the Merger Agreement impede the ability of Avigen to solicit other transactions pending completion of the Merger, which may harm Avigen stockholders.***

During the pendency of the Merger, Avigen is restricted from actively seeking alternative business combinations with another party. While the Merger Agreement is in effect and subject to narrowly defined exceptions, Avigen may not, directly or indirectly, (1) initiate, solicit or knowingly encourage (including by way of providing information), (2) engage in any discussions or negotiations with any third party regarding, (3) knowingly cooperate with or knowingly assist any third party in connection with or (4) knowingly facilitate the making by any third party of any inquiry, proposal or offer that constitutes or that would reasonably be expected to lead to an acquisition proposal. Any potential third party transaction that Avigen is prohibited from soliciting or encouraging could be favorable to Avigen stockholders and similar opportunities may not present themselves. If Avigen violates this no solicitation covenant, it will be in breach of the Merger Agreement, and MediciNova likely would be permitted to terminate the transaction.

***In certain limited circumstances, Avigen will be required to pay certain expenses of MediciNova.***

The terms of the Merger Agreement prohibit Avigen from knowingly cooperating with persons making acquisition proposals, except in limited circumstances when Avigen's board of directors determines in its good faith judgment that an unsolicited alternative acquisition proposal is or is reasonably likely to lead to a superior acquisition proposal and is reasonably capable of being consummated and that failure to cooperate with the proponent of the proposal could reasonably be considered a breach of Avigen board of directors' fiduciary duties. If Avigen's board of directors changes its recommendation following receipt of a superior offer and Avigen stockholders do not approve the Merger, Avigen will be required to pay one-half of the reasonable and documented out-of-pocket legal, accounting and other advisory fees and expenses of MediciNova, up to a maximum of \$500,000.

***Failure to complete the Merger could harm the price of MediciNova common stock and MediciNova's future business and operations.***

If the Merger is not completed, the price of MediciNova common stock may decline. From MediciNova's announcement of the signing of the nonbinding letter of intent with Avigen on June 25, 2009 until the date of filing of this joint proxy statement/prospectus, the trading price of MediciNova common stock on Nasdaq has more than doubled. If the parties terminate the Merger, the market might respond negatively to the announcement, which could harm the trading price of MediciNova common stock. In addition, if the Merger Agreement is terminated and MediciNova's board of directors determines to seek another business combination, there can be no assurance that it will be able to find a partner willing to enter into a similar transaction, which may adversely affect MediciNova's future business prospects.

***Failure to complete the Merger may result in Avigen filing for liquidation and dissolution.***

In November 2008, Avigen completed a significant restructuring plan to preserve its financial resources, minimize its exposure to fixed costs for staff and facilities and increase its control over the strategic timing and use of all of its resources. Prior to signing the Merger Agreement, Avigen's board of directors determined it would dissolve Avigen if it was unable to negotiate a sale of the company. If Avigen is unable to complete the Merger, it is expected to liquidate in a voluntary dissolution under Delaware law. In addition, the proceeds to Avigen stockholders from liquidation may be less than will be the consideration expected to be paid in the Merger.

---

**Table of Contents**

***MediciNova may not be successful in listing the shares issuable upon conversion of the Convertible Notes on Nasdaq, which may prevent the consummation of the Merger or adversely affect Noteholders.***

Under the terms of the Merger Agreement, MediciNova is required to submit a listing application to Nasdaq for the shares of MediciNova common stock that will be issued upon conversion of the Convertible Notes. Such application requires certain actions on MediciNova's part, including the filing of a supplemental listing application, which, if unsuccessful, would enable Avigen to terminate the Merger Agreement. If Avigen were to waive this closing condition, it could be more difficult for holders of the Convertible Notes to sell their shares upon conversion of the Convertible Notes or otherwise convert such investments into cash effectively.

***Some of Avigen's officers and directors have conflicts of interest that may influence them to support or approve the Merger and have interests in the transaction that may be different from, or in addition to, the interests of Avigen stockholders.***

Certain officers and directors of Avigen are participants in arrangements that provide them with interests in the Merger that may be different from yours. These interests may influence the officers and directors of Avigen to support or approve the Merger and therefore may create potential conflicts of interest.

These interests and arrangements include:

severance arrangements with Avigen's current and former executive officers that provide for the payment of an aggregate of approximately \$3.4 million of severance pay and benefits under the terms of the Avigen, Inc. Management Transition Plan;

Andrew A. Sauter, Avigen's current Chief Executive Officer, President and Chief Financial Officer, and Kirk Johnson, Ph.D., Avigen's Vice President, Research and Development, are expected to receive cash bonuses in connection with the negotiation of the Merger in amounts to be determined by Avigen's compensation committee of the board of directors in its sole discretion, with an aggregate of \$150,000 in cash bonuses included in Avigen's estimated closing liabilities;

under the CPR Agreement, Mr. Sauter or any successor person appointed in accordance with the CPR Agreement will receive fees of \$1,500 per month and reimbursement of expenses up to \$50,000 for serving as the representative of former Avigen stockholders, and Kenneth G. Chahine, J.D., Ph.D., Avigen's former Chief Executive Officer and President and a current director, will be eligible, at his election, to act in such role (and receive such fees and expenses) if Mr. Sauter declines to serve as representative; and

continued indemnification and insurance coverage as required under the Merger Agreement.

As a result of these interests, directors and officers of Avigen may be more likely to vote and, in the case of directors, recommend to stockholders that they vote, to adopt the Merger Agreement than if they did not hold these interests and may have reasons for doing so that are not the same as the interests of other stockholders. See "The Merger - Interests of Avigen's Directors and Executive Officers in the Merger" beginning on page 84 of this joint proxy statement/prospectus.

***The Merger may be completed even though certain material adverse changes have occurred.***

In general, either MediciNova or Avigen can delay the completion of the Merger if there is a material adverse change affecting the other party between August 20, 2009, the date of the Merger Agreement, and the closing. However, certain types of changes do not permit either party to refuse to complete the Merger, even if such change would have a material adverse effect on MediciNova or Avigen, including:

any adverse effect generally affecting the industry in which MediciNova or Avigen operates or conducts its business or the economy or the financial or securities markets in the United States or elsewhere in the world, including effects on such industries, economy or markets resulting from any regulatory or political conditions or developments or any natural disaster or any acts of terrorism,



**Table of Contents**

sabotage, military action or war (whether or not declared) or any escalation or worsening thereof (except in each case to the extent such changes disproportionately affect MediciNova or Avigen);

any adverse effect resulting from any legal proceedings arising from allegations of breach of fiduciary duty relating to the Merger Agreement or false or misleading public disclosure (or omission) in connection with the Merger Agreement made or brought by any of the current or former stockholders of the parties (on their own behalf or on behalf of the parties);

any change in the market price or trading volume of the outstanding securities of MediciNova or Avigen;

any failure by MediciNova or Avigen to meet internal projections or forecasts or published revenue or earnings predictions for any period;

any adverse effect arising directly or indirectly from or otherwise relating to any act of God, any act of terrorism, war or other armed hostilities, any regional, national or international calamity or any other similar event; or

any adverse effect resulting from the announcement or pendency of the Merger or the proposal thereof (including the loss or departure of employees or adverse developments in relationships with customers, suppliers, distributors or other business partners) or the Merger Agreement and the transactions contemplated hereby.

If any such adverse changes occur but MediciNova and Avigen still complete the Merger, the stock price of the combined company may suffer as well as the business prospects for the combined company.

***Regardless of whether the Merger is consummated, the announcement and pendency of the Merger could cause disruptions in the business of MediciNova, which could have an adverse effect on its business and financial results.***

Whether or not the Merger is consummated, the announcement and pendency of the Merger could cause disruptions in or otherwise negatively affect the business of MediciNova. The proposed business combination of MediciNova and Avigen may also disrupt business relationships, which could cause other parties to delay or defer decisions about current and future agreements with MediciNova because of the pending Merger. Further, prospective employees of MediciNova may experience uncertainty about their future roles with MediciNova, which might adversely affect MediciNova's ability to retain and recruit employees and consultants. In addition, the attention of management of MediciNova may be directed from business operations toward the consummation of the Merger. These disruptions could be exacerbated by a delay in the consummation of the Merger or termination of the Merger Agreement and could have an adverse effect on the business and financial results of MediciNova if the Merger is not consummated.

***If the Merger is not consummated, MediciNova and Avigen each will have incurred substantial costs and the market price of MediciNova and Avigen common stock may be adversely affected.***

MediciNova and Avigen each have incurred substantial costs in connection with the Merger. These costs are primarily associated with the fees of their respective financial advisors, accountants and attorneys. In addition, Avigen is subject to numerous restrictions contained in the Merger Agreement on the conduct of its businesses pending the completion of the Merger. For example, Avigen is not permitted, without consent of MediciNova, to enter into any binding agreement, letter or intent or similar agreement with respect to any material joint venture, strategic partnership, collaboration, license or alliance. If the Merger is not consummated, MediciNova and Avigen will have incurred significant costs and diverted substantial resources, from which they will have received little or no benefit. In addition, Avigen may have foregone certain business opportunities that may have realized stockholder value.



---

**Table of Contents**

***Pending or threatened litigation may impede consummation of the Merger and materially affect the financial condition of Avigen.***

On August 24, 2009, The Pennsylvania Avenue Funds, an Avigen stockholder, filed a complaint in Alameda County Superior Court alleging that Avigen's directors breached their fiduciary duties in connection with the proposed transaction with MediciNova. On October 15, 2009, The Pennsylvania Avenue Funds filed an amended complaint adding MediciNova as a defendant. In the amended complaint, The Pennsylvania Avenue Funds alleged, among other things, that MediciNova aided and abetted the alleged breach of fiduciary duties by the Avigen directors. The Pennsylvania Avenue Funds purportedly brings the action on behalf of a stockholder class and may seek injunctive relief, compensatory and rescissory damages, and attorney's fees. If the suit is successful, the court may order remedies, including payment of damages. In addition, the costs associated with the litigation may result in a reduction of the Second Payment Consideration to the extent that expenses of defending this litigation increase Avigen's liabilities, in the event it is deemed liable or expends substantial funds in defense of the claims, or impose significant costs on MediciNova in the event it is deemed liable or expends substantial funds in defense of the claims. Additional third parties, including other entities or private persons, may also seek to enjoin or rescind the proposed transaction.

***If any of the events described in Risks Related to MediciNova's Business and Industry, Risks Related to MediciNova's Intellectual Property, Risks Related to the Securities Markets and Investment in MediciNova Common Stock, Risks Related to Avigen's Business and Risks Related to the Combined Company occur, those events could cause the potential benefits of the Merger not to be realized.***

Following the effective time of the Merger, the combined company will be susceptible to many of the risks described in the sections herein entitled Risks Related to MediciNova's Business and Industry, Risks Related to MediciNova's Intellectual Property, Risks Related to the Securities Markets and Investment in MediciNova Common Stock, Risks Related to Avigen's Business and Risks Related to the Combined Company. To the extent any of the events in the risks described in those sections occur, those events could cause the potential benefits of the Merger not to be realized and the market price of the combined company's common stock to decline.

**Risks Related to the Convertible Notes and MediciNova Common Stock**

***The Convertible Notes do not contain restrictive covenants regarding debt incurrence, and MediciNova may incur substantially more debt or take other actions which may affect its ability to satisfy its obligations under the Convertible Notes.***

The Indenture does not contain any financial or operating covenants or restrictions on the incurrence of indebtedness (including secured debt), the payments of dividends or the issuance or repurchase of securities by MediciNova or any of its subsidiaries. In addition, the limited covenants applicable to the Convertible Notes do not require MediciNova to achieve or maintain any minimum financial results relating to its financial condition or results of operations.

MediciNova's ability to recapitalize, incur additional debt and take a number of other actions are not limited by the terms of the Convertible Notes, and any such actions could have the effect of diminishing MediciNova's financial condition and results of operations. MediciNova also cannot assure you that it will have sufficient assets available to repay the Convertible Notes at maturity.

***An active trading market for the Convertible Notes is not expected to develop, which may impair their liquidity and reduce their market price.***

The Convertible Notes are a new issue of securities for which there is currently no trading market. MediciNova cannot assure you that an active trading market for the Convertible Notes will develop or be

## Table of Contents

sustained. MediciNova does not intend to list the Convertible Notes on any national securities exchange. If an active trading market for the Convertible Notes fails to develop or be sustained, the liquidity and trading prices of the Convertible Notes could be adversely affected.

Even if an active trading market for the Convertible Notes were to develop, they may trade at prices lower than their face value depending on many factors, some of which are beyond MediciNova's control, including:

prevailing interest rates;

demand for convertible debt securities generally;

general economic conditions;

MediciNova's financial condition, performance and future prospects; and

prospects for companies in the biopharmaceutical industry generally.

***There may be future sales or other dilution of MediciNova's equity, which may adversely affect the market price of MediciNova common stock and the value of the Convertible Notes.***

The Indenture does not restrict MediciNova from issuing equity securities, including securities that are convertible into or exchangeable for, or that represent the right to receive, MediciNova common stock. Sales of a substantial number of newly-issued shares of MediciNova common stock or other equity-related securities in the public market could depress the price of MediciNova common stock, the value of the Convertible Notes or both. MediciNova cannot predict the effect that future sales of MediciNova common stock or other equity-related securities would have on the price of MediciNova common stock or the value of the Convertible Notes.

***Fluctuations in the price of MediciNova common stock may deter Avigen stockholders from converting the Convertible Notes into shares of MediciNova common stock.***

Volatility or depressed prices for MediciNova common stock could deter Noteholders from electing to convert into MediciNova common stock. The market prices for securities of biopharmaceutical and biotechnology companies, and early-stage drug discovery and development companies like MediciNova in particular, have historically been highly volatile and may continue to be highly volatile in the future. For example, since the date of MediciNova's initial public offering in Japan on February 4, 2005 through the date of this joint proxy statement/prospectus, MediciNova common stock has traded on Nasdaq as high as approximately \$42.00 per share and as low as approximately \$1.50 per share.

Noteholders may submit conversion notices, which are irrevocable, instructing the trustee to convert their Convertible Notes into shares of MediciNova common stock at an initial conversion price of \$6.80 per share. Following each conversion date, which date generally is the final business day of each calendar month, MediciNova will issue the number of whole shares of common stock issuable upon conversion as promptly as practicable and in any event within ten business days. MediciNova cannot assure that the price of MediciNova common stock will exceed \$6.80 at any time or that the price of its common stock will not decline between a Noteholder's submission of a conversion notice and the issuance of shares of MediciNova common stock.

The conversion price of \$6.80 represents a five percent premium to the \$6.47 closing price of MediciNova shares on Nasdaq on August 20, 2009, the date of signing of the Merger Agreement, and represents a 13 percent premium to the \$6.01 closing price on November 12, 2009, the second business day date prior to filing this joint proxy statement/prospectus. Holders may choose not to convert their Convertible Notes into MediciNova common stock and may instead elect to receive cash at maturity. If a substantial number of Noteholders instead elect to receive cash, this may reduce the funds that would otherwise be available to MediciNova as a result of the Merger.



---

**Table of Contents**

*The conversion rate of the Convertible Notes may not be adjusted for all dilutive events.*

The conversion rate of the Convertible Notes will be subject to adjustment for certain events, including the issuance of stock dividends on MediciNova common stock or subdivisions or combinations of MediciNova common stock, the distribution of options, rights or warrants, the distribution of evidences of indebtedness or assets, the payment of cash dividends and certain issuer tender or exchange offers as described under Description of Convertible Notes Conversion Rate; Adjustments. The conversion rate, however, will not be adjusted for other events that may adversely affect the value of the Convertible Notes or the price of MediciNova common stock, including additional issuances of common stock for cash. Any securities issuance for which there is no anti-dilution protection in the Indenture will result in each Convertible Note representing an interest in a smaller equity ownership percentage of MediciNova upon conversion.

*Noteholders will not have rights other than as holders of debt until the time of conversion, following which they will be subject to all the terms and conditions associated with MediciNova common stock from and after the time of conversion.*

Noteholders will not be entitled to any rights with respect to MediciNova common stock (including voting rights and rights to receive any dividends or other distributions on MediciNova common stock). For example, in the event that an amendment is proposed to MediciNova's restated certificate of incorporation or amended and restated bylaws requiring stockholder approval and the record date for determining the MediciNova stockholders of record entitled to vote on the amendment occurs prior to delivery of the common stock, Noteholders will not be entitled to vote on the amendment in their capacity as Noteholders. Noteholders only will be entitled to the rights associated with MediciNova common stock if and when they deliver conversion notices and are issued MediciNova common stock in exchange for the Convertible Notes and will be subject to any changes in the powers, preferences or special rights of MediciNova common stock thereafter.

*Holders of Convertible Notes may be deemed to receive a taxable distribution without the receipt of any cash or property.*

The conversion rate of the Convertible Notes will be adjusted in certain circumstances. See the discussion under the heading Description of Convertible Notes Conversion Rate; Adjustments. Adjustments to the conversion rate of the Convertible Notes (or failures to make adjustments) that have the effect of increasing the Noteholders' proportionate interest in MediciNova's assets or earnings may in some circumstances result in a constructive distribution taxable as a dividend to the extent of current or accumulated earnings and profits of MediciNova to Noteholders for U.S. federal income tax purposes, notwithstanding the fact that the Noteholders do not receive an actual distribution of cash or property. In addition, Noteholders that are Non-U.S. Holders (as defined in the discussion of Material U.S. Federal Income Tax Consequences of the Merger ) may be subject to U.S. federal withholding taxes in connection with such a constructive distribution. If MediciNova pays withholding taxes on such Noteholders' behalf as a result of an adjustment to the conversion rate of the Convertible Notes, MediciNova may, at its option and pursuant to certain provisions of the Indenture, set off such payments against payments of MediciNova common stock on the Convertible Notes. Noteholders are urged to consult their tax advisors with respect to the U.S. federal income tax consequences resulting from an adjustment to (or failure to adjust) the conversion rate of the Convertible Notes. See the discussions under the headings Material U.S. Federal Income Tax Consequences of the Merger Constructive Distributions and Material U.S. Federal Income Tax Consequences of the Merger U.S. Federal Income Tax Treatment of the Second Payment Consideration and Convertible Notes for Non-U.S. Holders.

*U.S. persons who elect to receive Convertible Notes generally will recognize income in advance of the receipt of cash attributable to such income.*

U.S. persons who elect to receive Convertible Notes generally will recognize gain or loss when they receive the notes, and if they recognize gain they will be subject to tax with respect to the portion of the gain attributable

---

**Table of Contents**

to such Convertible Notes regardless of the fact that they have not received (and may not in the future receive) cash with respect to such portion. In addition, the Convertible Notes will bear original issue discount for U.S. federal income tax purposes. Holders of the Convertible Notes (except, in certain circumstances, for Convertible Notes issued as Second Payment Consideration) who are U.S. persons generally must include original issue discount in gross income for U.S. federal income tax purposes on an annual basis under a constant yield accrual method regardless of their regular method of tax accounting. These holders must include original issue discount in income in advance of the receipt of cash attributable to such income. See Material U.S. Federal Income Tax Consequences of the Merger U.S. Federal Income Tax Treatment of the Convertible Notes.

*Floating rate notes, such as the Convertible Notes, do not assure the interest rate the Noteholders will receive from their holdings.*

The principal of the Convertible Notes will be invested in securities and all interest from such investments will be capitalized to the Convertible Notes. There is no guarantee the interest rate of the Convertible Notes will be stable or rise at any time. Floating rate debt securities, such as the Convertible Notes, are subject to adjustment of interest rates whenever market interest rates change. A decrease in interest rates could result in a decrease in the relative value of the Convertible Notes. Further, the principal and any subsequent amounts deposited in the trust account for the Convertible Notes will be invested in government securities within the meaning of Section 2(a)(16) of the Investment Company Act of 1940, as amended, or the Investment Company Act, having a maturity of 180 days or less, and/or in any open ended investment company registered under the Investment Company Act holding itself out as a money market fund meeting certain conditions under Rule 2a-7 promulgated under the Investment Company Act. Low interest rate levels associated with such securities and money market funds may limit the interest accruing to the Convertible Notes.

*MediciNova's failure to convert the Convertible Notes into MediciNova common stock in accordance with the provisions of the Indenture will constitute a default under the Indenture.*

MediciNova must satisfy its conversion obligation to Noteholders by issuing MediciNova common stock on the conversion date following delivery by a Noteholder of a conversion notice to the trustee by the applicable conversion date. Failure by MediciNova to deliver shares of MediciNova common stock upon conversion of the Convertible Notes within ten business days after the applicable conversion date will constitute an event of default under the Indenture. If an event of default occurs and is continuing, the trustee or the holders of at least 25 percent in principal amount of the Convertible Notes may declare the principal of and unpaid interest, which will be held in a trust account, on all Convertible Notes to be due and payable immediately. If MediciNova is required to pay all of the Convertible Notes, this may deplete funds available to MediciNova and materially adversely affect MediciNova's financial condition and business.

*If MediciNova suffers an event of default under the Indenture, it may not be able to satisfy all of its financial obligations.*

Under the Indenture, if an event of default (other than an event of default in connection with certain events of bankruptcy, insolvency or reorganization of MediciNova or any of its significant subsidiaries) occurs and is continuing, then the principal of and unpaid interest on all the Convertible Notes will be due and payable immediately by a notice in writing to MediciNova from the trustee or Noteholders holding not less than 25 percent of the principal of the outstanding Convertible Notes (and to the trustee if notice is given by the Noteholders). If an event of default occurs in connection with certain events of bankruptcy, insolvency or reorganization of MediciNova or any of its significant subsidiaries, then the principal of and any unpaid interest on all of the Convertible Notes will be immediately due and payable without any declaration or other act of the Noteholders. The Indenture includes customary events of default such as a default in the payment of the principal of or interest on the Convertible Notes when due and payable, default in the payment of certain other indebtedness and certain bankruptcy events.

---

**Table of Contents**

In the event that Noteholders or the trustee declare an event of default on the Convertible Notes and such default is not cured within any cure period, the Convertible Notes may be declared due and payable and MediciNova may not be able to satisfy all of its financial obligations. Further, Noteholders will lose the option value of their Convertible Notes upon any such acceleration.

*Conversion of the Convertible Notes will result in dilution for existing MediciNova stockholders and may otherwise depress the trading price of MediciNova common stock.*

If Noteholders convert their Convertible Notes, existing stockholders will experience dilution in their percentage ownership interest in MediciNova. In addition, sales of large blocks of MediciNova common stock received upon conversion of the Convertible Notes may depress the trading price for MediciNova common stock. Such fall in trading price may be more likely to occur as a result of MediciNova common stock being thinly traded.

*Any elimination of the conversion feature in the event of certain specified reorganization events may not adequately compensate Noteholders for any lost option value of the Convertible Notes as a result of such events.*

Under the Indenture, upon the occurrence of certain reorganization events in which the surviving corporation's equity securities are not registered with the SEC, the conversion feature on the Convertible Notes will be eliminated and the principal and interest on any outstanding Convertible Notes will be due and payable at maturity. The maturity of the Convertible Notes in connection with a reorganization event may not adequately compensate you for any lost option value of your Convertible Notes as a result of such transaction.

*The Convertible Notes may not be fully secured if the investment of the principal of the Convertible Notes has negative returns.*

The Convertible Notes are secured by the principal of the Convertible Notes, and any interest thereon, held in a trust account in accordance with the terms of the trust agreement. Such principal and interest will be invested in government securities within the meaning of Section 2(a)(16) of the Investment Company Act, having a maturity of 180 days or less, and/or in any open ended investment company registered under the Investment Company Act holding itself out as a money market fund meeting certain conditions under Rule 2a-7 promulgated under the Investment Company Act. To the extent that such investments have negative returns so that the amount in the trust account is less than the aggregate principal amount of the Convertible Notes, the Convertible Notes will not be fully secured.

**Risks Related to MediciNova's Business and Industry**

*MediciNova has incurred significant operating losses since its inception and expects that it will incur continued losses for the foreseeable future.*

MediciNova is a development stage biopharmaceutical company with a limited operating history. It has incurred significant net losses since its inception. For the three months and nine months ended September 30, 2009, MediciNova had a net loss of approximately \$4.8 million and \$14.5 million, respectively. At September 30, 2009, MediciNova's accumulated deficit was approximately \$241.4 million. If MediciNova is successful in raising additional capital to support expansion, MediciNova's annual net losses may increase over the next several years as it expands its infrastructure and incurs significant costs related to the development of its product candidates.

MediciNova expects its research and development expenses to increase in connection with ongoing and planned clinical trials for its prioritized product candidates, primarily related to MN-221 for the treatment of

---

**Table of Contents**

acute exacerbations of asthma and chronic obstructive pulmonary disease, or COPD, exacerbations, and any other development activities that it may initiate. In addition, its general and administrative expenses may increase in future periods as a result of several factors, including its research and development activities, its business development activities and any expansions in its infrastructure related to such activities. Consequently, MediciNova expects to continue to incur significant and increasing operating losses for the foreseeable future. Because of the numerous risks and uncertainties associated with developing drug products, MediciNova is unable to predict the extent of any future losses or when it will become profitable, if at all.

***MediciNova does not have any products that are approved for commercial sale and therefore does not expect to generate any revenues from product sales in the foreseeable future, if ever.***

To date, MediciNova has funded its operations primarily from sales of its securities. It has not received, and does not expect to receive for at least the next several years, if at all, any revenues from the commercialization of its product candidates. MediciNova's only source of revenues since inception has been from development management services rendered to Asahi Kasei Pharma Corporation and Argenes, Inc., both Japanese pharmaceutical companies, in connection with their clinical development of pharmaceutical product candidates. MediciNova completed its agreement with Asahi Kasei Pharma Corporation and terminated its agreement with Argenes, Inc.; therefore, it will not generate any further revenues from these agreements. MediciNova anticipates that, prior to its commercialization of a product candidate, out-licensing upfront and milestone payments will be its primary source of revenue. To obtain revenues from sales of its product candidates, MediciNova must succeed, either alone or with third parties, in developing, obtaining regulatory approval for, manufacturing and marketing drugs with commercial potential. MediciNova may never succeed in these activities, and it may not generate sufficient revenues to continue its business operations or achieve profitability.

***MediciNova is largely dependent on the success of its two prioritized product candidates, MN-221 and MN-166, and it cannot be certain that either of these product candidates will receive regulatory approval or be successfully commercialized.***

MediciNova currently has no products for sale, and MediciNova cannot guarantee that MediciNova will ever have any drug products approved for sale. The research, testing, manufacturing, labeling, approval, selling, marketing and distribution of drug products are subject to extensive regulation by the U.S. Food and Drug Administration, or FDA, and comparable regulatory authorities in other countries. MediciNova is not permitted to market any of its product candidates in the United States until MediciNova submits and receives approval of a New Drug Application, or NDA, for a product candidate from the FDA or its foreign equivalent from a foreign regulatory authority. Obtaining FDA approval is a lengthy, expensive and uncertain process. MediciNova currently has two prioritized product candidates, MN-221 for the treatment of acute exacerbations of asthma and COPD exacerbations and MN-166 for the treatment of MS and the success of its business currently depends on their successful development and commercialization. Neither of these product candidates has completed the clinical development process; therefore, MediciNova has not submitted an NDA or foreign equivalent or received marketing approval for either of these two prioritized product candidates. In addition, MediciNova is not currently planning to pursue any further significant clinical development of MN-166 for the treatment of MS until such time that it is able to secure a strategic collaboration to advance the clinical development of MN-166, which may delay or impede the process of completing clinical trials and seeking regulatory approval for this product candidate.

The clinical development programs for MN-221 and MN-166 may not lead to commercial products for a number of reasons, including if MediciNova fails to obtain necessary approvals from the FDA or similar foreign regulatory authorities because its clinical trials fail to demonstrate to their satisfaction that these product candidates are safe and effective. MediciNova may also fail to obtain the necessary approvals if it has inadequate financial or other resources to advance its product candidates through the clinical trial process or is unable to secure a strategic collaboration or partnership with a third party. Any failure or delay in completing clinical trials or obtaining regulatory approval for MN-221 or MN-166 in a timely manner would have a material and adverse impact on MediciNova's business and its stock price.

---

**Table of Contents**

*In order to commercialize a therapeutic drug successfully, a product candidate must receive regulatory approval after the successful completion of clinical trials, which are long, complex and costly, have a high risk of failure and can be delayed or terminated at any time.*

MediciNova's product candidates are subject to extensive government regulations related to development, clinical trials, manufacturing and commercialization. The process of obtaining FDA and other regulatory approvals is costly, time-consuming, uncertain and subject to unanticipated delays. To receive regulatory approval for the commercial sale of any of its product candidates, MediciNova must conduct, at its own expense, adequate and well-controlled clinical trials in human patients to demonstrate the efficacy and safety of the product candidate. Clinical testing is expensive, takes many years and has an uncertain outcome. To date, MediciNova has obtained regulatory authorization to conduct clinical trials for eight of its product development programs. Investigational New Drug Applications, or INDs, were approved by the FDA and are active for seven of MediciNova's product candidates. MediciNova also has obtained one Clinical Trial Authorization, or CTA, for the ongoing Phase II clinical trial for MN-221 in Canada.

It may take years to complete the clinical development necessary to commercialize a drug, and delays or failure can occur at any stage, which may result in MediciNova's inability to market and sell any products derived from any of its product candidates that are ultimately approved by the FDA or foreign regulatory authorities. MediciNova's clinical trials may produce negative or inconclusive results, and MediciNova may decide, or regulators may require it, to conduct additional clinical and/or non-clinical testing. For example, in October 2007, MediciNova announced that its Phase II clinical trial of MN-305 for the treatment of insomnia failed to achieve statistical significance in its primary endpoint; as a result, MediciNova terminated development of MN-305 for the treatment of insomnia. Of the large number of drugs in development, only a small percentage result in the submission of an NDA to the FDA and even fewer are approved for commercialization. Interim results of clinical trials do not necessarily predict final results, and success in preclinical testing and early clinical trials does not ensure that later clinical trials will be successful. A number of companies in the pharmaceutical industry have suffered significant setbacks in advanced clinical trials even after promising results in earlier clinical trials. In addition, any delays in completing clinical trials or the rejection of data from a clinical trial by a regulatory authority will result in increased development costs and could have a material adverse effect on the development of the impacted product candidate.

In connection with the conduct of clinical trials for each of its product candidates, MediciNova faces many risks, including the risks that:

the product candidate may not prove to be effective in treating the targeted indication;

patients may die or suffer other adverse effects for reasons that may or may not be related to the product candidate being tested;

the results may not confirm the positive results of earlier clinical trials;

the FDA or other regulatory authorities may not agree with MediciNova's proposed development plans or accept the results of completed clinical trials; and

MediciNova's planned clinical trials and the data collected from such clinical trials may be deemed by the FDA or other regulatory authorities not to be sufficient, which would require additional development for the product candidate before it can be evaluated in late stage clinical trials or before the FDA or other regulatory authorities will consider an application for marketing approval.

If MediciNova does not complete clinical development of its product candidates successfully, MediciNova will be unable to obtain regulatory approval to market products and generate revenues from such product candidates. MediciNova may also fail to obtain the necessary regulatory approvals if MediciNova has inadequate financial or other resources to advance its product candidates through the clinical trial process. In addition, even if MediciNova believes that the preclinical and clinical data are sufficient to support regulatory approval for a product candidate, the FDA and foreign regulatory authorities may not ultimately approve such product candidate



## Table of Contents

for commercial sale in any jurisdiction, which would limit MediciNova's ability to generate revenues and adversely affect its business.

*Delays in the commencement or completion of clinical trials, or suspension or termination of MediciNova's clinical trials, could result in increased costs to MediciNova and delay or limit its ability to obtain regulatory approval for its product candidates.*

If MediciNova experiences delays in the commencement or completion of its clinical trials, MediciNova could incur significantly higher product development costs and its ability to obtain regulatory approvals for its product candidates could be delayed or limited. The commencement and completion of clinical trials requires MediciNova to identify and maintain a sufficient number of study sites and enroll a sufficient number of patients at such sites. MediciNova does not know whether enrollment in its ongoing and planned clinical trials for its product candidates will be completed on time, or whether its additional planned and ongoing clinical trials for its product candidates will be completed on schedule, if at all. For example, MediciNova recently has experienced delays in the enrollment of patients for its ongoing Phase II clinical trial evaluating the safety and efficacy of MN-221 in patients with severe, acute exacerbations of asthma due to changes in the dosing regimen. These delays extended the anticipated date for completion of enrollment by approximately two months.

The commencement and completion of clinical trials can be delayed for a variety of other reasons, including delays in:

obtaining regulatory approval to commence or amend a clinical trial;

reaching agreements on acceptable terms with prospective clinical research organizations, or CROs, and clinical trial sites, the terms of which can be subject to extensive negotiation and may vary significantly among different CROs and trial sites;

recruiting and enrolling patients to participate in clinical trials;

retaining patients who have chosen to participate in a clinical trial but who may be prone to withdraw due to the treatment protocol, lack of efficacy, personal issues, or side effects from the therapy or who are lost to further follow-up;

manufacturing sufficient quantities of a product candidate; and

obtaining institutional review board, or IRB, approval or approval from foreign counterparts to conduct or amend a clinical trial at a clinical site.

In addition, a clinical trial may be delayed, suspended or terminated by MediciNova, the FDA or other regulatory authorities due to a number of factors, including:

ongoing discussions with regulatory authorities regarding the scope or design of MediciNova's clinical trials or requests by them for supplemental information with respect to MediciNova's clinical trial results, which may result in the imposition of a clinical hold on the IND for any clinical trial, as well as the inability to resolve any outstanding concerns with the FDA so that a clinical hold already placed on the IND may be lifted and the clinical trial may begin;

inspections of MediciNova's own clinical trial operations, the operations of its CROs, or its clinical trial sites by the FDA or other regulatory authorities, which may result in the imposition of a clinical hold or potentially prevent MediciNova from using some of the data generated from its clinical trials to support requests for regulatory approval of its product candidates;

## Edgar Filing: MEDICINOVA INC - Form S-4/A

MediciNova's failure or inability, or the failure or inability of its CROs, clinical trial site staff or other third party service providers involved in the clinical trial, to conduct clinical trials in accordance with regulatory requirements or its clinical protocols;

lower than anticipated enrollment or retention rates of patients in clinical trials;

---

**Table of Contents**

new information suggesting unacceptable risk to subjects or unforeseen safety issues or any determination that a trial presents unacceptable health risks;

insufficient supply or deficient quality of product candidates or other materials necessary for the conduct of MediciNova's clinical trials; and

lack of adequate funding to continue the clinical trial, including the incurrence of unforeseen costs due to enrollment delays, requirements to conduct additional trials and studies and increased expenses associated with the services of MediciNova's CROs and other third parties.

If MediciNova experiences delays in the completion of its clinical trials for a product candidate, the commercial prospects for such product candidate may be harmed, MediciNova may incur increased costs for development of such product candidate, and its ability to obtain regulatory approval for such product candidate could be delayed or limited. Many of the factors that cause or lead to delays in the commencement or completion of clinical trials may also ultimately lead to the denial of regulatory approval for a product candidate. In addition, any amendment to a clinical trial protocol may require MediciNova to resubmit its clinical trial protocols to IRBs or their foreign counterparts for reexamination, which may delay or otherwise impact the costs, timing or successful completion of a clinical trial.

***The loss of any rights to develop and commercialize any of MediciNova's product candidates could significantly harm its business.***

MediciNova licenses the rights to develop and commercialize its product candidates. Currently, MediciNova has licensed rights relating to eight compounds for the development of ten product candidates.

MediciNova is obligated to develop and commercialize these product candidates in accordance with mutually agreed upon terms and conditions. MediciNova's ability to satisfy some or all of the terms and conditions of its license agreements is dependent on numerous factors, including some factors that are outside of its control. Any of its license agreements may be terminated if it breaches its obligations under the agreement materially and fails to cure any such breach within a specified period of time.

If any of MediciNova's license agreements is terminated, MediciNova would have no further rights to develop and commercialize the product candidate that is the subject of the license. The termination of the license agreements related to either of MediciNova's two prioritized product candidates would significantly and adversely affect its business. The termination of any of the remainder of its license agreements could also have a material adverse effect on its business.

***If MediciNova's competitors develop and market products that are more effective than its product candidates, they may reduce or eliminate its commercial opportunities.***

The biotechnology and pharmaceutical industries are subject to rapid and intense technological change. MediciNova faces, and will continue to face, competition from pharmaceutical and biotechnology companies, as well as numerous academic and research institutions and governmental agencies, in the United States and abroad. Some of these competitors have products or are pursuing the development of drugs that target the same diseases and conditions that are the focus of MediciNova's product development programs. There can be no assurance that developments by others will not render MediciNova's product candidates obsolete or noncompetitive. Many of MediciNova's competitors have products that have been approved or are in advanced development and may succeed in developing drugs that are more effective, safer and more affordable or more easily administered than MediciNova's, or that achieve patent protection or commercialization sooner than MediciNova's products. MediciNova's competitors may also develop alternative therapies that could further limit the market for any products for which MediciNova is able to obtain approval, if at all. In addition, new developments, including the development of other drug technologies and methods of preventing the incidence of disease, occur in the pharmaceutical industry at a rapid pace. These developments may render MediciNova's product candidates obsolete or noncompetitive.

---

**Table of Contents**

In many of MediciNova's target disease areas, potential competitors are working to develop new compounds with different mechanisms of action and attractive efficacy and safety profiles. Many of its competitors have substantially greater financial, research and development resources (including personnel and technology), clinical trial experience, manufacturing, sales and marketing capabilities and production facilities than MediciNova does. Smaller companies also may prove to be significant competitors, particularly through proprietary research discoveries and collaboration arrangements with large pharmaceutical and established biotechnology companies.

MediciNova's competitors may obtain regulatory approval of their products more rapidly than MediciNova is able to or may obtain patent protection or other intellectual property rights that limit MediciNova's ability to develop or commercialize its product candidates. MediciNova's competitors may also develop drugs that are more effective and less costly than MediciNova's and may also be more successful than MediciNova in manufacturing and marketing their products. MediciNova also expects to face similar competition in its efforts to identify appropriate collaborators or partners to help develop or commercialize its product candidates.

*Negative conditions in the global credit markets may impair further the liquidity of MediciNova's investment portfolio.*

At December 31, 2008, all of MediciNova's remaining marketable securities available-for-sale, which consisted of auction rate securities, or ARS, were designated as trading securities and were classified to long-term due to the time frame in which MediciNova can readily convert these securities into cash. These ARS represent 100 percent of MediciNova's overall investment portfolio. MediciNova's long-term asset consisted of the ARS Put (pursuant to the ARS Rights Offer described below). At September 30, 2009, approximately \$21.3 million of its ARS and the ARS Put were reclassified to current assets because they can be readily converted to cash within twelve months. Of the approximately \$2.5 million of ARS which continued to be classified as long-term assets as of September 30, 2009, approximately \$2.2 million consisted of private placement investment securities. None of the underlying collateral for MediciNova's ARS consisted of subprime mortgages or collateralized debt obligations.

Due to continued negative conditions in the global credit markets, MediciNova's ARS have continued to fail at auction with few to no trades in either the primary or the secondary markets. As a result, MediciNova has been unable to liquidate its ARS that are not subject to the ARS Rights Offer, and it could be required to hold these securities until such time that they are redeemed by the issuer, successfully sold at auction, sold through a secondary market or ultimately mature. In addition, with the adoption of Accounting Standards Codification, or ASC, 820, authoritative guidance for fair value, measurements and disclosures (formerly Statement of Financial Accounting Standards, or SFAS, 157), MediciNova determined the fair value of its ARS portfolio primarily on Level 3 criteria, which resulted in its reliance on a discounted cash flow valuation model with assumptions related to interest rates, maturities and liquidity, determined by MediciNova based on the credit quality of the security, the credit quality of the associated insurer, if applicable, the respective prospectus and the credit market outlook. With all of MediciNova's investment securities designated as trading securities, any additional increase or decrease in the fair value of its investment securities is recorded as either a gain or an impairment charge, respectively, in its consolidated statement of operations. For the three months ended September 30, 2009, MediciNova recorded a net gain on its investment securities of approximately \$0.4 million to increase the carrying value of its investment securities. In addition, for the three months ended September 30, 2009, MediciNova recorded an impairment charge of approximately \$0.3 million on the ARS Put to decrease its carrying value based on MediciNova's discounted cash flow model with liquidity discount.

In August 2008, UBS AG and its affiliates, or UBS, the brokerage firm through which MediciNova purchased the majority of its ARS investments, entered into a settlement with the SEC, the New York Attorney General and other state agencies. Under the settlement, UBS issued to MediciNova Auction Rate Security Rights, which would allow MediciNova to sell to UBS its ARS held in accounts with UBS, or the ARS Rights Offer. Pursuant to the ARS Rights Offer, MediciNova received the right to sell to UBS the ARS held in accounts with UBS at par value at any time during the period beginning June 30, 2010 and ending July 2, 2012, or the ARS Put.

---

**Table of Contents**

As part of the settlement, UBS also offered to MediciNova a no net cost loan program, or ARS Loan, whereby MediciNova would be able to borrow up to 75 percent of the market value, as determined by UBS at its sole discretion, of MediciNova's ARS that have been pledged as collateral at an interest cost that would not exceed the interest being paid on the underlying ARS investments. In January 2009, MediciNova was approved for the ARS Loan in the amount of \$15.9 million and drew down the entire preapproved amount. In addition, in February 2009, MediciNova borrowed an additional \$2.2 million under the ARS Loan, bringing the total amount outstanding under the ARS Loan to \$18.1 million, following UBS' decision to increase MediciNova's availability under the ARS Loan. All cash received under the ARS Loan was invested in money market accounts. At September 30, 2009, MediciNova's ARS Loan balance was \$17.7 million.

UBS may demand full or partial payment of the ARS Loan, at its sole option and without cause, at any time. All ARS Loan advances are subject to collateral maintenance requirements. UBS may also, at any time, in its discretion, terminate and cancel the ARS Loan. If at any time UBS exercises its right to terminate the credit line agreement governing the ARS Loan, then UBS is required to provide, as soon as reasonably possible, alternative financing on substantially the same terms and conditions as those under the credit line agreement and the agreement will remain in full force and effect until such time as such alternative financing has been established. MediciNova cannot assure you that it will not default on its obligations under the credit line agreement, which could result in the acceleration of its repayment obligations, or that UBS will not call the amounts outstanding under the ARS Loan, either of which would negatively impact MediciNova's financial condition and cash flow. In addition, MediciNova cannot assure you that UBS will consummate the ARS Rights Offer and repurchase its ARS subject to such offer at par value, or that MediciNova will be able to renew this facility at maturity on similar terms, or at all.

***If MediciNova fails to obtain the capital necessary to fund its operations, MediciNova will be unable to develop and commercialize its product candidates.***

MediciNova has consumed substantial amounts of capital since its inception. From its inception to September 30, 2009, MediciNova had an accumulated deficit of approximately \$241.4 million. MediciNova's cash, cash equivalents, investment securities and ARS Put, net of the ARS Loan, totaled approximately \$37.2 million at September 30, 2009. MediciNova intends to manage its product development programs such that its existing cash, cash equivalents and investment securities as of September 30, 2009 will be sufficient to meet its operating requirements through at least June 30, 2010. MediciNova has based this estimate on assumptions that may prove to be wrong, and MediciNova could spend its available financial resources faster than MediciNova currently anticipates. MediciNova's future capital requirements will depend on, and could increase significantly as a result of, many factors, including:

progress in, and the costs of, its ongoing and planned clinical trials and other research and development activities;

the scope, prioritization and number of its product development programs;

its obligations under its license agreements, pursuant to which it may be required to make future milestone payments upon the achievement of various milestones related to clinical, regulatory or commercial events;

its ability to establish and maintain strategic collaborations, including licensing and other arrangements;

the time and costs involved in obtaining regulatory approvals;

the costs of securing manufacturing arrangements for clinical or commercial production of its product candidates;

the costs associated with expanding its management, personnel, systems and facilities;

the costs associated with any litigation;



---

**Table of Contents**

the costs associated with the operations or wind-down of any business it may acquire;

the costs involved in filing, prosecuting, enforcing and defending patent claims and other intellectual property rights; and

the costs of establishing or contracting for sales and marketing capabilities and commercialization activities if it obtains regulatory approval to market its product candidates.

Until MediciNova can generate significant continuing revenues, it expects to satisfy its future cash needs through strategic collaborations, private or public sales of its securities, debt financings or licensing transactions, involving all or a portion of its product candidates, to the extent MediciNova is able to do so. MediciNova may not be successful in obtaining strategic collaboration agreements or in receiving milestone or royalty payments under such agreements. MediciNova cannot be certain that additional sources of capital will be available to it on acceptable terms, or at all. If sources of capital are not available, MediciNova may not be in a position to pursue present or future business opportunities that require financial commitments, and MediciNova may be required to terminate, delay or reduce the scope of one or more of its product development programs; delay establishing sales and marketing capabilities or other activities to commercialize a product candidate; curtail its efforts to acquire new product candidates; or relinquish some or even all rights to its product candidates.

***The terms under which MediciNova raises additional capital may harm its business and may significantly dilute stockholders' ownership interests.***

If MediciNova raises additional funds through collaborations or licensing arrangements with third parties, it may need to relinquish some rights to its product candidates, including commercialization rights, which may harm its ability to generate revenues and achieve or sustain profitability. If MediciNova raises additional funds by issuing equity securities, stockholders may experience substantial dilution. Debt financing, if available, may involve significant cash payment obligations and restrictive covenants and other financial terms that may impede its ability to operate its business. Any debt financing or additional equity that MediciNova raises may contain terms that are not favorable to MediciNova or its stockholders.

***MediciNova will depend on strategic collaborations with third parties to develop and commercialize selected product candidates and will not have control over a number of key elements relating to the development and commercialization of these product candidates if it is able to achieve such third-party arrangements.***

A key aspect of MediciNova's strategy is to seek collaborations with partners, such as large pharmaceutical companies, that are willing to conduct later-stage clinical trials and further develop and commercialize selected product candidates. Following completion of the Phase II clinical trial for MN-166 for the treatment of MS in the second quarter of 2008, MediciNova has not undertaken, nor does it plan to undertake, any further significant clinical development activities for any of its product candidates other than MN-221 for the treatment of acute exacerbations of asthma and COPD exacerbations, other than those activities deemed necessary to maintain its license rights or maximize each product candidate's value, until such time that it is successful in entering into a partnership or collaboration to further development of such product candidates. To date, MediciNova has not entered into any such collaborative arrangements, and MediciNova may not be able to enter into any collaborations or partnerships on acceptable terms, if at all.

By entering into a strategic collaboration with a partner, MediciNova may rely on the partner for financial resources and for development, regulatory and commercialization expertise. Even if MediciNova is successful in entering into a strategic collaboration for one of its product candidates, its partner may fail to develop or effectively commercialize the product candidate because such partner:

does not have sufficient resources or decides not to devote the necessary resources due to internal constraints such as limited cash or human resources;

---

**Table of Contents**

decides to pursue a competitive potential product developed outside of the collaboration;

cannot obtain the necessary regulatory approvals;

determines that the market opportunity is not attractive; or

cannot manufacture the necessary materials in sufficient quantities from multiple sources or at a reasonable cost.

MediciNova also faces competition in its search for partners from other biotechnology and pharmaceutical companies worldwide, many of whom are larger and able to offer more attractive deals in terms of financial commitments, contribution of human resources, or development, manufacturing, regulatory or commercial expertise and support.

If MediciNova is not successful in attracting partners and entering into collaborations on acceptable terms for these product candidates, it may not be able to complete development of or obtain regulatory approval for such product candidates. In such event, MediciNova's ability to generate revenues from such products and achieve or sustain profitability would be significantly hindered.

***MediciNova is subject to stringent regulation of its product candidates, which could delay the development and commercialization of its product candidates.***

MediciNova, its third-party manufacturers, service providers, suppliers and partners, and its product candidates are subject to stringent regulation by the FDA and other regulatory agencies in the United States and by comparable authorities in other countries. None of MediciNova's product candidates can be marketed in the United States until it has been approved by the FDA. None of its product candidates has been approved by the FDA to date, and MediciNova may never receive FDA approval for any of its product candidates. Obtaining FDA approval for a product takes many years of clinical development and requires substantial resources. Additionally, changes in regulatory requirements and guidance may occur or new information regarding the product candidate or the target indication may emerge, and MediciNova may need to perform additional, unanticipated non-clinical or clinical testing of its product candidates or amend clinical trial protocols to reflect these changes. Any additional unanticipated testing would add costs and could delay or result in the denial of regulatory approval for a product candidate. These regulatory requirements may limit the size of the market for the product or result in the incurrence of additional costs. Any delay or failure in obtaining required approvals could substantially reduce or negate MediciNova's ability to generate revenues from the particular product candidate.

In addition, both before and after regulatory approval, MediciNova, its partners and its product candidates are subject to numerous FDA requirements, including requirements related to testing, manufacturing, quality control, labeling, advertising, promotion, distribution and export. The FDA's requirements may change and additional government regulations may be promulgated that could affect MediciNova, its partners and its product candidates. Given the number of recent high profile adverse safety events with certain drug products, the FDA may require, as a condition of approval, costly risk management programs, which may include safety surveillance, restricted distribution and use, patient education, enhanced labeling, special packaging or labeling, expedited reporting of certain adverse events, preapproval of promotional materials and restrictions on direct-to-consumer advertising. Furthermore, heightened Congressional scrutiny on the adequacy of the FDA's drug approval process and the agency's efforts to assure the safety of marketed drugs has resulted in the enactment of new legislation addressing drug safety issues, the Food and Drug Administration Amendments Act of 2007. This legislation provides the FDA with expanded authority over drug products after approval and the FDA's exercise of this authority could result in delays or increased costs during the period of product development, clinical trials and regulatory review and approval and increased costs to assure compliance with new post-approval regulatory requirements. Furthermore, MediciNova cannot predict the likelihood, nature or extent of government regulation that may arise from this or future legislation or administrative action, either in the United States or abroad.



## **Table of Contents**

In order to market any of its products outside of the United States, MediciNova and its strategic partners and licensees must establish and comply with numerous and varying regulatory requirements of other countries regarding safety and efficacy. Approval procedures vary among countries and can involve additional product testing and additional administrative review periods beyond the requirements of the FDA and the time required to obtain approval in other countries might differ from that required to obtain FDA approval. The regulatory approval process in other countries may include all of the risks detailed above regarding FDA approval in the United States. Regulatory approval in one country, including FDA approval in the United States, does not ensure regulatory approval in another. In addition, a failure or delay in obtaining regulatory approval in one country may negatively impact the regulatory process in others. A product candidate may not be approved for all indications that MediciNova requests, which would limit the uses of MediciNova's product and adversely impact MediciNova's potential royalties and product sales, and any approval that MediciNova receives may be subject to limitations on the indicated uses for which the product may be marketed or require costly, post-marketing follow-up studies.

If MediciNova fails to comply with applicable regulatory requirements in the United States or other countries, MediciNova may be subject to regulatory and other consequences, including fines and other civil penalties, delays in approving or failure to approve a product, suspension or withdrawal of regulatory approvals, product recalls, seizure of products, operating restrictions, interruption of manufacturing or clinical trials, injunctions and criminal prosecution, any of which would harm its business.

***MediciNova relies on third parties to assist it with its clinical trials and other important aspects of its product development programs, and MediciNova may incur additional development costs, experience delays in the commencement and completion of clinical trials, and be unable to obtain regulatory approval for or commercialize its product candidates on its anticipated timeline if these third parties do not successfully carry out their contractual duties or meet expected deadlines.***

MediciNova relies extensively on CROs, medical institutions, clinical investigators, contract laboratories and other service providers to perform important functions related to the conduct of its clinical trials, the collection and analysis of data and the preparation of regulatory submissions. Although MediciNova designs and manages its current clinical trials to ensure that each clinical trial is conducted in accordance with its investigational plan and protocol, MediciNova does not have the ability to conduct all aspects of its clinical trials directly for its product candidates.

The FDA requires MediciNova and its CROs to comply with regulations and standards, commonly referred to as good clinical practices, or GCPs, for conducting, monitoring, recording and reporting the results of clinical trials to ensure that the data and results are scientifically credible and accurate and that the trial subjects are adequately informed of the potential risks of participating in clinical trial